Volume III

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The U.S. Air Service in World War I

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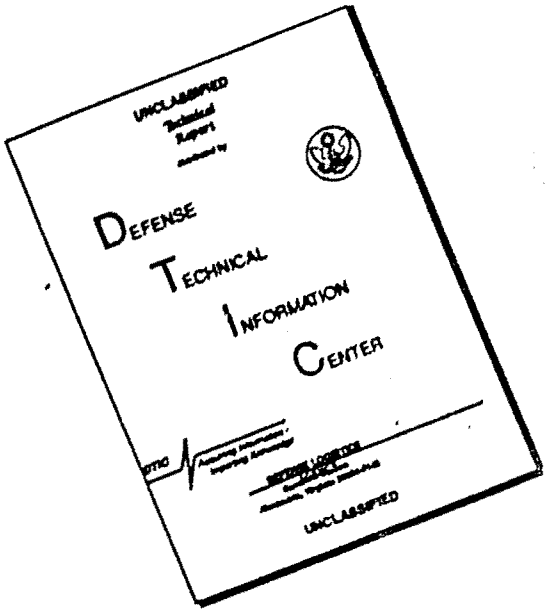

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The U.S. Air Service in World War I

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Volume III

The Battle of St. Mihiel

The Albert F. Simpson Historical Research Center
Maxwell AFB Alabama

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The Office of Air Force History
Headquarters USAF
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Foreword

The Battle of St. Mihiel is of singular significance in the history of United States participation in World War I. It was the first battle in France in which an American army fought under the American flag. The U.S. offensive gained all objectives quickly and with relatively few casualties. It eliminated a menacing salient that had threatened the Allied battleline for four years, and it cleared the way for new offensives that would end the war in less than two months.

Aerial operations at St. Mihiel made the battle an important event in the history of U.S. Military aviation. It was, primarily, Col. William ("Billy") Mitchell's show. He put together the largest air force ever committed to battle and drew up the plan for its employment.

This volume presents documents relating to the role of U.S. aviation in the Battle of St. Mihiel. It is the third in a series of four volumes that the Office of Air Force History is publishing on the U.S. Air Service in World War I.

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Preface

Two weeks before the Battle of St. Mihiel began, Col. William Mitchell, Chief of Air Service, First Army, informed Gen. John J. Pershing, then commanding First Army as well as American Expeditionary Forces (AEF), that the air force he was assembling for the battle was "one of the largest...yet brought under a single command on the front."[1] Pershing would repeat this statement, without the qualifying phrase, in the "Final Report" he would make to the Secretary of War after the Armistice. There, the air force at St. Mihiel would be described as "the largest assembly for aviation that had ever been engaged in one operation,"[2] a statement that, with variations in the wording, would be repeated many times over the years. Americans, however, sometimes tend to overlook the fact, pointed out in Pershing's report, that the air force at St. Mihiel was an Allied rather than an American force.

Pershing had to borrow heavily from the Allies to fill out the First Army for the Battle of St. Mihiel. The French provided one of the four army corps engaged in the offensive and contributed infantry, artillery, tanks, and aviation for service with American forces. As Commanding General of the First Army, Pershing had operational command of all forces, American and Allied, assigned or attached to the First Army for the battle.

America's Allies made a large contribution to the airpower employed at St. Mihiel. In fact, only about 40 percent, or about 600, of the nearly 1,500 airplanes constituting the airpower for the battle were flown by American personnel assigned to American units. Less than 50 of those 600 planes were American made, the others having been obtained from France. The other 60 percent of the total number of planes belonged to French, British, and Italian units. Further, not all of the 1,500 planes were actually under Pershing's control during the battle. While he had operational command of French and Italian aviation units attached to the First Army, he did not have such authority over British aviation, consisting of bomber units, that cooperated during the battle (see App. C).

American air strength on the Western Front increased steadily between the Battle of St. Mihiel and the Armistice. Never again during the war, however, would the Allies assemble for any battle as much airpower as they had at St. Mihiel.

The aviation under Pershing's operational control was organized on the principle that it should be employed as an integral part of large units, such as armies, corps, and divisions. Thus the various aviation units were designated for duty as "army," "corps," or "division" aviation, with the commander of each large unit having command of his "organic" aviation

(to employ a term not yet in use in U.S. military circles). Through his corps, division, and army air service commanders, Pershing had command jurisdiction over all aviation in the First Army. But there was no "First Army Air Force" in which all aviation of the First Army was consolidated in one unit under one air commander.

Colonel Mitchell, as Chief of Air Service, First Army, had both staff and command duties. As the chief of a technical service, he was responsible for advising the Commander and General Staff of First Army on aeronautical matters, instructing and inspecting all air units of First Army, allocating available aeronautical material and equipment among First Army units, and preparing general plans for the employment of all aviation of the First Army. Thus, Mitchell had certain staff responsibilities extending throughout the First Army. His command jurisdiction, however, was limited to the units that made up the army aviation of First Army. These included all pursuit and bombardment as well as the army observation that supported army artillery and provided aerial reconnaissance to fill army requirements (see App. B). To carry out this function, he had a second title—Army Air Service Commander.

Corps aviation consisted of observation units assigned to the various corps to support infantry and artillery (see App. A). Each corps had an aviation officer who stood in the same relationship to the corps commander as Mitchell did to the Army commander. He was the head of a service (Chief of Air Service) and commander of corps aviation (Corps Air Service Commander).

Aviation was not assigned to divisions or lower units of the ground forces in the AEF. Instead, division aviation was provided by designating units from corps aviation to work with the several divisions in specific actions (see App. A). Operating with a division, an aviation unit was subject to the orders of the division commander.

Although aviation included balloons as well as airplanes, Mitchell and the corps air service commanders devoted their attention largely to the activities of heavier-than-air craft and permitted their balloon officers to handle matters pertaining to lighter-than-air operations.

The documents presented in this volume provide detailed information on the organization, command, and employment of air power, particularly U.S. aviation, in the Battle of St. Mihiel. The first part of the volume contains documents, arranged in chronological order, relating to plans and preparations for the battle. This is followed by documents pertaining to each of the 5 days of the battle, 12-16 September 1918. For

each day, the orders and related materials are presented first, followed by the operations reports. The orders are arranged downward through the chain of command; the reports are in reverse order. The last section of the volume contains narrative summaries prepared by various units for the histories they submitted at the end of the war.

All of the documents published in this volume are from the Albert F. Simpson Historical Research Center or the Air University Library at Maxwell Air Force Base, Alabama. The major portion of them are from a microfilm copy of Col. Edgar S. Gorrell's "History of the Air Service AEF," the original of which is in the National Archives.[3] These sources, unfortunately, do not contain some documents of considerable significance. For example, the editor was unable to find a complete field order of any of the army corps; available extracts were too fragmentary to be of any use. Orders and reports for some aviation units are missing, although there is evidence that in some cases, particularly in the corps observation squadrons, orders for missions often were given orally and never recorded. Some kinds of documents pertaining to air operations, such as the reports that aerial observers made directly to intelligence officers, are completely lacking. The documents included in the volume, however, seem to provide a fairly complete picture of U.S. air operations at St. Mihiel.

The general editorial policy has been to preserve the original text of each document. The format has also been kept so far as practicable, although some changes had to be made in the interests of clarity and to meet the requirements imposed by the format of the printed volume. Editorial comments and notes have been kept to the minimum.

The documents contain many foreign, especially French, military and aviation terms that U.S. Air Service personnel picked up during the war. An American pilot could "pique" without knowing how to spell the French word for a vertical dive; consequently, it might appear in his report as "peque" "peaque," or even "peak." Some of the foreign terms used by the Americans had neither a settled spelling nor well-defined meaning. For example, "straff" was used as often as "strafe" to refer to any kind of "heavy" attack from the air on troops, equipment, facilities, and positions on the ground. The editor has permitted such terms to stand as they appear in the original documents. A good dictionary of French aviation terms of World War I is the *Aeronautic Dictionary* compiled and published by the Air Service, AEF (see Selective Bibliography).

Many of the documents contain obvious factual errors. A report, for example, may show a total flight time of 150 min-

utes for a mission that departed at 9:40 a.m. and returned at 10:00 a.m. Even more numerous are discrepancies between related documents. A squadron's operations report may not correctly reflect the reports filed by the pilots. The group's report may be at variance with the information submitted by the squadrons, and so on with reports on up the line. Such a situation, of course, is not unique or even unusual, and no attempt has been made either to point out or to correct such errors and discrepancies.

The editor, however, did attempt to straighten out place names appearing in the documents included in this volume. It was neither an easy nor an entirely successful undertaking. Many of the place names mentioned in documents relating to the Air Service, AEF, do not appear in the *NIS Gazetteer.*[4] Most of the places in the St. Mihiel salient are listed, however, in a gazetteer published by GHQ AEF in October 1919.[5] An excellent map illustrating American operations in the area of St. Mihiel has been published by the American Battle Monuments Commission.[6] More detailed map coverage of the St. Mihiel battle area is provided by the World War I maps that the American Battle Monuments Commission copied to go with the volumes in its series on the operations of the various U.S. divisions in France,[7] and by maps that the Service Historique of France published with French documents relating to World War I.[8] Many of the places mentioned in the documents printed in the present volume may be found in the maps, *Joint Operations Graphic*, published in Paris by the Institut Geographique National.[9] Maps and grids used by the Air Service, AEF are described in Appendix D of this volume.

Even with good maps, it is difficult to identify and locate some of the places mentioned in Air Service documents. For one thing, the document may not give the full, precise name of the place. Is the "Villers" mentioned in an operations report Villers-sous-Bonchamp, Villers-sous-Pareid, Villers-sous-Preny, or one of the other "Villers" found in the same general area? The answer may take a long time to find, and indeed may never be determined with certainty. The difficulty is frequently compounded by the misspelling of place names. When a pilot wrote "Vilecey" in his reconnaissance report, did he mean Vilcey-sur-Trey or another village about 8 kilometers away, Villecey-sur-Mad? Identification of place names in documents in "Gorrell's History" is further complicated by the many mistakes made by the unskilled and sometimes careless typists who copied documents for the "History." The editor has attempted to correct misspellings of place names, but because of the large number of such changes, it appeared

impracticable to indicate in each instance the change being made.

The editor is grateful to Mr. John D. Ashmore, Chief, and to Mr. D. B. Flournoy and Mr. Gurvis Lawson of the Cartographic Information Division of Air University Library for expert advice and assistance in dealing with cartographic and geographic matters relating to air operations in the Battle of St. Mihiel. He also wants to express his thanks to Mr. Lloyd H. Cornett, Jr., Chief of the Albert F. Simpson Historical Research Center, Lt. Col. Charles C. Biasi, and Mr. Herschel Harvey, Chief of Administration, for their support and assisttance, and to Mrs. Dorothy McCluskie, Mrs. Jane Motley, Mrs. Linda Copenhaver, Mrs. Carolyn Fulk, and especially Mrs. Lois Wagner for their fine work in transcribing documents and typing the manuscript of this volume.

Special recognition goes to Mr. Lawrence J. Paszek, Senior Editor, Office of Air Force History, for his work in selecting photographs, preparing artwork for this volume and maintaining close liaison with the printer. Photographs were selected from collections in the National Archives, the USAF photo depository, and the USAF Art Collection. Mr. Jim Watson, U.S. Government Printing Office, arranged the typography and designed the layout of the book.

Maurer Maurer

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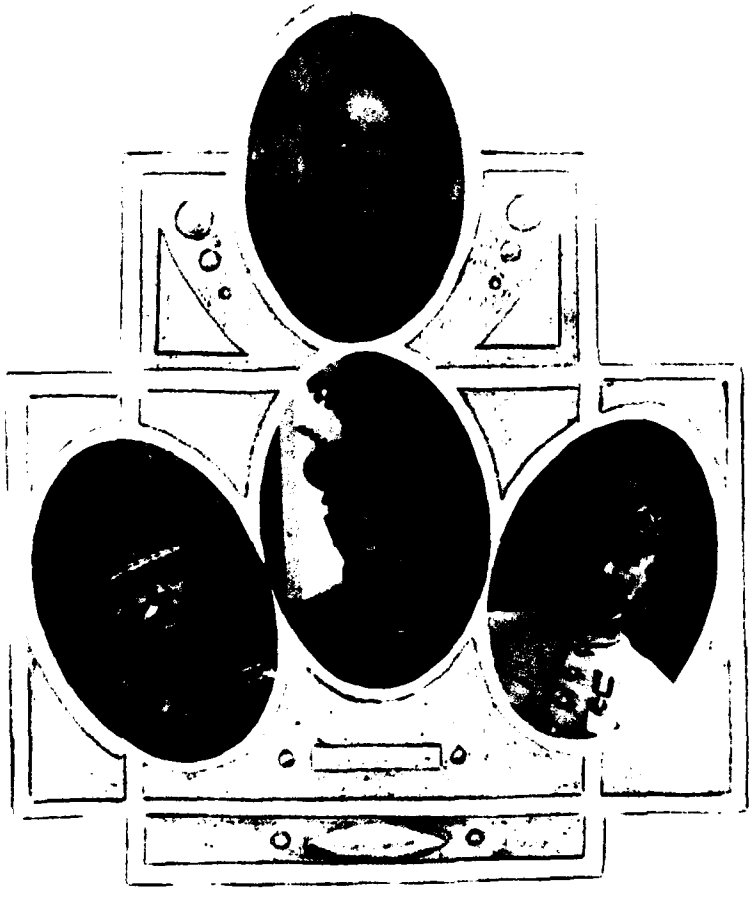
Documents on the Battle of St. Mihiel



(Top) Gen. Ferdinand Foch; (below, l. to r.) Field Marshal Douglas Haig, Gen. John J. Pershing, and Gen. Henri Petain.

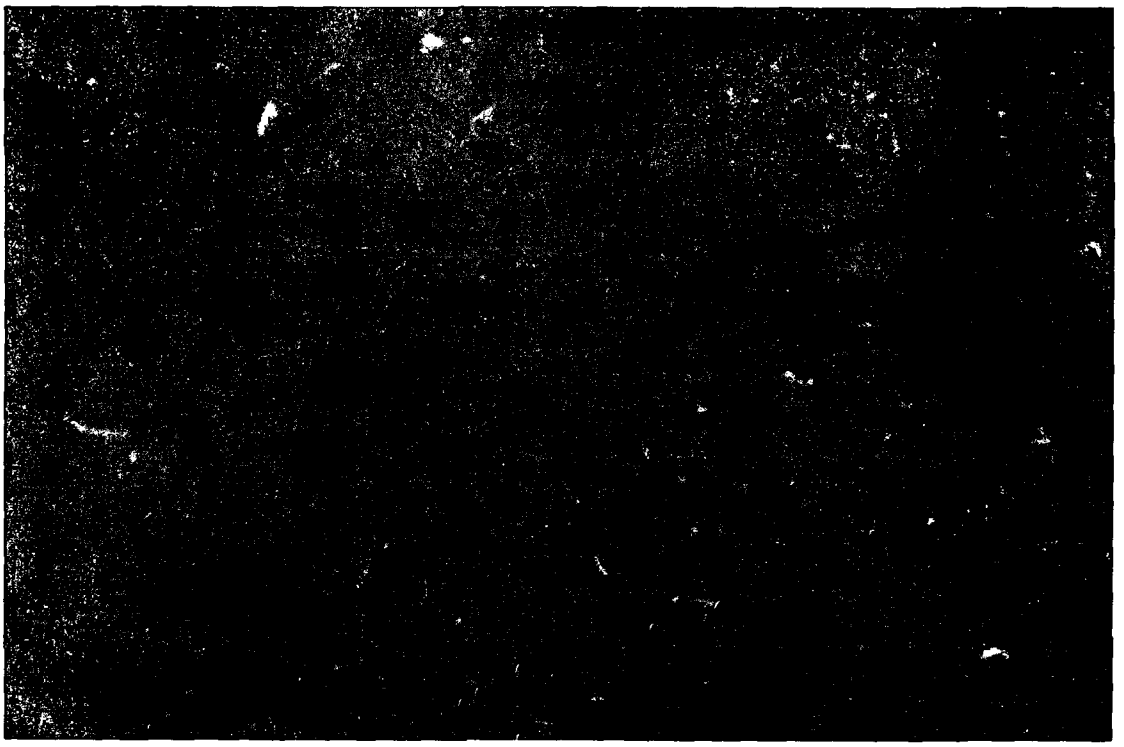
Plans and Preparations

—1—

Reduction of the St. Mihiel salient was assigned to the American Army at a conference of the Allied commanders-in-chief on 24 July 1918. This salient in the battle line on the Western Front had existed for nearly four years, a relic of an unsuccessful German attempt to envelop the great fortress of Verdun in September 1914. The French had tried to reduce the bulge in 1915 but had failed. Since then most of the heavy fighting on the Western Front had been west and north of Verdun, with relatively little action in the salient or along the line southward to the Swiss border. The quiet sector on the south side of the salient and the area to the rear had become a training ground for American units that Pershing was trying to forge into a fighting army in the summer of 1918. As early as June 1917 the Commander-in-Chief of the AEF had tentatively selected the St. Mihiel salient as the place where he would lead his army into battle. Some American units in France had been fighting under French or British direction. Now Pershing was to bring his army together to fight under the American flag.

The St. Mihiel salient, which was some 25 miles wide at its base and about 15 miles deep, extended from les Eparges (about 10 miles southeast of Verdun) southward to the town of St. Mihiel on the Meuse River, then eastward by the way of Seicheprey to Pont-a-Mousson on the Moselle River, a distance of some 40 miles. The terrain gave the Germans a strong defensive position. The western face of the salient was on the rugged, heavily wooded heights of the Meuse. On the southern face the battle line followed the heights of the Meuse for some distance and then crossed the plain of the Woevre. The detached heights of Montsec and Loupmont within the German lines dominated the plain and provided excellent observation posts for the Germans.

The natural features of the region plus the elaborate field fortifications erected by the Germans made the salient a bastion projecting outward from the Hindenburg Line which extended across the base of the salient. The first defensive position was the Wilhelm Sector, parallel with and close to the front, consisting of a network of trenches, wire, concrete dugouts, and machine gun emplacements. The second position was the Schroerer Sector, some 5 to 8 kilometers to the rear, forming a smaller salient within the large one. The withdrawal position was the Hindenburg Line, which was backed up by detached works some 4 to 6 kilometers farther back. Beyond were permanent fortifications around Metz and Thionville. Holding the salient, which covered the rail center at Metz



Col. William ("Billy") Mitchell became Chief of Air Service in Pershing's American First Army.

and the important iron mines at Briey, the Germans interrupted French rail traffic on the Paris-Nancy and Toul-Verdun lines, posed a constant threat of penetration of the Allied defensive structure, and constituted a serious check on any offensive the Allies might launch at or west of Verdun.

French and American forces had recently been able to seize the initiative and were on the offensive in the region between the Aisne and Marne rivers when the Allied commanders met on 24 July 1918 at Bombon, the headquarters of Marshal Ferdinand Foch, the Allied Commander-in-Chief. With the French, British, and American commanders—Gen. Henri Petain, Field Marshal Douglas Haig, and General Pershing—in attendance, the main topic of the conference was plans for other offensives during the late summer and autumn of 1918. Pershing and the American Army were given the task of reducing the St. Mihiel salient so as to release the Paris-Nancy railroad, place the Allies within reach of Metz and Briey, and open the way for further and greater action in the areas between the Meuse and the Moselle. Because of the offensive in the Aisne-Marne area, no date was set for the attack on the St. Mihiel salient.

Having previously designated key staff officers and taken other steps to form an army headquarters, Pershing now announced the forthcoming organization of the American First Army with himself as Commander and Col. William Mitchell as Chief of Air Service.[8]

General Headquarters, A.E.F.[b]
July 24, 1918

General Order
Number 120

I. In accordance with authority contained in War Department Cablegram (No. 743), the American First Army, is organized as indicated hereinafter, to take effect August 10, 1918.

II. The American First Army, will consist of the following organizations:

A. Headquarters:

Station:
La Ferte-sous-Jouarre, Department of Seine-et-Marne, France.

Commander:
Gen. John J. Pershing, U.S. Army

Staff:
Chief of Staff, Lt. Col. Hugh A. Drum, G.S.
Asst. Chief of Staff, G-1, Lt. Col. Jens Bugg, G.S.
Asst. Chief of Staff, G-2, Lt. Col. Willey Howell, G.S.
Asst. Chief of Staff, G-3, Col. Robert McCleave, G.S.
Asst. Chief of Staff, G-4, Lt. Col. John L. DeWitt, G.S.
Asst. Chief of Staff, G-5, Lt. Col. Lewis H. Watkins, G.S.

Administrative and Technical Services:
Chief of Artillery: Maj. Gen. Edward F. McGlachlin, N.A.
Adjutant General, Col. Joseph F. Barnes, A. G. D.
Inspector General, Col. Jacob C. Johnson, I. G. D.
Judge Advocate, Lt. Col. Blanton Winship, J. A.
Chief Quartermaster, Major George Luberoff, Q. M. R. C.
Chief Surgeon, Col. Alexander N. Stark, M. C.
Chief Engineer, Brig. Gen. Jay J. Morrow, N. A.
Chief Signal Officer, Lt. Col. Parker Hitt, S. C.
Chief Ordnance Officer, Col. Edward P. O'Hern, Ordnance Dept., N. A.
Chief of Air Service, Col. William Mitchell, S.C.
Chief of Motor Transport Corps, Col. William H. Winter, Q. M. C.
Chief of Chemical Warfare Service (To be designated later).
Chief of Tank Corps (To be designated later).
Provost Marshal (To be designated later).

Headquarters
Troop: Capt. Edward C. McGuire, 3d Cavalry.

Such assistants as may be necessary will be designated in orders of the First Army.

Brig. Gen. Hugh A. Drum served as Pershing's Chief of Staff during the St. Mihiel offensive.

B. Troops and Services: Such troops and services as may be designated by confidential instructions of these headquarters.

III. The staff officers mentioned in Sec. II above and such assistants as may be authorized by the army commander will proceed to La Ferte-sous-Jouarre for station in time to take over their duties on the date indicated above. The travel directed is necessary in the military service.

. . . . . .

By command of General Pershing:

James W. McAndrew
Chief of Staff

—2—

In the early stages of planning for the employment of aviation in the First Army, Pershing approved the following memorandum outlining the procedures to be used in assigning missions to aviation units. The document reveals, perhaps better than any other contemporary source, the way in which command of aviation was split up and parceled out among various officers at different levels of organization.

Headquarters
1st Army, A.E.F.
August 6th, 1918

Memorandum
Number 8

The following system and routine of assigning missions to the Air Service in the 1st Army is published for the information and guidance of all concerned:

MISSIONS	BY WHOM ORDERED	TO WHOM TRANSMITTED
A. Army Observation Group:		
1. Reconnaissance		
a. Visual Day Night	Army G-2	Group Commander through Branch Intelligence Officer
b. Photographic		
2. Command Reconnaissance	Army G-3	Army Chief of Air Service
3. Artillery Adjustment	Army Artillery Commander	Group Commander
B. Pursuit Group:		
1. Patrolling		
a. Offensive b. Defensive	Army G-3	Army Chief of Air Service
2. Protection	Air Service Commander	

C. Bombing Group:		
1. Tactical Bombardment	Army G-3	Army Chief of Air Service
D. Balloon Group:		
1. General Surveillance	Army G-3	Army Chief of Air Service
2. Artillery adjustment	Army Artillery Commander	Group Commander
E. Corps Observation Group:		
1. Reconnaissance		
a. Visual Day Night	Corps G-2	Group Commander through Branch Intelligence Officer
b. Photographic		
2. Command Reconnaissance	Corps G-3	Corps Chief of Air Service
3. Artillery Adjustment	Corps Artillery Commander	Corps Chief of Air Service
4. Liaison	Division Commander	
a. Infantry		
b. Artillery	Division Artillery Commander	Group Commander
F. Balloon Group:		
1. General Surveillance	Corps G-3	Corps Chief of Air Service
2. Artillery Adjustment	Corps Artillery Commander	Group Commander

Lower unit commanders should come into direct communication in arranging for the missions outlined above.

The Collection, collation and dissemination of information of the enemy obtained by the Air Service is a duty of G-2 and is fully covered by the Intelligence Regulations.

By command of General Pershing

—3—

German aerial opposition had not been very strong in the quiet sector where the First Army was secretly being formed for the attack on St. Mihiel. Mitchell was concerned, however, about the enemy's ability to bring in additional units after the offensive had been launched. He needed information about the disposition of German aviation units and the locations of unoccupied airfields that the enemy might use in concentrating a powerful air force to oppose the Allied offensive. Seeking such information from the intelligence officer at First Army headquarters, Mitchell also asked for other information for use in preparing plans for the forthcoming battle. His memorandum to G-2 reveals a great deal about Mitchell's ideas as to how he might employ aviation during the offensive.

Headquarters, First Army
Office of the Chief of Air Service
August 7th, 1918

From: Chief of Air Service, First Army.

Memorandum for: Assistant Chief of Staff, G-2

1. Information is requested as to the location of the airdromes from which the enemy is operating against the front of this army and by what types and numbers of squadrons each airdrome is occupied.
2. Information is requested as to the location of all unoccupied airdromes opposite the front of this army.
3. Information is requested as to the location of the enemy's concentration and training centers within sixty or seventy kilometers of the front of this army.
4. Information is requested as to the main arteries of traffic which the enemy would be compelled to use to bring large forces from his concentration and training areas up to the front of this army for a general attack over an extended front.
5. Information is requested as to the main arteries of traffic between the various concentration and training areas of the enemy within sixty or seventy kilometers of the front of this army.
6. Information is requested as to the location of cross-roads, bridges, railroad stations, and headquarters of the enemy within forty or fifty kilometers of the front of this army in order that a study may be made of possible bombing targets.
7. Information is requested as to the specific points and routes

which the army will wish to have photographed periodically after it takes control of the sector.

8. Information is requested as to the normal number of cars likely to be perceived in important railway stations within forty or fifty kilometers of the front of this army so that any variation from normal will be readily appreciated.

9. Information is requested as to the normal circulation of traffic on the main arteries connecting the enemy's concentration and training areas and connecting these areas with the front line so that any departure from the normal may be readily appreciated.

William Mitchell
Colonel, A.S.S.C.
Chief of Air Service
First Army

—4—

Mitchell's authority and responsibilities as Chief of Air Service, First Army, as well as the authority and responsibilities of the chiefs of the air services of the various army corps, had been stated in orders issued by GHQ AEF on 29 May 1918. The organization of aero squadrons of the First Army into groups and wings was provided for by the following orders, which also stated the duties of group and wing commanders.

The latter orders show significant differences between the duties of the commander of the pursuit wing and those of the commander of the corps observation wing. Operating under the direct command of Mitchell, as Army Air Service Commander, the pursuit wing commander had direct command over the groups making up the wing. Since corps observation groups (one to a corps) were under the command of corps air service commanders, who reported to corps commanders rather than to Mitchell, the observation groups of the various corps could not be formed into a wing for command purposes. The Wing Commander of Corps Observation, therefore, functioned as a staff officer to the Army Air Services Commander rather than as the commander of a tactical wing.

Headquarters, 1st Army[a]
American Expeditionary Forces
France, August 10th, 1918

General Orders
Number 8

I. The following instructions in regard to the Air Service, 1st Army, are published for the information and guidance of all concerned:

1. Duties of the Chief of the Air Service of an Army and of an Army Corps are defined in G. O. 81, G. H. Q., A. E. F., 1918.[b]

2. A wing in the Air Service consists of two or more groups; a group consists of two or more squadrons.

3. The Commander, Pursuit Wing under the C. A. S., 1st Army, is in direct command of all pursuit groups composing the wing and is responsible for the proper execution of the duties of each group. He will assure proper telephonic, telegraphic and radio communication and liaison between his command and other arms or services of the Army. He will exercise technical supervision over all material and personnel in the wing and will see that all missions assigned are promptly and efficiently carried out. He is responsible that all records, reports, messages and orders are properly made out, filed and forwarded and that the methods of handling and transmitting information work efficiently.

The duties of the Wing Commander, Army Observation, and Wing Commander, Bombardment[c] are similar to those prescribed for the Commander, Pursuit Wing with respect to the groups acting under their command.

4. Corps Observation—The Wing Commander (under the C. A. S., 1st Army) is charged with the instruction and inspection of all observation squadrons or Observation Groups assigned to Army Corps. He coordinates their duty and exercises technical supervision over all Army Corps Aviation units. This includes the method by which duty is performed, the supply and proper care of material, the supply and instruction of personnel; the location of airdromes, the handling and care of transportation, the state of the telephonic, radio and other signalling appliances, and methods, the photographic sections, the operations officers, the preparation and forwarding of orders, reports and messages, the maintenance of liaison with contiguous troops, and the reporting to the C. A. S. of the Army any irregularities observed in methods of performing duty either tactical or technical.

5. The Group Commander, Corps Observation, Pursuit or Bombardment commands his group, and is responsible that all orders for missions from higher authority are promptly executed. He assigns specific duties to each squadron, is responsible that

Squadron Commanders understand their missions, and that all group specialties such as photographic sections, operations offices and working with the Branch Intelligence Officers are properly kept up and executed. He is responsible for the proper preparation, transmission or filing of all reports, messages and orders to their destination, and that all personnel and material is in condition for effective work.

By command of General Pershing:

H. A. Drum
Chief of Staff

Official:
Joseph F. Barnes
Adjutant General

—5—

Aviation units were assigned to the First Army when GHQ AEF issued instructions on 16 August 1918 for the reduction of the St. Mihiel salient. They included headquarters of one pursuit wing and three pursuit groups, 12 pursuit squadrons, 11 observation squadrons, 1 day bombardment squadron, and 15 balloon companies. Some were designated "army aviation" to work directly under the control of the Army Air Service Commander, Col. William Mitchell. Others were marked for "corps aviation." None were assigned to divisions or lower units of the ground forces, but aero squadrons and balloon companies would be designated later to work with the various divisions (see Appendix B).

Eight of the aero squadrons and balloon companies given to the First Army on 16 August were reassigned from training areas of the Services of Supply. Two balloon companies were then on their way to the front from the balloon school at Souge. Twenty nine squadrons and companies were already at the front. Five of the 29 had arrived only recently and had not yet begun operations. The combat experience of the other 24 ranged from two days to six months.

The most experienced of the three pursuit groups was the 1st, which had been formed in May. Made up of the 27th, 94th, 95th, and 147th Squadrons, the group had made a good record for itself at Chateau-Thierry and in the Aisne-Marne Campaign. The 2nd Pursuit Group, which had been organized at the end of June, had three squadrons assigned—the 13th, which had been in combat for a little more than three weeks;

the 49th, which began operations that very day; and the 139th, which had entered combat at the end of June. The 3rd Pursuit Group, which had been in existence for only about two weeks, had the 93rd, 103d, and 213th Squadrons. The 93rd and 213th had been in combat for only a few days, but the 103d, which had begun operations on 18 February with American pilots who formerly had flown with the Lafayette Escadrille, had the longest record of combat in France of any squadron of the U.S. Air Service. The 2d and 3d Pursuit Groups were given their full complements of four squadrons each by reassignment of the 22d and 28th Squadrons from the Services of Supply.

Six of the observation squadrons (1st, 12th, 90th, 91st, 99th, and 135th) had combat experience in France ranging from about two weeks to four months; the other five (8th, 9th, 24th, 50th, and 104th) had none. The day bombardment squadron (96th) had entered combat in June but had been out of operation during the last three weeks of July after a flight of six of its planes, led by the squadron commander, had become lost during a mission and had landed on the German side of the lines.

One of the balloon companies (1st) had been at the front since February and another (2d) since April. Six others (3d, 5th, 6th, 7th, 8th, and 9th) had been in operation for less than a month. The remaining seven, reassigned from Services of Supply or enroute to the front on 16 August, had no front-line experience.

Support units assigned on 16 August included construction squadrons to prepare air base facilities; air parks to maintain airdromes, handle supplies, and perform field maintenance on aeronautical equipment; photo sections to develop and print aerial photographs; and a squadron (the 648th, mislabeled "observation" on the list) which was divided into three flights to serve as the headquarters "flights" of groups of the First Army Air Service.

The assignments of 16 August included all of the tactical units of the U.S. Air Service that would be available to the First Army for the Battle of St. Mihiel except for three squadrons. These were two day bombardment units (11th and 20th) which were assigned on 8 September, and an observation unit (88th) which was temporarily sent to the St. Mihiel area for the offensive. The only U.S. aviation units with combat experience that did not take part in the Battle of St. Mihiel were two pursuit squadrons, the 17th and 148th, which were working with the Royal Air Force, and the 4th Balloon Company, which was with the U.S. III Corps.

Lafayette Escadrille insignia.

General Headquarters, A.E.F.
Chaumont, Haute-Marne
August 16, 1918

From: Chief of Staff

To: Chief of Staff, First Army

1. The Commander-in-Chief directs that the First Army undertake the reduction of the St-Mihiel salient. The minimum result to be attained by this operation is the reopening of the Paris-Nancy Railroad in the vicinity of Commercy.

2. The main portion of the forces of the First Army will be used against the south face of the salient, the main attack extending from the vicinity of Fey-en-Haye to the vicinity of Richecourt.

A smaller portion (approximately three to four divisions) will be used in the region immediately north of les Eparges, this secondary attack being directed to the east and southeast.

The general conception of the operation is thus the converging of enveloping forces in such a way as to cause the fall of the entire salient.

3. The minimum objective of the operation may be roughly defined by the lines Vandieres—heights north of Jaulny and Thiaucourt—Vigneulles—eastern edge heights of the Meuse.

The ultimate objective may be roughly defined by the line Marieulles (east of the Moselle)—heights south of Gorze—Mars-la-Tour—Etain.

4. There is enclosed herewith a list of troops hereby assigned to the First Army. You will assume control of all these troops, except those coming from beyond the limits of the French Eighth Army, and not yet arrived at destination (unless otherwise shown under remarks) and except for tactical command of those in sector, at noon August 18.

The decision as to the exploitation of success from the minimum to the ultimate objective will depend primarily upon the degree of surprise realized during the first day's operations and this decision will be made by the commander, First Army.

As you are aware, Col. de Chambrun is taking up verbally the matter of securing French assistance to the left of our secondary attack through a French attack in the direction of Etain.

It is desired that the attack be launched prior to September 11, 1918.

5. Under existing instructions the IV Corps Staff is now exercising administrative control over all troops in the French Eighth Army. The V Corps Staff is exercising similar control over all troops in the French Seventh Army. The VI Corps Staff is charged with the training of the 79th and 91st Divisions.

Your attention is especially invited to the fact (stated under

remarks) that certain aviation units now in the region of La Ferte-sous-Jouarre are to be moved by your orders.

6. For your information it is hoped that the training of one division not now assigned to the First Army will be completed between Sept. 10 and 20. The assignment of this division will depend upon circumstances.

7. All division commanders have been, or will be, notified of their assignment to the First Army by G-3, these hq. You will notify all other commanders concerned.

8. There is also enclosed herewith a list of such S. O. S. troops and miscellaneous units in sector as are of record in G-3 these hq.

J. W. McAndrew

General Headquarters, A.E.F.
Chaumont-en-Bassigny, Haute-Marne
August 16, 1918

1. Attached hereto are lists of troops which have been assigned to the First Army by a letter signed by the Chief of Staff, dated August 16, 1918.

2. The following extracts from the letter mentioned are quoted for your information:

4. There is enclosed herewith a list of troops assigned to the First Army. You will assume control of all these troops except those coming from beyond the limits of the French Eighth Army and not yet arrived at destination (unless otherwise shown under remarks) and except for tactical command of those in sector at noon, August 18.

5. Under existing instructions the IV Corps Staff is now exercising administrative control over all troops in French Eighth Army. The V Corps Staff is exercising similar control over all troops in the French Seventh Army. The VI Corps Staff is charged with the training of the 79th and 91st Divisions.

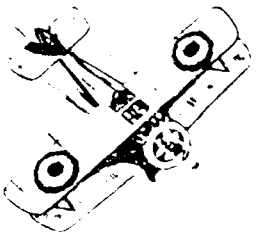
7. All division commanders have been, or will be, notified of their assignment to the First Army by G-3, these headquarters. You will notify all other commanders concerned.

Fox Conner
Colonel, General Staff
Asst. Chief of Staff, G-3

LIST OF TROOPS ASSIGNED TO FIRST ARMY

UNIT	PRESENT LOCATION	DESTINATION	REMARKS
ARMY TROOPS			
Aviation	La Ferté Region	To be assnd by	Aviation units at La Ferté
Hq., Air Service, First Army		First Army	sous Jouarre are to be
1st Pursuit Wing	Toul		ordered to First Army
1st Pursuit Group:			destinations by it when
27th, 94th, 95th and 147th			needed
Aero Squadrons	La Ferté Region	To be assnd by	
		First Army	
Flight C, 648th Aero Sqdn.	Do	Do	
474th Aero Sqdn. (Construction)	Do	Do	
2d Pursuit Group:			
13th, 49th, and 139th			
Aero Sqdns.	Toul		
3d Pursuit Group:			
93d, 103d and 213th			
Aero Sqdns.	Vaucouleurs		
91st Aero Sqdn. (Army Observ.)	Gondreville		
101st Photo Section	Do		
96th Day Bombardment Sqdn.	Amanty		
183d Sqdn. (park) less 1 flight	La Ferté region	To be assnd by	
		First Army	
218th Aero Squadron (park)	Do	Do	
I CORPS TROOPS			
I Corps Headquarters	La Ferté region	Saizerais-	
		Liverdun	
Aviation:			
Hq. Air Service, I Corps	La Ferté region	To be assnd by	
		First Army	
1st Aero Squadron (Observa.)	Do	Do	
12th Aero Squadron (Observa.)	Do	Do	
648th Aero Squadron (Observa.)	Do	Do	
Photo Sect. No. 1	Do	Do	
Balloon Wing Co. A	Do	Do	
Balloon Co. 1	Do	Do	
Balloon Co 2	Do	Do	

IV CORPS TROOPS		
IV Headquarters	Toul	
Aviation:		
8th Aero Squadron (Observa.)	Amanty	
24th Aero Squadron (Observa.)	Ourches	
50th Aero Squadron (Observa.)	Amanty	
90th Aero Squadron (Observa.)	Ourches	
135th Aero Squadron (Observa.)	Ourches	
106th Photo Section	Ourches	
Balloon Wing, Co. B	Toul	
3d Balloon Co.	Brouville	
5th Balloon Co.	Raulecourt	
6th Balloon Co.	Domevre-en-Haye	
7th Balloon Co.	Griscourt	
8th Balloon Co.	Menil-la-Tour	
9th Balloon Co.	Boucq	
43rd Balloon Co.	Enroute from Souge	to be asnd. by IV Corps
69th Balloon Co.	Do	Do



ADDITIONS TO LIST OF TROOPS ASSIGNED TO FIRST ARMY

General Headquarters, A.E.F.
Office Chief of Staff
Chaumont, August 16, 1918

UNIT	PRESENT LOCATION	DESTINATION	REMARKS
477th and 474th Aero Squad (Constr.)	Advance Section, S.O.S.	First Army	Ordered (now present) Aug. 21
99th and 104th Aero Squads Photo Section No. 5	VII Corps	First Army	Ordered overland Aug. 22
462d, 484th, 495th and 463d Aero Squads. (Constr.) temp. dy.	Advance Section, SOS	First Army	Ordered (disposition First Army) August 22
22d and 28th Aero Squads (Pursuit)	Advance Section SOS	First Army	Ordered (disposition First Army) August 22
16 Balloon Co.	SOS	Toul	Ordered Toul Sept. 1-Aug. 24
9th Aero Squad	Advance Section, SOS	First Army	Ordered G-3 Aug. 26
Balloon Co. 10, 11, 12, 42	SOS	Toul, First Army	Ordered G-3 Aug.
Balloon Wing Co. C	SOS	First Army	Ordered G-3 Aug.

—6—

Written procedures for the various types of aviation—observation, pursuit, and bombardment—had been prepared by U.S. Air Service personnel in France prior to the formation of the First Army. Revised and consolidated by Mitchell, they were issued in the following circular of the First Army Air Service. A later revision has been included in the second volume (Doc. 53) in this series.

Headquarters
Chief of Air Service
1st Army[a]
August 19th, 1918

Circular
Number 1.[b]

1. The attached notes will form the basis of the routine procedure of the Air Service units of this command. They consist of:
   (a) Routine procedure in observation Groups,
      (1) Instructions for daily procedure,
      (2) Organization of observers' room,
      (3) Notes on liaison between aircraft and infantry during attack,
      (4) Adjustment of artillery during attack as carried out by 1st Army Corps, 1st Army.
   (b) Routine procedure in pursuit units,
   (c) Routine procedure in day bombardment units,
   (d) Routine procedure in night reconnaissance units.
2. The methods of assigning missions to the various classes of aviation will be as prescribed in Memorandum No. 8, Headquarters, 1st Army, August 8th, 1918.[c]
3. The duties of various aviation commanders will be as prescribed in General Orders No. 8, Headquarters, 1st Army, August 10th, 1918.

William Mitchell
Colonel, A.S.C.
Chief of Air Service, 1st Army

Observation

INSTRUCTIONS FOR DAILY PROCEDURE

1. Group commander will designate the squadrons under his command to perform the duties assigned by higher authority. As a rule, this will require one squadron to work with corps artillery and to

do photographic work for the corps and one squadron with each division in line.

(a) The corps artillery squadron will do such adjustment for the corps artillery as cannot be done by the corps artillery balloon. In addition, this squadron will do visual reconnaissance photographic work, and will have at all times a plane of command at the disposal of the corps C.A.S.

(b) The divisional squadrons will work with the division to which they are assigned. This work will consist of reconnaissance, infantry liaison and such artillery adjustment as cannot be done by the divisional balloon.

2. Squadron Commanders will detail to the headquarters of the unit to which their squadron is assigned, an observer to act as liaison officer. It is suggested that this detail be made for the period of one week, (except during intense operations when the liaison officer should remain through period of intense activity.)

3. All orders for airplane work will be made as prescribed in Memo No. 8, 1st Army.

4. In order to prepare the work for the following day in each squadron the following procedure is suggested. After flying for the day is finished the Squadron Commander, the Squadron Operations Officer, the Squadron Flight Commanders, the Squadron Engineer Officer, the Squadron Radio Officer, and the Squadron Armament Officer should meet. They should have data as follows:

Operations Officer —Missions to be fulfilled, and the names of the observers assigned to those missions.
Engineer Officer —Airplanes available.
Radio Officer —Airplanes available by number with proper radio equipment
Flight Commanders—Pilots available.
Armament Officer —Airplanes available with proper armament.

5. In order to relieve the Squadron Commanders of certain duties and in order to train Flight Commanders for other work, it is usually a good thing to place the Flight Commanders alternately in charge of the squadron work for the day as far as regards the carrying out of missions is concerned. Therefore, at the evening meeting, the Squadron Commander or the Acting Squadron Commander should assign the pilots and observers to their work for the following day and should also assign the pilots and observers for the alert duty. The officer in charge of the alert flight should be in charge of the flying field during the day.

A typewritten sheet should be prepared showing order of importance of the work to be done each day; airplanes assigned to the work; the pilots and observers assigned; the kind of work to be done; the size of the camera and number of magazines to be used; the kind of radio reel to be used, and the officers for alert duty. A copy of this sheet, after being approved by the Squadron Commander, should go

to the Flight Commanders, the Engineer Officer, the Photographic Officer, the Radio Officer, the Operations Officer, the Armament Officer, and should also be posted on the Squadron bulletin board. One copy should be sent to the Group Operations Officer.

The Acting Squadron Commander is then charged with seeing that everything possible is done toward the fulfilling of the missions assigned.

The Photographic Officer is charged with the equipping of the airplanes with the proper cameras and number of magazines, and the prompt transportation to the photo laboratory of these articles upon the return of a mission.

The Radio Officer is charged with equipping the airplanes with reels and their return to the radio station.

The Armament Officer is responsible that the movable guns are mounted on the airplanes, that the proper number and proper sets of magazines are installed in the airplanes, that the fixed guns and belts are in proper shape, and that the Lewis guns and magazines are returned to the armory after the missions are completed.

The Engineering Officer is responsible that the airplanes are inspected and that no unsafe planes are used.

The pilots who are about to make flights must also inspect their airplanes and armament.

The Observers who are to make flights must inspect everything that they have to use.

When there are no Squadron Armament and Radio Officers, the Group Armament and Radio Officers should prepare slips daily for each Squadron Commander showing the number of airplanes available for the day and the Squadron Operations Officers should furnish them with the chart showing the next day's missions.

The following plan should be followed: As each pilot is assigned an airplane, he has his own fixed gun and belt. He should calibrate all the ammunition for that gun, should load his own belt and should load and unload the gun himself. He is responsible that the sights are properly adjusted from time to time on the range and that the proper division of tracer, armor piercing and explosive bullets are in the belt. All of this work should be done by the pilot himself.

Each observer should be assigned two movable guns, mounted in pairs and six magazines. The observer himself should then calibrate his shells, load his magazines and test the sights on the range.

ORGANIZATION OF AN OBSERVERS' ROOM

Observation Aviation—that branch of the Air Service which acts as the eyes of the army—is the basis of all aviation. Aerial Observation work, as it is done to-day, requires that the observer know in detail all information regarding the disposition, operations and plans of his own and enemy troops. It is, therefore, of fundamental importance that

each observation unit have a room conveniently located near the hangars in which the observers and pilots may have all of this information at their disposal. Under the present plan of organization this room, known as the Observers' Room, is maintained by the Observation Group and is under the supervision of the Group Operations and Branch Intelligence Officers.

The information obtainable in the Observers' Room may conveniently be divided under the following headings:

1. Photography.
2. Information pertaining to Adjustment of Artillery fire.
3. Information pertaining to the Infantry.
4. Reconnaissance and Fugitive Target Work.
5. Facilities for Instruction purposes.
6. Miscellaneous.

PHOTOGRAPHY

Under the present plan of organization photographic work is taken care of in the Observation Group in the following way:

1. All orders for photographic reconnaissance work come from G-2 of the Army or Army Corps to the Commanding Officer of the Group-who, through his Operations Officer, assigns the missions to the proper squadrons and designates the size of the camera to be used. The Squadron Operations Officer then assigns the mission to an observer, at the same time informing the Group Photographic Officer of the work to be done, who sees that the apparatus is on the field at the required time.

Pilots and observers of the 91st Aero Squadron pose in front of a Salmson. The pilots wore the double wing decoration, the observers wore single wing.

Copy of all photographic orders is submitted to the Branch Intelligence Officer.

The plates are developed immediately upon completion of a photographic reconnaissance mission, and two copies of each photograph printed and submitted to the Intelligence Officer who identifies them and specifies the number of copies to be printed. One identified copy of each photograph is returned to the Photographic Officer in order that the plate may be marked and the printing of the required number of copies started. In the meantime the Intelligence Officer makes a preliminary interpretation of the photographs, sending all information found to the units interested.

Photographs are distributed by the Intelligence Officer according to a specified list. All requests for extra copies of photographs, i.e., copies other than those specified by the regular list of distribution, come to the Intelligence Officer through G-2 at Army or Army Corps Headquarters.

One copy of each photograph is kept on file in the Intelligence Office and two copies are placed in the Observers' Room at the disposal of the observers.

Intelligence Office Records

The Intelligence Officer keeps a card index of all photographs taken, showing the camera used, co-ordinates of the center, number of photograph and altitude and date at which taken, together with a record of the character of the photograph, i.e., whether good, fair or poor. These cards are filed according to the coordinates of the photograph, each card representing a square kilometer and containing a record of photograph whose center is within this square.

A copy of every photograph taken is also filed in the Intelligence Office according to the coordinates of the center of the photograph. A book is kept in which the photographs taken are listed according to their number, giving the co-ordinates of the center, the date at which taken, and the observer carrying out the mission.

Filing of Photographs in Observers' Room

Photographs are filed in the Observers' Room in pigeon holes (8½ in. × 10 in. × 2 in.) according to their co-ordinates, each pigeon hole representing one square kilometer on the map, i.e., each pigeon hole containing photographs whose center is in that square kilometer. The pigeon holes are numbered in the same manner as the Plan Directeur Maps—horizontally according to the X co-ordinates of the photograph and vertically according to the Y co-ordinates. These files are kept up-to-date and complete by the Intelligence Officer. A book should be placed near the files in which the observers record all photographs taken from the pigeon holes in order that a check may be kept and replacements made accordingly.

Up-Keep of Maps

The maps of the sector are kept up-to-date by draftsmen, who, under the supervision of the Intelligence Officer make record of all new enemy works brought out by the study of the photographs and mark the maps accordingly.

Map Showing Area Covered by Photographs

These maps are kept on file in the Observers' Room, and kept up-to-date by the draftsman of the Intelligence Office. The area covered by a mission being outlined on a 1/20000 map, the maps being arranged chronologically, i.e., all the photographs taken during one week, beginning Sunday A.M., are shown on the same sheet. This provides a ready reference of a certain locality, as to when the latest photograph was taken.

Panstereoscope

A panstereoscopic instrument is placed at the disposal of the observers in the Observers' Room, to be used by them in the study of enemy objectives, and to be used by the Intelligence Officer for his interpretation work.

INFORMATION PERTAINING TO THE ADJUSTMENT OF ARTILLERY FIRE

1. Map (1/10000) Showing Position of All of our Artillery Elements, Those of the Enemy and the Enemy System of Trenches.

This map—the most important one of the Observers' Room—should be checked daily and all the information pertaining to our artillery kept up-to-date. It should be colored, so that an observer in planning an adjustment can tell at a glance whether his objective is in the woods, near a road, etc. The following plan is suggested for the upkeep of this map: All woods should be colored green, all lakes and rivers blue, and all roads red. Owing to the fact that artillery positions are constantly changing place, they should not be marked upon the map itself, but designated by "Tags" or "Markers" which can be glued to the head of a thumb tack moved from place to place. Under this system the different caliber of artillery can be designated by different shaped tags and the different organizations represented by different colors. All new enemy trenches and battery positions confirmed by photograph should be shown on the map and it should be kept up-to-date at all times.

2. Chart Showing Activity of Enemy Artillery.

This chart is kept up daily from the bulletins received from the Army and the Army Corps. By referring to it, an observer can tell whether a

battery on which he has adjusted fire, has been silenced, or whether it has again been active. This chart is also used to a large extent in planning future adjustment work as it gives the caliber of each gun and a record of its activity.

3. Model Map.

A model map (colored) is a valuable asset to an Observers' room for with it an observer can tell at a glance the nature of the terrain surrounding his objective. Often times a proposed objective is on the reverse slope of a hill, in a position such that it cannot be seen by the observer while following the course on the BT line. This necessitates that he plan such a course of flight that he will be in a position to observe the bursts at the proper time and this can only be calculated and planned with the aid of a model map.

4. Map Showing the Area Covered by Balloons and Terrestial Observation.

In order to co-ordinate the work done by terrestial, balloon and airplane observation, the Observers' Room should contain a map showing the area which are covered by balloon and terrestial observation. With this map at their disposal the observation squadrons will not plan to adjust on any of the objectives which can be adjusted on from the balloons and terrestial observation posts.

5. Chart Showing Organization of Command of Artillery Units.

From the above chart the observer can obtain information as to the Officer in Command of the organization with which he is to work, the co-ordinates of the posts of command, the co-ordinates of the panel station and the designated panel to be used.

Note: All maps, charts and bulletins pertaining to the adjustment of artillery fire are under the supervision of the Operations officer.

INFORMATION PERTAINING TO THE INFANTRY.

1. Map Showing the Occupation of the Sector by the Infantry.

It is of fundamental importance that the Observers who do infantry liaison work, and who are apt to be called on at any time to fly in the Contact Plane during an attack will be versed as to the disposition of the various Infantry Units. A map showing the parts of the line held by the different infantry organizations and the location of all troops in reserve would give the required information. The different infantry units can be designated by different colors on the map.

A German dug-out in the St. Mihiel trench system.

2. Map Showing Our Own System of Trenches in Detail.

An infantry observer must be thoroughly familiar with all parts of our own trench system in order to perform his duties properly while flying in the Contact Plane during an attack. A map showing our own trench system should, therefore, be placed at the disposal of the observer.

3. Map Showing Our System of Barrage Fire.

If the Artillery Observer while flying during an attack should see that the barrage of the enemy was producing distressing results at a certain point, he would be in a position to call for neutralization fire on the enemy batteries laying down that part of the barrage, if he were informed as to their plan of barrage. The 1/50,000 map "Activitie de l'Artillerie Enemie" gives this information and should be in the Observers' Room.

4. C. P. O. Map (Counter-Preparation Offensive).

The above map shows all important trench and road intersections, machine gun emplacements, etc. upon which the artillery are registered. All observers should know the routes most used by the enemy in bringing up re-inforcements and supplies. This information can be obtained from a C. P. O. Map.

5. Map Showing The Enemy "Strong Points," Dug-Outs, Machine Gun Emplacements, etc.

It is of the utmost importance that all observers doing work which necessitates their flying at a low altitude to know the location of enemy machine gun nests, enemy dug-outs, etc., in order that they may direct their attention toward these points. This is especially true for the Infantry Observer.

RECONNAISSANCE AND FUGITIVE TARGET WORK.

Scheduled reconnaissances are carried out by an Observation Group in an effort to obtain information as to the activity and movements of the enemy. This work is divided among the squadrons of the group. The reconnaissance plane is equipped with wireless apparatus to be used in calling Fugitive Target Batteries, which are designated by the Artillery Brigade to be used against fleeting targets.

1. Fugitive Target Map 1/20,000 colored.

This map is used to show the observers the location, calls and field of fire of the batteries designated as Fugitive Target Batteries. The battery positions, together with the calls to be used, are shown by markers on this map and the field of fire designated by radial lines extending from the battery position. The letter "Key" (or code) to be used for all work in the sector can be put at the disposal of the observers by placing it on this map.

2. General Map of Artillery Objectives, (1/20,000).

The above map is made up by the G-2 of the Army and shows all important artillery objectives, such as road intersections, ammunition dumps, material, depots, railroads, bridges, camps, aviation fields, etc. An observer doing sector reconnaisances should know the location of the most important of these and direct his attention toward them.

FACILITIES FOR INSTRUCTION PURPOSES.

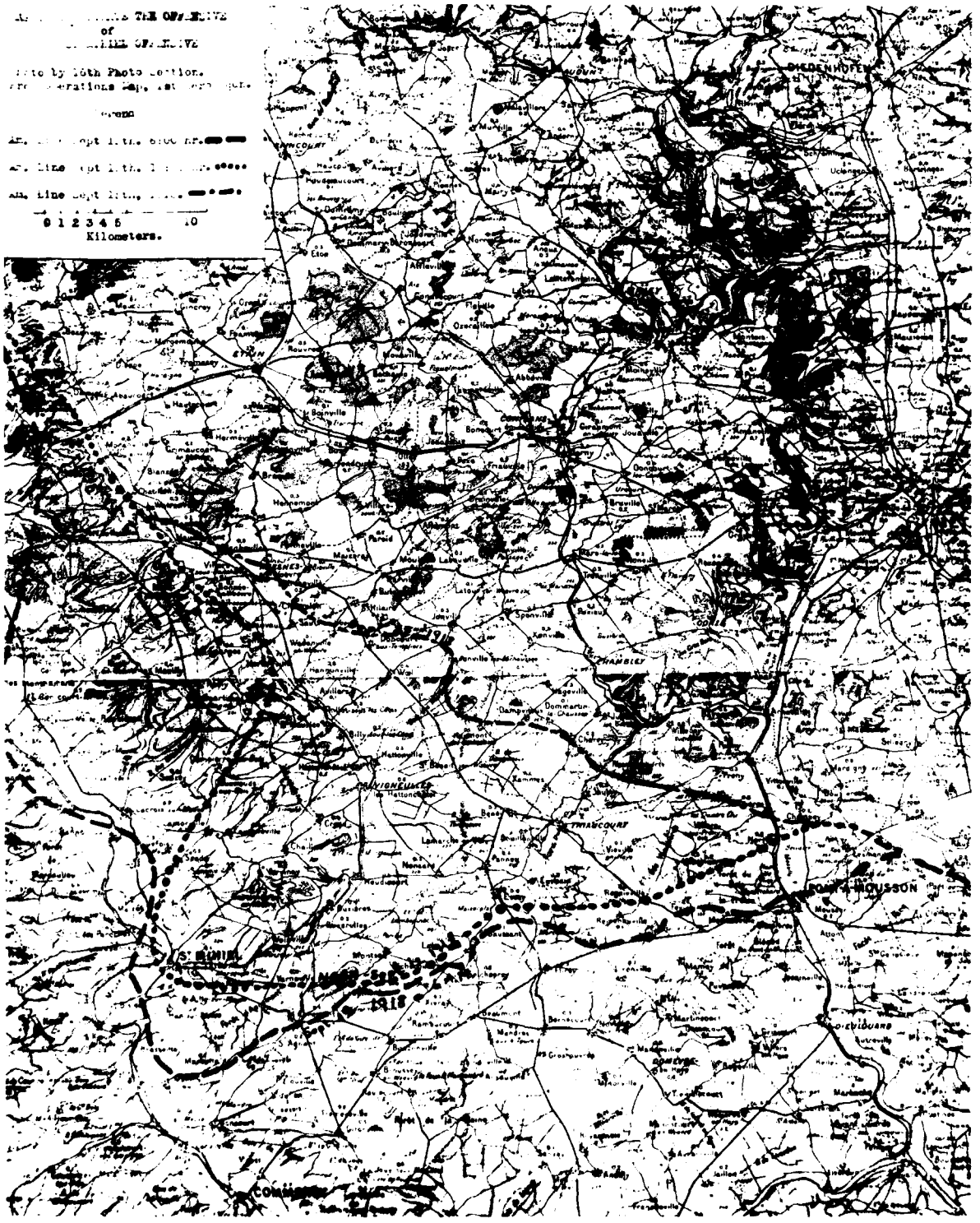
It is essential that all squadrons of an Observation Group carry out schedule instructions and review work in order to keep the observers informed as to the latest developments in aerial observation work. It is, therefore, necessary that the observers' room be equipped with facilities for instruction purposes.

1. Copies of the latest pamphlets on artillery adjustment and infantry liaison work should be kept on file in the observers' room at all times.

2. Radio buzzers should be installed and observers urged to use them at regular intervals in order that their key manipulation be efficient.

3. A blackboard should be placed in a convenient place to be used for instruction purposes. Simulated adjustments should then be carried on by drawing the objectives and showing the bursts on the board.

4. Chart showing the construction and operation of the Lewis, Browning and Marlin and Vickers Machine Guns should be placed in the Observers' Room, together with information as to the method of clearing machine gun jams.



A Typical World War I map, copied from the files of the Signal Corps, illustrates the progress of St. Mihiel offensive.

Information regarding the functioning of radio apparatus should be on file. All observers should know the theory of wireless transmission of messages and the construction of the airplane sending apparatus, and the ground receiving set.

An outlined course of instruction should be drawn up for the Group in the Observers' Room assigned to the different squadrons on specified days. In order to co-ordinate the work done by the Group and to insure like instruction in the squadrons, each squadron should have at least one representative present at the conferences of the others.

The Group Photograph and Radio Officers should be called on from time to time for instruction purposes.

All information obtainable on the subject of gas and gas projectors should be put at the disposal of the observers. Photographs of gas projectors should be studied in detail and all observers should be well informed as to the appearance, color and nature of gas clouds.

MISCELLANEOUS.

The Observers' Room being the information center of the Group, should contain all data obtained from bulletins, letters, etc., which have any bearings on the work carried out by the Group.

A Bulletin Board should be placed in a conspicuous place and observers and pilots urged to consult it at frequent intervals. All orders issued which are of interest to pilots and observers of the Group, should be posted on this board.

All incoming bulletins from the army, army corps, Air Service and Division, pertaining to the work carried on by the Group should be filed and put at the disposal of the pilots and observers. Loose leaf binders are suggested as a satisfactory method of filing these bulletins.

Maps of Sectors.

A sufficient supply of maps of all scales should be placed in the Observers' Room, at the disposal of the pilots and observers. They are under the supervision of the Branch Intelligence Officer who keeps a record of all maps taken and makes replacements accordingly.

Maps of Our Aviation Fields.

A map showing the location of all our aviation fields in the Zone of Operations of the Group should be posted in the Observers' Room, to give the pilots a general idea of possible landing places in case of motor trouble.

Maps of Enemy Aviation Fields and Balloon Positions.

The above mentioned map is of special interest to pilots and observers doing long distance reconnaissance and photography work, as it gives them information as to the most probable places of encountering enemy machines.

Maps of Enemy Anti-Aircraft Batteries.

A map of enemy anti-aircraft batteries together with a record of the zone of the most accurate fire gives the pilots and observers valuable information.

Map of Entire Front.

A map of the entire front showing the disposition of the different Army Corps and their organization or command is of general interest in the Air Service and should be placed in the Observers' Room.

A 1/600,000 map of France (Confidential) made up by G-2, General Headquarters, American E.F., entitled "German Order of Battle" gives this information.

A chart showing the organization of command of all units with whom the Group operates, should be posted.

A condensed chart giving all calls, conventional signs and signals used by the artillery and infantry airplanes should be made by a draftsman and then photographed, reducing it to a smaller scale, for the use of observers while in the air. A chart showing the panel signals used for artillery adjustment work should be made and photographed for use of pilots during such work. With this chart at their disposal the pilots can follow the adjustment and the co-operation afforded the observer is greatly increased.

A chart showing all infantry and artillery identification panels should be posted.

All information available which will aid observers and pilots in recognizing enemy airplanes should be put at their disposal. A chart of silhouettes of enemy planes should be posted; also photographs of the various types of enemy machines.

A panoramic view of the sector is a valuable asset to the Observers' Room and should be obtained if possible. Mosaics of photographic missions carried out by observers of the group tend to make the Observers' Room attractive and also give valuable information.

Observers should fill out flight reports in the Observers' Room immediately upon completion of a mission. A place should be designated for this work and a basket placed there in which the reports should be placed.

The Observers' Room should be equipped with one large table to be used by the pilots and observers for painting maps, fixing map boards, etc. Charts and benches should also be supplied.

The following is a suggested list of material that should be put at the disposal of the pilots and observers in the Observers' Room.

Ink, pencils, drawing pens, glue, paste, thumb tacks, paints, drawing instruments, magnifying glasses, pins and tracing cloth.

A wireless receiving set, is a valuable addition to an Observers' Room as it is constantly used by the observers in taking the daily

communiques and in following adjustments taking place on the lines. This not only makes the Observers' Room a more interesting place, but it is beneficial to the observers in as much as it tends to sharpen their receiving ability.

In conclusion it might be stated that every effort should be made to make the Observers' Room a quiet attractive place. In an observation group where squadrons are quartered on different parts of the field, the natural tendency will be to post information in squadron headquarters and mess halls and avoid coming to the Observers' Room, for the sake of convenience. It is, therefore, suggested that in an effort to make the Observers' Room the most frequented place of the group, information of general interest to aviators, i.e., progress of the battle in other parts of the lines, daily communiques, etc., be posted daily. A map showing the entire line should be posted and followed during the course of all important battles. Whenever possible maps should be colored in an effort to improve the appearance of the Observers' Room.

Owing to the fact that information of the most secret nature is displayed in the Observers' Room, the rule barring all persons other than pilots and observers should be strictly adhered to. Under no circumstances should other persons be admitted to the Observers' Room without special permission of the Commanding Officer of the group.

NOTES ON LIAISON BETWEEN AIRCRAFT AND INFANTRY DURING ATTACK

FUNCTIONS OF THE INFANTRY AIRPLANE.

During periods of attack, one infantry airplane is, in general, allotted to each Division. The functions of this plane are:

1. To follow the advance of the attacking troops and reserves.
2. To observe signals from the front or most advanced lines and the various P.C. and to transmit them to the Division Commander and, when required, to the receiving stations of the P.C.'s of the artillery, division, brigade or regiment.
3. To transmit to the infantry the orders of the Division Commander, and in general, to keep the headquarters informed of everything that is going on in the neighborhood of the advance line and behind it.

The Infantry Airplane, therefore, has a double mission to assure: first to keep the staff informed of what is taking place, secondly, to act as liaison agent between the troops in the first line and Division Headquarters or, when required, with the P.C.'s or artillery and infantry brigades or regiments. This forms a task of the highest importance and one which is extremely complex and very delicate. It can

be said without exaggeration that liaison with the infantry is the most difficult mission that can be entrusted to an aerial observer. For this reason, it is indispensable, both for the infantrymen and for the aviator, that exercises should be held frequently and as closely as possible approaching the realities of active warfare. The work of liaison with infantry is so extremely difficult and arduous; both for the infantry and the aviators, that the more practice exercises held to familiarize both with the duties to be carried out, the better.

MISSION OF THE INFANTRY AIRPLANE—GENERAL PRINCIPLES.

It is difficult to fix definite limits to the activity of Infantry Airplanes, Artillery Surveillance Airplanes, and Command airplanes. It should not be forbidden to the observer in the Infantry Airplane to spot enemy batteries in action and to signal them to the artillery, or to notify the Command of points particularly swept by the fire of the enemy; nor should it be forbidden to the artillery observer to observe and report matters of interest in our front lines or trenches, but the former is solely responsible for locating the advance of our attacking infantry, whereas the latter is solely responsible for observing, adjusting and directing the fires of our artillery. The observer of the Infantry Airplane has about all he can do to see what is occurring in the neighborhood and behind the foremost lines of the infantry. Without entirely ignoring what is going on on the enemy's side, he should, in principle, only interest himself with OUR OWN infantry. If he fails to confine himself to this, he runs a considerable risk of failing to satisfactorily carry out

his mission and obtain the best results. It is essential that the observer should thoroughly realize this—that what takes place beyond our foremost lines is not his concern; this latter is the mission of the Command Airplane.

MISSION OF THE INFANTRY AIRPLANE—EXECUTION.

The Infantry Airplane flies above our lines, the altitude varying with atmospheric conditions, the nature of the ground, and what the observer is looking for. This altitude, however, should never be more than 1,200 meters and only exceptionally less than 600 meters. Owing to the vulnerability of a low flying observation airplane, it should not descend below 600 meters except in cases of absolute necessity. It is, therefore, advisable that the plane should not keep constantly to the same altitude, as by frequently changing its altitude, it is less likely to be hit by shots fired from the ground. During the course of operation the surveillance of the battle-field should, in principle, begin before dawn and the infantry plane should leave its field while it is still dark so as to arrive above the lines at the first moments of daylight. This is nearly always the most interesting time of day for observation. The results of reconnaissance by Infantry Airplane during a light rain are often particularly valuable for the reason that at such a time, the enemy takes few precautions to conceal himself, generally thinking that he is in complete security from aerial observation.

At the beginning of offensive operations, the Infantry Airplane should not arrive over the lines until a little after the "H" hour, so as not to call the attention of the enemy prematurely to the point and moment of attack. When no attack is planned it is sometimes of value for an airplane to fly over the lines at dawn dropping various luminous signals in order to deceive and worry the enemy.

Fire from the ground by the infantry constitutes the principle source of danger for the low flying observation plane. The best method of contending with this and protecting himself as far as possible, is for the observer to fire with his machine gun as frequently as he can against the enemy trenches and positions. Furthermore, by machine gunning certain suspicious points, the observer often succeeds in making the enemy disclose himself by movements.

MEANS OF COMMUNICATION BETWEEN THE AIRPLANE AND THE GROUND.

1. By radio. The observer signals by radio all his observations, in general addressing himself to the Division report center. He must pay special attention to the rapidity and clearness with which he sends his messages, and he should not hesitate to repeat his message several times until the receiving station gives the signal "understood". It is advisable that the artillery receiving stations should also take any message sent to the Division Report center. Infantry airplane

Radio set installed in a DH-4.

observers should not send by radio any information of which they are not certain. Observations of this nature should be noted on the written message to be dropped at the report center, mentioning, of course, the fact that the information is of doubtful accuracy. All radio messages should be preceded by the call letters indicating to whom the message is addressed. Coordinates, etc., must always be given in code. It is most strictly forbidden for any messages to be sent in clear.

Note: Before leaving the neighborhood of his airdrome, the infantry airplane observer will test the working of his radio with the receiving station of the group (squadron) and will not start off over the line until the latter has notified him by a prearranged signal (a special form of panel, for example) that his radio is working

properly. For this reason, the Infantry Airplane must take off from his field early enough to make this test and, if necessary, to remedy any fault in his radio and still arrive over the lines at the fixed hour.

2. By visual signals and signal lights. The observer carries two sorts of luminous signals:

(a) The projector.
(b) Signal lights of various kinds.

Up to the present time the former method has been by no means perfected, and, although it has many advantages over the light signals, the infantry is not yet sufficiently expert in reading indications sent from an airplane by projector to allow this method to be successfully employed.

Liaison by signal lights presents several disadvantages. In the first place, such signals do not indicate the unit with whom the airplane desires to communicate (for example, they do not show that the observer wishes to call the attention of one certain battalion, rather than any other battalion that happens to be in the neighborhood.) The considerable variety of signal lights which have to be employed necessitate the carrying of a large number of cartridges, with the result sometimes of overloading the airplane. The pistol, unless fixed, is long and inconvenient. It may occur, by a false movement on the part of the observer, by a violent movement on the part of the plane or by bad functioning of the pistol, that the signal light is shot inside, or onto the fuselage or wings of the machine. To guard against this last difficulty, it is desirable that the pistol should be fastened to the edge of the cockpit. An aluminum pistol is preferable, because of the weight to one in bronze. Signal lights should not be fired from an Infantry Airplane at an altitude of less than 300 meters, in order to avoid confusion with similar signals fired from the ground. The pistol should be held vertically.

Before leaving his field, the observer should test the working of his signal pistol. A second pistol should always be carried in case, for any reason, the first one fails to work, and furthermore, in order to permit of two different signal lights being fired rapidly, one after the other. The latter is of value, when, as often happens, the observer is required to send successively "I am the infantry plane of 'X' Division" and "Where are you?"

3. By Sound Signals. This is another method which has not been yet completely perfected, although tests with certain instruments have given good results. Infantry airplane reconnaissance over the positions held by the first lines of our attacking troops being usually made at a predetermined hour, and the Infantry Airplane flying at a lower altitude than any other plane and bearing distinctive marks and letting off identifying light signals, there is little chance that it will fail to be

recognized by the many infantrymen who will be looking at it. It does not, therefore, appear necessary for a sound signal to be employed in this case. On the other hand, sound signals are practically indispensable in the case of airplanes wishing to inform the P.C. that they intend to drop a weighted message, because particularly if the P. C. is under shell fire, the vigilance of the look-outs cannot always be relied upon. If the plane is not equipped with a klaxon horn, or some other type of sound producing instrument, a peculiarly timed burst of machine gun fire, several times repeated, if necessary, will usually have the same effect.

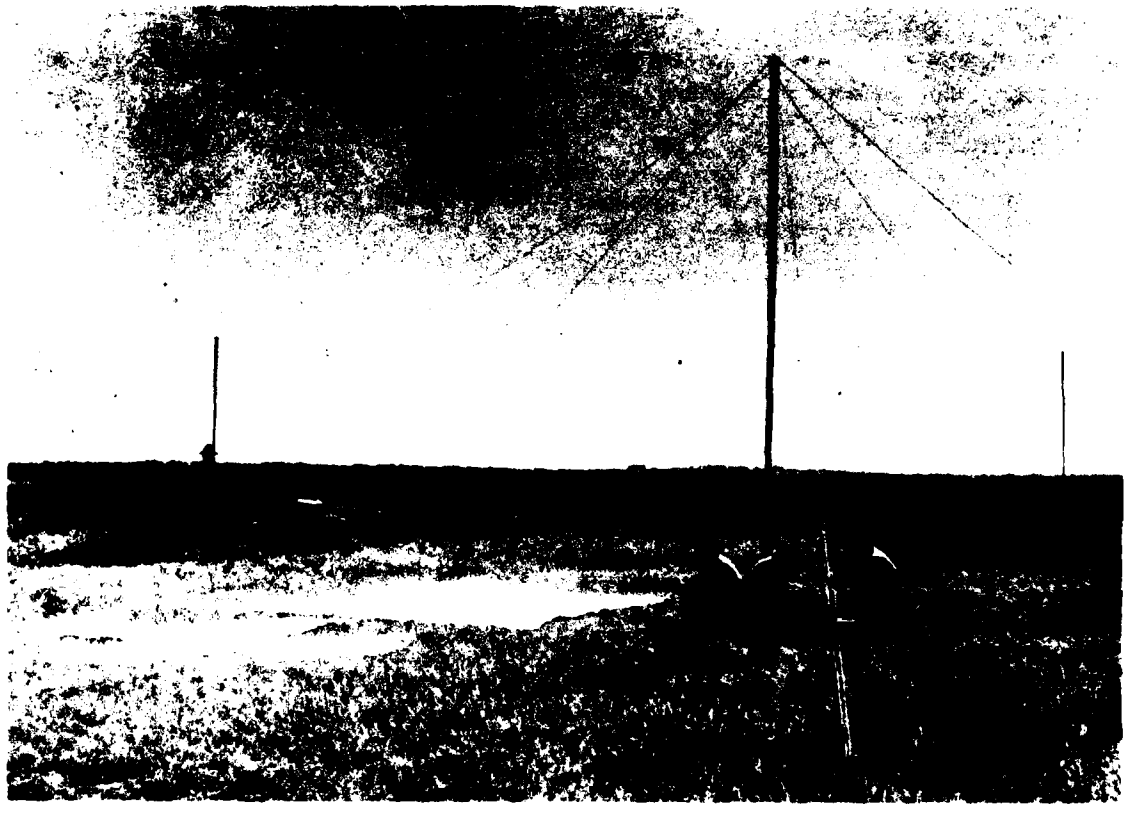
4. By weighted message. Weighted messages are especially valuable for the purpose of confirming and completing the information already dispatched by radio or by various light signals. Weighted messages are dropped at the P. C.'s of Army Corps and Divisions and but exceptionally to P. C. of infantry regiments. Weighted messages should never be dropped to advanced units for orders or information addressed to the P. C. of a battalion for example run a considerable risk of falling into the enemy's hands. It is necessary for observers to practice dropping weighted messages from a height of at least 200 meters until they are able to drop them with the greatest precision.

Written messages and maps showing the location of Bengal Fires P. C.'s etc. should be made in triplicate (one copy to be dropped at Division P. C. or report center, one copy at Army Corps Report Center, if required, and one copy retained for the Squadron Commander). Before leaving the airdrome the three copies of the map, with new carbon sheets between should be carefully affixed to an aluminum back and kept in place by gummed corners and by surgeons tape around the edges. The same is done with the message forms. The observer indicates in pencil on the map the location of our front line and P. C.'s as shown him by Panels, Bengal Fires, etc., and any other observations of interest, noting the hour. When he has completed his mission, he pulls off the tape, and takes off one sheet of the map, rolls it up, and puts it in the Div. P. C. The second sheet is similarly taken off and placed on the message carrier for the Army Corps P. C., and the third is left attached to the board by means of a clip. The same is done with any messages that the observer may have written out.

MEANS OF COMMUNICATION BETWEEN THE GROUND AND THE AIRPLANE.

The Infantry Airplane Observer receives signals both from the most advanced lines and from the Staff (generally the staff of the Infantry Division).

1. Communication with the most advanced line. Units of the most advanced line (excluding both patrols sent further out and units



A radio field station with panel markers.

in support or reserve further back) signal their location by—

(a) Individual panels (one for two men).
(b) Bengal fires.
(c) Projectors.
(d) Signal lights.
(e) Various make-shift methods such as mirrors, pocket torch lights, handkerchiefs, over coat linings, etc.

At the demand of the Infantry Airplane, or at an hour prearranged by the Staff, or at the initiative of the Company Commander or the Commander of any other unit, when his unit can no longer advance, or when after having been obliged to retire he has succeeded in holding his ground—the infantrymen lay out their individual panels. If the infantry airplane observer fails to see the panels, or has difficulty in distinguishing them, he repeats his signal of identification "I am the Infantry Airplane of 'X' Division" and the question "Where are you?" and thereupon the signals of the infantry must be made by Bengal fires.

(a) Panels.

In case of individual panels, because of their small dimensions, it is indispensable that they be placed together in groups of at least three or four, in order that the observer may see them clearly. Furthermore, it is necessary that they should be waved or moved about at the right moment in order to attract the observer's attention—the right moment being when the airplane has passed slightly beyond a point directly above the signalers. The observer will do his utmost to reduce to a strict minimum the time necessary for him to note the positions shown by the signals, in order not to keep the attention of the infantry for too long a time and to avoid, as far as possible, that the enemy should be able to locate our line. On the other hand, infantrymen should wave and move about their panels for a time sufficient for the Infantry Airplane Observer to properly locate them. It is extremely difficult for anyone on the ground to determine the exact moment at which an airplane passes vertically over him, and it is certainly better for the panels to be shown a little too long than not long enough. However, if at the end of ten minutes, the Infantry Airplane has not given the signal "understood", the panels should be rolled up.

It is necessary to insist on the very important point that the panels when laid out must be "living", that is to say, continually moved about or agitated, and not merely unrolled and left lying. If this is not done, it is likely to give rise to errors of the greatest importance, for immobile panels are very apt to give erroneous, or at least uncertain indications to the observer, being easily confused with other things and not informing the observer whether or not they are the locations of the most advanced line.

Individual panels should be placed in such a way as not to be visible to the enemy, i.e., inclined on the parados of a trench, hidden in shell holes, or behind a slight rise of ground, etc. It is strictly forbidden to anyone not in the most advanced line to signal his presence by means of individual panels. This does not, of course, apply to battalion P. C.'s whose identification panels should be laid out as soon as the Infantry Airplane sends his signal "Where are you?" The laying out of the battalion identification panels is often very useful to the airplane observer, especially when he has no clear idea of the approximate location of the most advanced line. Similarly, and for the same reasons, it is desirable that regimental P. C.'s should lay out their identification panels when the Infantry Airplane sends his signal "Where are you?" (this is formally ordered in the French Instructions of the 28th December, 1917, page 26 Panvoi I).

Care must be taken to prevent the panels from becoming dirty. It is recommended that they should be carried in cloth cases or sacks to protect them from mud and dust.

(b) *Bengal Fires.*

The panels have the serious inconvenience of being invisible, or nearly so, against a light back ground, such as clay soil broken up by shell fire, or when they become soiled and are no longer a brilliant white—which is nearly always the case.

Bengal fires, on the contrary, are always visible against no matter what background, and constitute certainly the most satisfactory method of signaling from the ground. It is, however, important they should be concealed from the view of the enemy, while, at the same time, being clearly visible to the observer in the airplane. For this reason they should be placed behind a screen, or at the bottom or on the forward slope of a shell hole, etc. The same way as in the case of the panels, the Bengal fires should be placed out in groups of three or four so as to be more visible to the airplane observer.

(c) Projectors.

Projectors can hardly be considered as a means of signalling the location of the advanced lines, but they can be very usefully employed to attract the attention of the airplane observer. They possess the advantage of being able to be employed without attracting the attention of the enemy and, furthermore, of being the more visible the worse is the visibility. Well handled, they should render excellent service, but it is essential that the signalers with the infantry be very skillful in following the airplane. The present number of projectors authorized for a battalion (14) is considered to be scarcely sufficient and should be added to. Furthermore, in order to simplify the handling of a projector to as great an extent as possible, it is desirable that the rays should be slightly diverging. It is desirable that the signalers carry spare batteries and lamps.

(d) Signal Lights and Smoke.

Signal lights sent up from the ground give only a very vague indication of the point from which they were sent (not within 50 to 100 meters) and, therefore, are of little value to anyone desiring to signal "I am here". As for smoke signals, these are practically useless during battle as it is almost impossible to distinguish them among the shell-bursts.

(e) Make-shift Methods.

Handkerchiefs waved in the air, overcoats turned inside out, so that the lining is exposed, and waved, pocket electric torches, mirrors, etc. directed toward the airplane, etc., etc., are very ineffective and give very poor results, but they should not be forgotten in any special

circumstances when other regular methods of signalling are, for any reason, not available.

At present, with the apparatus available for receiving radio messages by an airplane, the results are so uncertain that it is hardly worth considering this method for signalling from the ground to the airplane in connection with liaison with infantry. For an observer to be encumbered with the radio receiving helmet and constantly obliged to look at his lamps and mess about with the handles, would seriously interfere with the efficient performance of his mission, which requires concentrated observation of what is going on below him.

2. Communication With Staffs and Headquarters. The various P.C.'s indicate their locations to the airplane observer by means of the different identification panels described in Annex 4 of the instructions of 28th December, 1917. These panels are laid out at the discretion of the P.C. in order to attract the attention of the airplane, or at a certain hour, arranged before-hand, or by order of the higher command, transmitted to the P.C. by the airplane in the same manner as to the most advanced line. The panels should be taken in as soon as the airplane has given the signal "understood."

It is of course, possible for the P. C.'s of the Corps Commander or Division Commanders to communicate by radio with any airplanes which have receiving apparatus on board, but it must be remembered that this procedure practically results in making the observer both blind and deaf to everything else during a comparatively long time when it might be more profitable for him to be employed in observing what is going on beneath him. All P. C.'s may communicate with the Infantry airplanes, either by means of optical signals or with the rectangular panels of the P. C.'s as described in Annex 4, and employing the conventional signs used in Annex 8 of the instructions of December 28th, 1917. In general, optical signals should be repeated and panels left in position until the airplane has given the signal "understood." To avoid enabling the enemy to locate the P. C. it is preferable, if possible, that the observer should give the signal "understood" by projector.

PREPARATIONS FOR LIAISON WITH INFANTRY

The missions of Infantry Airplanes and Command Airplanes can only be carried out effectively when the observers are thoroughly trained and have a complete knowledge of the plan of the operations or, as the case may be, of the defense. In case of a necessary retirement of our troops, the observer should know our own successive positions quite as well as the enemy's lines. It is therefore, indispensable that the observers should personally visit the Commanders of the various infantry units, down to and including Company Commanders, at least, with whom they will have to work, that these visits should be

held in the trenches; that the observers should look over the ground of operation from the first line observation posts, and that they should work out on the spot with the various Commanders, the details of the missions which they will be called upon to fulfill. Delicate liaison of this nature can only be efficiently accomplished when each party thoroughly understands the other, and the only way that this can be arrived at is for each one to thoroughly know the other. No opportunity should be lost of improving the relations between the observers and the infantry officers, both when the latter are in the trenches and especially—because then they are less occupied with other duties—when they are on rest. The habit of close cooperation in working together must be encouraged to the greatest possible extent.

PRACTICE EXERCISES.

The more practice excercises of aerial liaison with infantry that can be carried out, the better. It is impossible to overdo it. In the course of these exercises every one must endeavor to simulate, as far as possible, the conditions that will be met with during the actual attacks. The airplane should fly rapidly above the positions and, from time to time, fly off as if he were driven by hostile aerial attack, or forced away by clouds or other climatic conditions. The observer should strive to observe from the highest altitude possible. The infantrymen must handle their signalling apparatus exactly as they would do under the conditions of an attack and as if they were continually harrassed by enemy fire, etc. The men handling the projectors must strive to follow exactly the course of the airplane until the latter has given the signal "understood," or has repeated his call signal. (With regard to the training of the projector signallers, in addition to that carried out in exercises in cooperation with our aircraft, the signallers should, on all occasions, endeavor to follow with the projector any airplane that may pass over them, without, of course, lighting the lamp of the projector.)

If possible, during the course of the practice exercises, several airplanes should fly over the troops at the same time, only one of which acts as the Infantry Airplane and gives signals. This serves the double purpose of training several observers at the same time, and of accustoming the infantrymen to pick out their own plane from among a number of others. During the exercises the observer should precede all his radio calls by the call *e* (.._..), or *ex* (._.._).[d] Coordinates sent by radio should be given in code, but in an obsolete code and not the one actively in use. The code signals actually in use for list No. 2 of the signals between an airplane and the infantry instructions of December 28th, 1917, should not be used for practice exercises.

In order that observers in the event of an advance should not find themselves handicapped by the lack of large scale maps (Plans

Directeurs) it is advisable that in exercises of liaison with the infantry they should practice both with the Plans Directeur and with maps of 1/80,000.

RETURN FROM LIAISON.

The maximum return from liaison with the infantry will only be obtained when every infantryman is thoroughly convinced of the value of the aid that can be given him by the observer in the airplane. It is indispensable to create in the infantry the spirit of the knowledge of the absolute necessity of infantry liaison and its undeniable utility.

ADJUSTMENT OF ARTILLERY DURING ATTACK AS CARRIED OUT BY 1ST ARMY CORPS, 1ST ARMY.

A battalion will be kept continually at the disposal of the airplane, to be called directly by the observer, whenever he sees a target: battery, convoy, concentration, etc.

The nature of the target will be given, and its location designated by co-ordinates of four numbers, using the letter co-ordinate code (actually now No. 323). The message will end with the signal "REG."

After the panels "understood" and "battery is ready" have been shown, a rapid adjustment by Salvo, each gun firing with one second interval, will immediately follow, and be continued at the command of the observer until the officer in charge of the battery obtains a bracket and correct deflection allowing him to effect an efficient neutralization fire.

During the adjustment the observer will send the mean point of the salvo in relation to the center of the target with reference to a line joining the wireless station panel to target. The end of the adjustment will be indicated to him by the panel "No further need of you," or "zone fire."

If, during his flights, the observer locates several targets, he will select the one of most importance and adjust on it with the Battalion designated as above. The other targets will be sent to P.C. Scott (without signal "REG") and will be fired upon without immediate aerial observation. However, it is understood that should the observer see the firing executed on those targets, he will report the results to P.C. Scott by sending the mean point of impact in relation to the center of target, using the signals "North, East, South, West." This information will be preceded by co-ordinates of the target to which they refer.

If, for any reason, the Battalion designated to adjust with the airplane is not able to fire at the target which is sent to it, it will answer by panels "No." Then the observer will call P.C. Scott and send it the nature and co-ordinates of the target followed by signal "REG." P.C.

Scott will immediately designate a Battalion to take up this adjustment and will display the identification panel of this Battalion with the 3 rectangular signal panels indicating the direction of this Battalion's P.C. The observer will thus be able to call and locate the Battalion with which he will have to work, and will send the nature and location of target followed by "REG." The adjustment will then begin.

Except in case of absolute impossibility:

1. The Battalion (see first paragraph this agreement) will be designated to adjust with airplane for three days. It will have during this period and on suitable days for flying, its radio operator listening continually from 6:00 to 10:00 A.M. and from 4:00 to 8:00 P.M. and will be ready to answer at once any request of the plane for firing.
2. For these two periods the squadron will furnish two surveillance flights of two planes each.
3. P.C. Scott will listed *in all the time* on suitable days for flying.

It is very important that the aviation shall always be immediately informed of any changes of all sorts which may occur in the artillery situation.

For this reason an American observer will be continually at P.C. Scott. He will inform the squadron designated to work with the Heavy Artillery of the Army Corps by messages sent by wireless (undamped waves) from P.C. Scott or the P.C. of A.C. and also immediately by telegram to C.A.S., 1st A.C., U.S., of all changes which may come or have come, *above all* those affecting battalion designated to adjust with airplane.

These changes will generally be indicated to him six hours before they take place.

The wireless (undamped waves) messages will be coded with code Chiffre No. 62 and sent from the A.C.H.Q. to the interested squadron each day from 8:00 to 9:00 P.M., the squadron's radio operators listening in during that time. The days when there are no changes the liaison officer will send "RAS."

Observers are reminded that they must send continually the indicative of the receiving station when they start calling it.

The receiving stations are to display the "Understood" panel only when the adjustment of their receiving set is perfect.

This method of working will go into effect on the 4th of August.

The Battalion assigned for adjustment is the 2nd of 146th F.A.

The squadron working for Corps Artillery will be Breguet 237. The wireless call of this squadron is "U K 3" (previously assigned to 88th Aero Squadron transferred out of the A.C.)

Arranged by mutual agreement between Colonel Scott, Commander of Corps Artillery, and Major Brereton, C.A.S., 1st A.C., U.S. on the 1st of August, 1918.[e]

Shell burst.

Pursuit

1. The Group Commander will dispose tactically of his forces in order to cover the instructions or orders issued by the Army to which the group is attached.

2. All tactical work in pursuit units will be performed in formation, the size of these formations varying in accordance with the situation, the mission, and the enemy's dispositions.

3. The formation of five or six planes, i.e., the flight, will be the basis of all tactical operations. In order that the tactical efficiency of the several flights may reach maximum, it is advisable that the pilots live together on the ground as much as possible and in addition, work together in the air at all times. Formations of five or six planes are extremely manouverable and at the same time can be controlled to the best advantage by a single patrol leader. It is probable that of a flight of six planes and pilots not more than five will be available for duty on any given day. Where the mission requires a greater number than five or six planes, two or more flights acting independently, but in liaison with one another, will be employed.

4. Either one of the following methods may be employed for the formation of flights, depending upon the direction of the wind and the size of the landing field:

(a) Formation leaving the ground—The patrol leader takes off first, flying at less than full speed and the others follow him in order. When the patrol leader has reached the approximate altitude which he has set before-hand for formation, he will make a half circle and return over the flying field. Each pilot then taking up his appointed place. Upon passing over the flying field, the patrol leader can determine the number of planes which have been unable to take off.

(b) Formation over a selected spot—This method of forming patrols is especially useful when several patrols are to take off at the same time. In this case, the patrol leader is the last to take off and the deputy patrol leader the next to last. The altitude of assembly is fixed before-hand and depends upon the mission, ceiling, etc. It is never greater than 2000 meters. Otherwise, the planes are likely to become dispersed before the patrol is formed. The assembly point is a few kilometers from the flying field, never more than ten, over some striking land-mark. Upon arrival at this point, each pilot makes left-hand turns, while climbing, until he has reached the designated altitude which he must maintain precisely. The patrol leader climbs to an altitude of 200 meters below the patrol and describes right-hand circles. When he considers it proper, he turns toward the lines flying extremely slowly and balancing his wings to attract attention. The other pilots then assume their places. If no airplane is seen turning to the right below the patrol, the deputy

patrol leader flies to the flying field to ascertain if the patrol leader has been unable to take off. A ground sheet signal gives the indication. If the patrol leader has been unable to take off, the deputy patrol leader assumes the leadership of the patrol.

5. All formations should comprise a double echelon in depths and in altitude, the planes at the rear being highest up so that they can take advantage of their altitude to close in on the patrol leader by diving, in case of necessity. The usual formation is that of an inverted "V", the patrol leader at the head. Number two and number four on his left rear and number three and number five on his right rear; number two and number three should be about 200 meters apart and about fifty meters above and to the rear of number one. Number four and number five should be about 400 meters apart and about 100 meters above and to the rear of number one. When the patrol is composed of six planes, number six takes position above, behind and to the left of number four, or above, behind and to the right of number five.

6. In formations of several flights, the same principle is employed. The flight leader of the entire formation flies at the head of the leading flight. One flight behind, above and to the left of him and another flight behind, above and to his right.

7. Single flight combat—The patrol leader determines the advisability of combat. He will be permitted a considerable latitude in making his own disposition when the combat is joined. As a rule planes number four and number five of his formation will remain above to afford protection from enemy planes, which may be in the vicinity. The patrol leader himself will always lead the attack. In the attack, team-play leads to victory. It is, therefore, essential that all members of one flight shall talk over on the ground and practice in the air the evolutions, which the Flight Commander will use in attacking different types of enemy aircraft.

8. In case of a combat when several patrols are flying together and a large force of enemy planes is sighted, the leader of the forward and lower flight will determine what action to take, the leaders of the other flights guiding on him. In such cases, it is generally preferable to attempt to attack the rear man of the enemy formation. The inability to manoeuver formations of more than five planes, makes it possible to throw the enemy into confusion and to attack his planes separately. The attack by the formation leader upon the leader of the enemy's formation should, as a rule, be avoided unless the formation leader is confident of possessing superior material. The attack by the leader of the formation upon the leader of an enemy formation invariably leads to a melee in which both formations become separated, which is difficult to break off inside the enemy's lines and which simply becomes an engagement of individuals.

9. The rally—After a combat every effort should be made to regain

the formation as speedily as possible. This is easy to accomplish inside our lines if conspicuous land-marks are designated before-hand within four or five kilometers of the line. Within the enemy lines, the rally is far more difficult to execute. In this case, each pilot will fly toward the fixed rally point, within our lines, but will watch at all times to give assistance to any of our pilots who appears to be in trouble. When the rally point has been reached, patrol reforms in accordance with the principles laid down in paragraph 4(b).

10. In making disposition of his forces, the Group Commander will endeavor at all times to keep in hand a mobile reserve of airplanes capable of taking off in a few moments to counter-attack any increased enemy aviation over our front, or to re-inforce our patrols on the front, in case ground activity makes increased aerial activity advisable.

11. In sectors where general conditions render it safe to install the pursuit airdrome very close to the front lines, 20 to 25 kilometers, it should be possible to arrange a very close liaison with the front, the anti-aircraft artillery, the goniometric stations, etc. In such cases a number of planes to be determined by circumstances, always at least one flight, will be held on alert, ready to take off and attack every enemy plane crossing our lines, and every enemy 'plane making adjustments close to its own lines. Under these circumstances, flights will perfect themselves in taking off quickly and getting into formation immediately. In answering "alert", of this character, speed in leaving the airdrome and taking up formation is of paramount importance.

12. Alerts of a character requiring instant response should come into the office of the Group Operations Officer. He will decide whether or not the alert is to be answered, bearing in mind the number of planes instantly available, the number, type and probable mission of the enemy planes reported, their altitude and direction of flight. He will transmit the alert to the flight or squadron which is standing by to respond to such calls together with his estimate of the situation. The Flight Commander on duty will, as a rule, decide the number of planes which will actually be used to respond to an alert transmitted to him, but the Group Operations Officer should be authorized to give orders on the subject in the name of the Group Commander regarding the number of planes to respond if, in his judgment, orders are necessary.

13. After a patrol leader has left the ground, he is responsible for carrying out the patrol's mission. He should be permitted complete independence of judgment in the leading of his patrol, and in exceptional cases, may depart from the designated route if the situation makes it advisable. The Group Operations Officer is responsible that complete information is given to the Squadron Operations Officer relative to every mission and in exceptional cases, he will explain the objective of the mission to the patrol leader personally. The patrol leader will only depart from the mission assigned to him in such cases as this appears to be essential.

Day Bombardment

1. The mission of day bombardment aviation is two-fold:

(a) To destroy and harass the rear areas of the battlefield, and to attack military and industrial objectives beyond the range of artillery.

(b) To cause a dispersion of enemy anti-aircraft defense (anti-aircraft guns, pursuit patrols, etc.)

2. Aerial combat is not an incident to day bombardment but is one of its integral and most important phases. A close coordination must exist between day bombardment units and pursuit units. To this end, one or more pursuit groups and one or more day bombardment squadrons or groups will always be combined together, under a unified command, into a combat wing.

The targets for day bombardment will be designated by G-3 which will transmit them to the C.A.S. of the Army. He will see that the pursuit and day bombardment units work together to achieve ascendency in the air. In case a combat wing is attached to the army, the wing commander will despatch his bombardment and pursuit units to cover such areas as well give the best opportunity for gaining contact with the enemy aviation and defeating it, driving it away from the line of battle on the ground, and causing the maximum number of casualties to its forces.

3. Day bombardment expeditions will invariably work in formation but as there is always a likelihood of an airplane becoming separated from the formation, bombing crews should be thoroughly trained in single combat against pursuit patrols. In the course of such a combat the pilot will do little shooting but will exert his efforts to place his gunner in a favorable position. He will avoid any regular manoeuvres, such as regular spirals or straight dives, he should fly a crooked course and try to watch his bomber so as to place the latter in a position where he can shoot to the best advantage. If the enemy plane gets into a position where it can shoot without being shot at, the pilot must do everything possible to spoil its aim. A climbing turn made very steeply toward the side on which the machine gunner is carrying his weapons, is the best manoeuvre as it will allow the observer to use his guns.

4. Day bombardment formations must have the following characteristics:

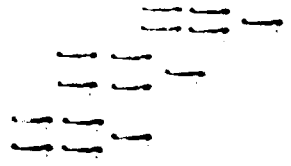
(a) Simplicity.
(b) Leave no dead angle.
(c) Concentrate fire to the rear.
(d) Allow of quickly closing up the formation on the leader.
(e) Allow every airplane to see the guide.

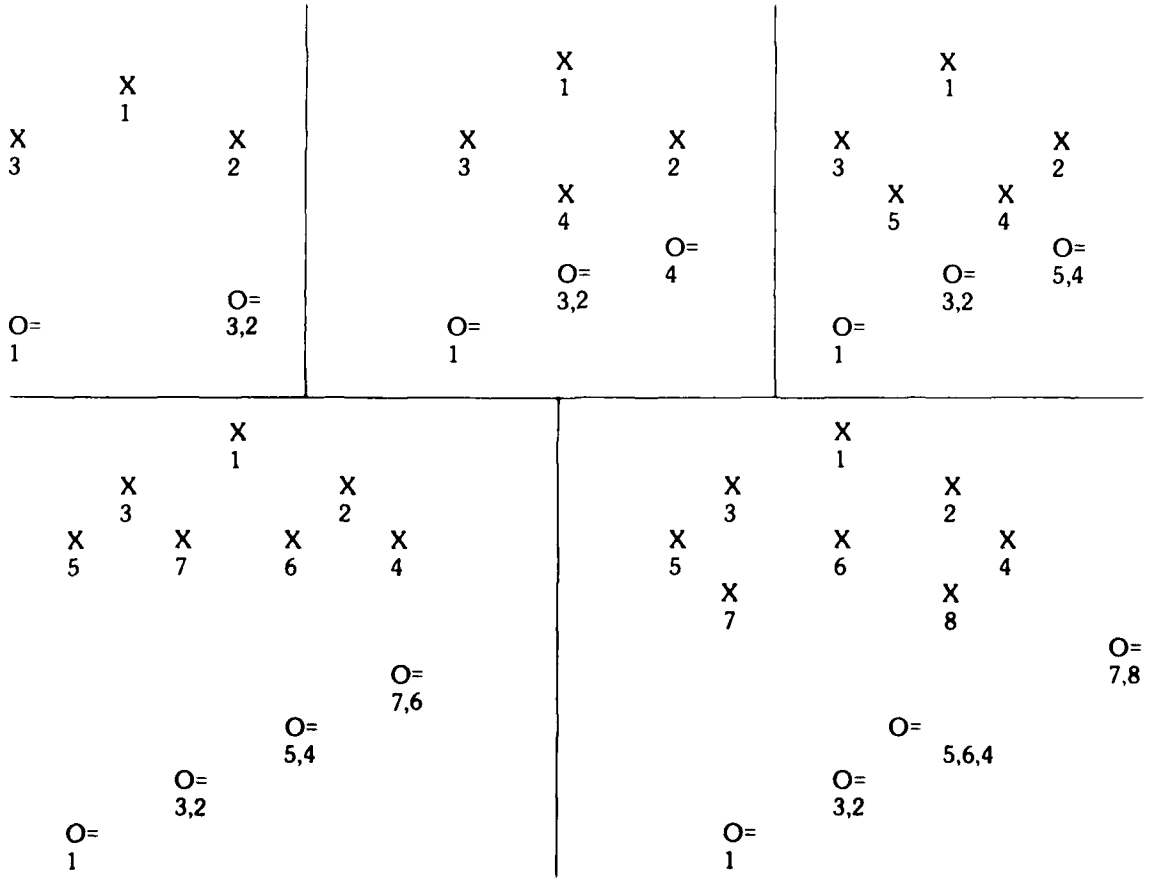
5. The following diagrams show the best formations for three, four, five, six[sic], seven and eight airplanes. No. 1 is the guide.

6. When more than eight planes form one formation, the

difficulties of leadership are too great. Very large formations reduce too much horizontal speed and climbing ability. If more than eight planes are to be used, several formations should be used.

7. Formations should be as tight as possible. Especially when dropping projectiles and during a combat, formations ought to be well closed up, and too much emphasis cannot be laid upon this point in the training of day bombardment pilots. If the pilots maintain a regular echelonment in height, they can close up quickly on the guide in case of emergency by diving a little. The guide will never open his throttle wide; observers will keep their pilots informed whenever their own or any other plane appears to be getting out of formation.





FORMATION OF PATROLS

8. Whenever the landing field is big enough the formation is made up on the ground, the pilots having first warmed up their engines. If there is not enough room for this procedure, or if several squadrons are leaving about the same time planes will take off in the order of their numbers in the formation, each plane beginning to taxi when the wheels of the preceding plane leave the ground. Number one throttles down dead slow as soon as he has altitude enough to do so safely, and he keeps going slowly until all planes are in place. He may then take up his travelling speed—never full speed. In formation flying with formations of day bombardment airplanes, the only manoeuvre practicable is an "S" on an extremely wide radius—at least 5 kilometers.

COMBAT

9. The normal combat of day bombardment units is a fight between a day bombardment formation and enemy pursuit planes which attack it. Observers must watch the sky at all times for enemy aircraft. When an observer sees them, he makes a signal agreed upon before-hand, which is repeated by all the other observers. All the observers try their machine guns. Number 1, on learning that enemy aircraft are in sight, slows down a little and the formation tightens up as much as possible. The pilots must make every effort to keep in formation and to keep the formation compact. Under no circumstances will they be permitted to attempt any individual manoeuvre.

10. In the course of aerial combat it will often be found that the mass of enemy pursuit airplanes simply create a demonstration by manoeuvring and shooting at long range while two or three climb above and then dive down in an effort to separate one of the bombing planes from his formation. Day bombing observers are cautioned to keep a sharp lookout at all times for such attacks.

BOMBING THE TARGET

11. The formation will not be broken up or thrown out of shape in passing over the objective, but will be tightened up as compactly as possible. Sighting errors thus produced are negligible considering the scattering of the projectiles and the average size of day bombardment targets. Adjustments of line of flight are made by the flight leader only, but each observer will use his own sights to determine the moment when he will drop his bombs. As a rule, airplane number two or number three, or both, will carry cameras. After having dropped his bombs, the leader of the formation will continue straight ahead for about one kilometer and then turn in a big circle, taking care not to speed up.

MANOEUVERING SEVERAL FORMATIONS

12. When several formations are directed against the same objective at the same time they will keep in sight of one another as a rule, with a slight echelonment in height from front to rear, but there is no leader of the whole formation, properly speaking, as each formation leader is responsible for leading his formation.

PREPARATION OF EXPEDITIONS

13. In case of emergency, a day bombing expedition should be able to get off very rapidly. This is not difficult as only formation leaders must know the exact route to be followed. For the other pilots and observers, a sketch of the objective and a general knowledge of the terrain, so that they can get back to our lines in case of accident, will suffice.

14. When the objective does not have to be kept secret until the very last moment every crew should receive detailed orders giving all available information about:

(a) the main objective,
(b) the route
(c) secondary objectives
(d) regions to be observed or photographed.

15. Objectives are transmitted to the Group Commander Day Bombardment Group by the Chief of Air Service either direct or, in case one is formed through the Wing Commander, Army Combat Wing. Unless ordered by higher authority the Bombardment Group Commander orders:

(a) the number of formations and the number of planes in each
(b) types and weights of projectiles
(c) the route, altitude, order of departure of each formation.

His order will also explain to his Squadron Commanders the method of pursuit co-operation.

16. Squadron Commanders detail the crews and airplanes to take part in the expedition and designate in every airplane the pilot or the observer who shall be in command. They designate formation leaders and deputy formation leaders and the position of every airplane in the formation. They order every crew to prepare sketches of the objective and are responsible to supervise their preparations.

17. It will frequently occur that modifications have to be made in squadron orders at the last moment because of airplanes going out of commission, etc. Nevertheless, they should always be made out in advance in writing so that the crew of every airplane can get an opportunity to study their role.

ORDER OF EXECUTION

18. As soon as he is able, the Day Bombardment Group Commander will give the order of execution which will designate:—

(a) hour of departure
(b) the officer in charge of the flying field.

This order cannot be given until a study of meteorological data renders it evident that the weather will make the expedition possible.

19. As soon as this order is received pilots and observers will get their planes ready, try their motors, inspect bomb sights and bombs, machine guns, etc. The officer in charge of the flying field will see that all airplanes are properly placed on the airdrome and ready to take off thirty minutes before the departure of the expedition.

OPERATIONS OFFICER

20. In a day bombardment group the Group Operations Officer will also act as G-2 representative. He will:—

(a) Compile and keep available for the Group Commander all information which may be useful.

(b) Keep a file of all photographs and a stock of maps. Also maps of the sector (1 to 100,000 or 1 to 80,000) and a map of the whole front (1 to 200,000) will be posted

(c) Keep a bulletin board on which will be posted all orders of interest to pilots or observers of the group; all bulletins from the Army or from its Corps or divisions; a map of our own airdromes; a map of the enemy airdromes.

(d) File the flight reports of each crew interrogating himself the pilots and observers for additional information and transmitting the information obtained to the Intelligence Section of the Army Staff.

(e) Be in charge of the photographic service and be responsible for the development of all plates and the printing and distribution of a sufficient number of photographs.

21. The Group Operations Officer should receive from the Army C.A.S. charts and intelligence showing bombing targets. He should keep duplicate copies of these, marking one of them daily with a report of the bombardments effected.

22. The Group Operations Officer must also keep up at all times all available information about batteries of enemy anti-aircraft, enemy airdromes and the number and identity of squadrons which occupy them. The photographs taken by the bombing group itself will often go far towards establishing the whereabouts of new airdromes and the occupation of old ones.

23. In an attack a day bombardment group may furnish valuable information as a result of bombardment from low altitudes upon:-

(a) Airdromes
(b) Enemy works
(c) Movement of enemy troops
(d) Location of enemy troops.

24. It is the duty of the Group Operations Officer to take care of the liaisons of the group i.e. in addition to his liaison with the Army Chief

of Air Service and Army G-2 and G-3 he should act for the group commander in insuring the detail of the liaison with the Pursuit Group unless there is a combat wing. He should notify the Pursuit Group of the Bombardment Group's plan of operation stating as long in advance as possible the hour, altitude and route of return of all expeditions.

Night Reconnaissance

1. Night reconnaissance has for its object:

(a) The securing of information of movements of enemy troops into positions for attack, defense, retreat, etc. The success of the enemy offensive prior to July 14th, 1918, was due to the secret concentration of enemy troops by night. It is, therefore, imperative that the routes available to the enemy for moving his troops should be reconnoitered thoroughly and frequently at night due to the fact that the most perfect day reconnaissances will often fail to disclose any abnormal movements.

2. A night reconnaissance unit should be assigned for duty with an army or one of its corps.

3. The duties of the various officers of a night reconnaissance unit are outlined below.

UNIT COMMANDER.

The duties of the Unit Commander are to see that his subordinates perform the duties assigned to them. He is responsible for the activity and efficiency of his unit.

STAFF.

In addition to the the pilots and observers and the necessary enlisted personnel, the Unit Commander will be assisted by the

following officers:-(a) Operations Officer, (b) Supply Officer, (c) Engineer Officer, (d) Adjutant, (e) Branch Intelligence Officer.

(a) Operations Officer

The duties of the Operations Officer attached to a night reconnaissance unit will be to advise the Unit Commander on all tactical matters. Upon receipt from G-2 of the Army to which the unit is attached of orders for the missions for any given night, he will prepare a schedule designating pilots and observers and the hours over which each of these routes will be reconnoitered. This schedule will become effective when issued as an Operations Order by order of the Unit Commander. The Operations Officer will have charge of the landing lights, searchlights, etc., on the ground. He will have these lighted (a) at the hours specified by the Unit Commander for planes to leave the airdrome, (b) whenever a plane overhead gives the correct signal for landing. The Operations Officer will procure all available information of the enemy's rear areas including rail-heads, routes of transports detraining points, billetting areas, camps, depots, anti-aircraft divisions and airdromes. The Operations Officer is responsible to see that information obtained by the unit in the course of a night reconnaissance is prepared without delay for the Branch Intelligence Officer. He will also make a daily report of operations to the Chief of Air Service of the Army under whom he is operating, which will include routes, hours of flight and any information of the enemy's air service procured. He is responsible to see that before leaving the field, every pilot and observer understands the correct landing signal for the day.

(b) Supply Officer

The duties of the Supply Officer will be to requisition for and procure the supplies necessary for the unit. This will include Quartermaster and Commissary supplies for which he will establish the necessary liaison with the Chief Quartermaster of the Army to which he is attached. In addition, he will establish the necessary channels for securing technical, Ordnance and Air Service supplies, either through the nearest air service park or depot or direct from the Services of Supply. Before having dealings direct with the Service of Supply, the Supply Officer will obtain the approval of the Chief of Air Service of the Army. The Supply Officer will scrutinize the requests of the various pilots for supplies for their respective airplanes and of the Engineer Officer for such additional supplies as he may deem necessary to keep in stock. The Supply Officer is responsible for all the unit's transportation, its maintenance, upkeep and repair. The Supply Officer is responsible to the Unit Commander, who must approve all requisitions, etc.

(c) Engineer Officer

The Engineer Officer will supervise the work of the several aero sections and the method of the mechanics assigned thereto. He will keep on hand at all times a sufficient reserve of spare parts and electrical material, i.e., dynamo spares, searchlight spares, landing flares, etc., as will meet the immediate needs of the unit. The mechanics assigned to the several aero sections are directly responsible to the pilots, but the Engineer Officer will oversee all work that is done and will familiarize himself thoroughly with the various pilots so as to be able to distinguish between those requests which are based on imaginary needs. He will advise the supply officer relative to such requests.

(d) Adjutant

The adjutant is charged with the Administrative work of the unit. His duties are similar to the duties of the Adjutant in any other command.

(e) Branch Intelligence Officer

A Branch Intelligence Officer will be detailed by G-2 of the Army for duty with every night reconnaissance unit. This officer will see that all information obtained is transmitted to headquarters without delay. He will make out routes covering points of concentration and the main arteries of movement in the enemy's rear areas, and he will transmit the orders for reconnaissance missions from G-2 to the Unit Commander.

—7—

By 15 August, First Army had developed a plan for the reduction of the St. Mihiel salient. It involved the use of 25 American and French divisions (including reserves), with the main attack being on the south side, a secondary attack on the west, and holding attacks in the center of the salient. The attacks from the south and west were to penetrate the Hindenburg Line with the two forces joining in the middle on the Etang de Lachaussee to close off the salient. On 16 August, First Army received orders from GHQ AEF to prepare to attack before 11 September.

Mitchell's plans for the battle, submitted four days later, were built around the idea of concentrating Allied—French, British, and American—air power in a single force for use in coordinated tactical and strategical operations.

Headquarters, Air Service
First Army
August 20, 1918

Memorandum for
Commanding General,
1st Army.

The employment of aviation in the proposed attack is divided into four phases:

I. Preparation.
II. Night preceding the attack.
III. Day of the attack.
IV. Exploitation.

I. Preparation:

a) In order that the attack be made by surprise it is important that the aspect of the sector be not changed.
b) The general mission of aviation (in I.) is to—
   1) Absolutely prevent access to our lines by enemy reconnaissance aviation;
   2) Secure complete information about hostile formation by means of photo missions and night reconnaissance without arousing the suspicions of the enemy.
c) Mission of pursuit aviation in I—
   1) Constant patrol on our lines in order to procure an absolute barrage;
   2) Usual offensive patrols in order to maintain the normal activity of the sector.
d) Mission of bombardment aviation: Normal work of the sector.
e) Mission of observation aviation—
   1) Maximum photographic reconnaissances;
   2) Night reconnaissance when the enemy movements are suspected.

II. Night Preceding the Attack:

a) Mission of bombardment aviation; during the whole night preceding the attack:
   1) Attack by high explosive bombs (English Aviation) of the strategical objectives, i.e., airdromes, stations, railroad crossings, bridges, ammunition dumps, (confirmed by photos).
   2) General attack by bombs on personnel (French Aviation) of camps, enemy cantonments and airdromes.

III. Day of the Attack:

a) Mission of pursuit aviation—
   1) Offensive mission—High patrols deep to the rear of the enemy lines to break up enemy aerial formations and help the bombardment aviation in its mission of bombarding enemy airdromes, and scattering enemy columns on the road.
   2) Protective mission—If the infantry signalling is efficient, *and in this case only*, an attack may be made by machine guns on the enemy's reserves which are in formation for counter-attack. To prevent enemy infantry planes from entering the battle zone. To help the advance of the tanks.

b) Mission of bombardment aviation—Protected by pursuit aviation to attack and destroy enemy airdromes, break up trains and convoys on the roads, and carry on the same work as that of the night bombardment aviation in destroying stations, bridges, railroad crossings, ammunition dumps, cantonments, etc.

IV. Exploitation:

The squadrons move forward to the new advanced fields which were previously prepared, extend their zone of action and execute the same missions as the day before. However, as a retreating army is in open ground, the airplanes will operate as low as possible in order to seek the obligatory points of passage of the enemy's columns and to destroy them with bombs and machine guns at such places.

The high explosive bombardment aviation (English Aviation) will be specially detailed to destroy railway crossings and important bridges located in the zone far from the battle field.

Wm. Mitchell
Colonel, A.S.S.C.
C.A.S., 1st Army

—8—

The man in the First Army operations section who was most concerned with aviation for the Battle of St. Mihiel was the veteran airplane, balloon, and airship pilot, Lt. Col. Frank P. Lahm, who then was a member of the staff of Col. Robert McCleave, Assistant Chief of Staff, G-3. Lahm noted in his diary that on Saturday, 17 August, he was so busy planning for the "big show" that he did not have time to eat lunch. After a "long confab" with the French liaison officer, Maj. Paul Armengaud, in Mitchell's office on 20 August, it appeared, Lahm said, that

Col. Frank P. Lahm (Lt. Col. at St. Mihiel) served in the G-3 Section under Col. McCleave.

Col. Robert McCleave, Assistant Chief of Staff, G-3, during the Battle of St. Mihiel.

French aviation would be placed at the disposal of the First Army.[a] Not long afterwards, General Petain's Chief of Staff sent Pershing the following list of French air fields and aviation units that would be placed under Pershing's command for the Battle of St. Mihiel.

French Armies of
the North and Northeast[b]
Air Service
Provins, August 24, 1918

To the Commander of the
American Expeditionary Forces,
G. H. Q.
Chaumont

The commander of the French Mission has sent me a request relating to French fields and aviation units to be furnished to the American First Army for the operation which has been planned.

This demand was followed up by your letter of August 22, 1918.

I. Aviation Fields: The following aviation fields will be placed at the disposal of the American First Army as you request:

Fields	Date on which the field may be occupied by the American First Army
Saizerais	From the American First Army's entry on the line.
Gondreville	When Eighth Army has been able to remove the squadrons which are stationed there.
Toul	Do
Bicqueley	From the American First Army's entry on the line.
Lay-St-Remy	Do
Rosieres-en-Blois	Do
Bacon	Do
Naives-en-Blois	Do
Vavincourt	Do
Rumont	Do
	(This field is occupied by the air service of the II Colonial Army Corps. It would be advisable to keep it there.)
Belrain	As soon as evacuated by the Second Army.
Rembercourt	Do
Bulainville	From the American First Army's entrance in the line.

Soilly	Do
Issoncourt	Do
Behonne	Do

(It is asked that this field be left to the French Pursuit group which will be placed at the disposal of the American First Army.)

. . . . . .

II. Air Service Units: The quantities available and the necessities of the battle now in progress do not allow the placing of all the units requested at the disposal of the commander of the American First Army.

The French units which will be placed at his disposal are the following:

(a) 3 observation squadrons, divisional type, that is, one for each American army corps in line.

(b) 3 observation squadrons for the II Colonial Army Corps.

(c) 6 artillery squadrons.

(d) 1 pursuit group.

(e) 6 balloon companies, of which 3 are destined for the II Colonial Army Corps.

These units will be under the orders of the commander of the American First Army as far as their tactical use is concerned.

For supply, personnel and administration they will be attached to the French Second or Eight Army according to a distribution which will be made subsequently.

The air service commanders of the Second and Eight Armies will keep themselves for this purpose in liaison with the air service commanders of the American First Army and will be especially kept informed by the latter of the movements of the squadrons attached to them.

I also am counting on placing the aerial division or a fraction of that division directly under the orders of the commander of the American First Army as the operations on the rest of the front will permit.

I can plan now upon sending one brigade, the other would follow later if necessary.

The night bombing groups, G. B. 2 and B. B. 18[?], will be placed at the disposal of the commander of the American First Army for the duration of operations.

The units of the aerial division and the night bombing units will be stationed on the fields of the G. A. E. and G. A. C. They will assure their own supply and administration.

For the Commander-in-Chief:

Buat.

—9—

An arrangement similar to that with the French, in which French aviation units were placed under American command, could not be obtained with respect to the British bombers that Mitchell wanted committed to the Battle of St. Mihiel. The British bomber force, consisting of both day and night bombardment units (see Appendix C), was under the command of Maj. Gen. Hugh M. Trenchard, who had his headquarters at Autigny-la-Tour, some 45 kilometers southwest of Nancy. This was an "Independent Force" that operated under the direction of Royal Air Force headquarters in London and was not subject to control by either the British Commander-in-Chief, Field Marshal Douglas Haig, or the Allied Commander-in-Chief, Marshall Ferdinand Foch. Trenchard agreed, however, to cooperate with Mitchell's allied force during the battle, as is indicated by the following letter.

Bombon, August 27, 1918

Marshal Foch, Commanding the Allied Armies

To General Pershing, Commander-in-Chief,
American Expeditionary Forces

I have requested General Trenchard, commanding the British aviation in the east, to inform me as to the conditions under which it would be possible for him to cooperate, with the bombardment squadrons at his disposal, in the operations which you are preparing.

General Trenchard has informed me that his pilots are not trained in the bombardment of the field of battle proper, which requires special training, but that he is willing to cooperate in the operations in question with all his forces (night and day squadrons) by taking as objectives on dates which may be indicated to him, the railroad stations of Metz, Thionville, and Longuyon, which control the railroads by which the enemy transports personnel and materiel to the battle.

I beg of you to arrange directly with General Trenchard, whose headquarters is at Attigny-la-Tour, all details relative to this cooperation which, being concentrated upon the three principal distant objectives which should be bombarded, will permit you to devote the French squadrons placed at your disposal entirely to the attack of the inlying objectives on the battlefield.

F. Foch

—10—

On 28 August 1918, Pershing established Advance Headquarters, First Army at Ligny-en-Barrois, some 17 or 18 miles south and west from the town of St. Mihiel. The same day, Mitchell gave Pershing a report on the progress he had made in organizing U.S. and Allied air forces for the forthcoming battle. Although this would be "one of the largest air forces yet brought under a single command on this front," Mitchell seemed a bit apprehensive as to the way this force would perform in combat (Doc. 11). At the same time Mitchell announced the members of his staff, outlined the organization of U.S. aero squadrons assigned to duties in army aviation, and named the commanders of the units under his direct orders as Army Air Service Commander (Doc. 10).

Headquarters
Chief of Air Service[a]
First Army
August 28th, 1918

General Orders
Number 1.

1. In accordance with authority contained in Par. 2, G. O. No. 120, G. H. Q., dated July 24th, 1918, the undersigned hereby assumes command of all Air Service units assigned or attached to the First Army as provided by G. O. No. 81, G. H. Q., A.E.F., and G. O. No. 8, Headquarters, First Army, c.s.[b]

2. The following staff is announced: Chief of Staff: Lt. Col. T. D. Milling, A.S., U.S.A.[c] Assistant Chief of Staff: Major Paul Armengaud, Aviation, French Army, (during operations). Operations Officer: Lt. Col. J.C. Morrow, A.S., U.S.A.[d] Assistant Operations Officer: Captain K. Flury, Aviation, French Army (during operations). Information Officer: Lt. Col. T.F. Dodd, A.S., U.S.A.[e] Balloon Officer: Major John A. Paegelow, A.S., U.S.A.[f] Adjutant: Major W.P. Kelleher, A.S., U.S.A. Equipment Officer: Captain I.D. Joralemon, A.S. U.S.A.

3. Major B.M. Atkinson, A.S., U.S.A.[g] is appointed and announced as Wing Commander, Pursuit Wing per Par. 11, S O. No. 26, Headquarters, First Army c.s. The Commanding Officers of the Second Pursuit Group (13th, 22nd, 49th and 139th Aero Squadrons and Flight A of 255th Aero Squadron) and the Third Pursuit Group (28th, 93rd, 103rd and 213th Aero Squadrons, one French Pursuit Group to be announced later and Flight B of 360th Aero Squadron)

Col. J. C. Morrow, Jr., Operations Officer, First Army.

will report to him for duty. The 96th Aero Day Bombardment Squadron and Flight A of 648th Aero Squadron will be under his tactical direction. His authority will be as prescribed for a Wing Commander, Pursuit Wing in G. O. No. 8, Headquarters, First Army, c.s.

4. Major L. H. Brereton, A.S., U.S.A.[h] is appointed and announced as Wing Commander, Corps Observation Wing per Par. 12, S. O. No. 26, Headquarters, First Army, c.s. The First Corps Air Service consisting of Chief of Air Service, First Corps, the First Corps Observation Group (1st, 8th and 12th Aero Squadrons, Photo Section No. 1, Flight D of 648th Aero Squadron, Balloon Wing Company A, 1st, 2nd and 5th Balloon Companies and one French Corps Observation Squadron to be announced later); the Fourth Corps Air Service consisting of Chief of Air Service, Fourth Corps, the Fourth Corps Observation Group (90th and 135th Aero Squadrons, Photo Section

Lt. Col. Thomas D. Milling, Col. Mitchell, and Maj. Paul Armengaud.

No. 4, Flight C of 255th Aero Squadron, Balloon Wing Company C, 3rd, 9th, 43rd and 69th Balloon Companies and one French Corps Observation Squadron to be announced later) and the Fifth Corps Air Service consisting of Chief of Air Service, Fifth Corps, the Fifth Corps Observation group (50th, 99th and 104th Aero Squadrons, Photo Section No. 5, Balloon Wing Company B, 6th, 7th and 8th Balloon Companies and one French Squadron to be announced later) will be under his direction. The 183rd Aero Park Squadron (less one flight) will report to him for duty. His authority will be as prescribed for a Wing Commander, Corps Observation Wing, in G.O. No. 8, Headquarters, First Army, c.s.[i]

5. Major John N. Reynolds, A.S., U.S.A.[j] is appointed and announced as Group Commander, Army Observation Group. The Commanding Officers of the 9th Aero Night Reconnaissance Squadron, 24th and 91st Aero Army Observation Squadrons, Photo Section No. 2, Flight B of 255th Aero Squadron and one French Night Reconnaissance Squadron to be announced later, will report to him for duty.

6. Major H. E. Hartney[k] is appointed and announced as Commanding Officer, First Pursuit Group (27th, 94th and 147th Aero Squadrons, Flight B of 648th Aero Squadron and 218th Aero Park Squadron.)

7. Major J. L. Dunsworth[l] is announced as Commanding Officer of the Amanty Airdrome. The 96th Aero Day Bombardment Squadron, 8th and 50th Aero Corps Observation Squadrons and Flight A of 648th Aero Squadron will report to him for duty as will all units that may be temporarily assigned to the Amanty airdrome. The 96th Squadron and Flight A of 648th Aero Squadron will be under the tactical direction of the Commanding Officer, First Pursuit Wing.

8. The Chief of Air Service, First Army will have jurisdiction over the following airdromes: Saizerais (advanced airdrome), Gondreville, Toul, Bicqueley, Lay St. Remy, Roziers-en-Blois, Vacon, Naives-en-Blois, Bovee, Ourches, Vaucouleurs Field No. 1, Vaucouleurs Field No. 2, Vavincourt, Amanty, Rumont, Belrain, Rembercourt, Bulainville, Souilly, Issoncourt and Behonne.

By order of Colonel Mitchell:

T. D. Milling
Lt. Col., A.S., U.S.A.
Chief of Staff

Official:
W. P. Kelleher,
Major, A.S., U.S.A.
Adjutant

Capt. (Lt. Col. during the St. Mihiel offensive) Townsend F. Dodd, Information Officer.

—11—

Headquarters Air Service
First Army
August 28, 1918

Memo For: Commanding General, First Army

Subject: Air Service

The following report regarding the status of the 1st Army Air Service is submitted for your information:

American Units:

Corps:

8 American squadrons will be ready.

The air service of the 1st and 4th Corps and 2nd C.A.C. are now in position.

The air service of the 5th Corps is now moving into position.

12 balloons are ready.

Army:

2 Army reconnaissance squadrons are ready and in position.

1 night squadron being formed, will be ready, is in position.

1 day bombardment squadron ready and in position.

3 pursuit groups of 4 squadrons of an average of 96 airplanes and 84 pilots each.

2 groups in position; 1 ready to come.

3 balloons are ready.

Total American squadrons 24—about 522 airplanes

Total American balloons 15.

The French Commander-in-Chief in his letter to the Commander-in-Chief, American E.F., 25th August, No. 39012 has ceded the airdromes asked for and the following aviation units.

3 Division Squadrons

3 squadrons for the 2nd C.A.C.

6 Army Artillery squadrons

1 Pursuit Group

6 Balloon Companies (3 for the 2nd C.A.C.)

Total—210 airplanes, 6 balloons

The French air division of two brigades comprises:

Total pursuit	360	airplanes
Do day bombardment	225	Do
Do surveillance	45	Do
	630	

or in case one brigade only is sent, some 315 airplanes.

For night bombardment 2 French groups and possibly 3 will be available—90 or 105 night bombardment airplanes.

The total airplanes under the direct command of the 1st Army may be estimated at minimum:

American	Airplanes	522	Balloons	15
French	Do	615	Do	6
Total		1137		21

Maximum:

American	Airplanes	522	Balloons	15
French	Do	945	Do	6
Total		1467		21

This is less than the number of airplanes asked for from the French Army and as stated in the letter of the French Commander-in-Chief is due to operations elsewhere. The British Independent air force of six squadrons have been requested to cooperate and are already doing so.

The numbers given above are a minimum and can be moved into place within five days after word is given. It is one of the largest air forces yet brought under a single command on this front.

All questions of supply, replacement and shelter have been worked out and are now functioning.

The question of telephonic liaison has been taken up with the Chief Signal Officer, First Army and he has stated that the system as per attached diagram will be installed.

Touch is being maintained with the Army Artillery and whenever we are able to obtain their organization, the 6 French squadrons and 6 balloons, 3 French and 3 American, will be distributed at once.

Liaison with our own G-2 and the anti-aircraft artillery is being worked out. In my opinion, the experience of the war clearly demonstrates that if the anti-aircraft artillery Commander and the Chief of the Air Service are not together both insofar as work and physical position is concerned, that satisfactory results will not be obtained.

The state and amount of transportation in the Air Service is extremely unsatisfactory and a special paper will be submitted on this subject.

In general, the results obtained so far are somewhat beyond my expectations. It must be remembered that in spite of all precautions that are being taken that the newness of the personnel as to the tactical handling of these units will leave a great deal to be desired.

William Mitchell
Colonel, A.S., U.S.A.
Chief of Air Service, 1st Army

—12—

When the First Army was formed in August 1918, the St. Mihiel front was under French command. The French XXXII Corps of the French Eighth Army was on the right, and the French II Colonial Corps and French XIII Corps, both part of the French Second Army, held the center and the left. Plans for the offensive called for the use of four corps, three American and one French as part of the First Army under Pershing's command. Corps assignments, from right to left, were U.S. I and IV on the south face, French II Colonial in the center, and U.S. V on the west. The First Army was to have on its flanks the French Eighth Army to the right and the French Second Army to the left.

The movement of U.S. units from other sectors and from rear areas to the St. Mihiel front was a formidable undertaking. Concentration of forces for the offensive was spread over nearly a month and would not be completed until time for the attack. By 29 August, however, there were three American divisions, the 82d, 90th, and 89th, in the line. The U. S. I, IV, and V Corps had assumed command of their sectors from the French XXXII and XIII Corps. It was time for Pershing to take command of the entire front from one end of the salient to the other.

French artillerymen near Rupt en Wouvre swab their 155-mm gun. This unit supported the U.S. 26th Division advance on St. Mihiel.

First Army, A. E. F.
Ligny-en-Barrois
August 29, 1918—12 p.m.

Field Orders
Number 8

1. The First Army, A. E. F., will take over command of the front from Port-sur-Seille (W. of Nomeny) on the east to Watronville (S.E. of Verdun) on the west, at 4 p.m., on August 30, 1918, relieving the French Eighth and Second Armies, respectively, of the portions of this front now held by them.

The First Army, A. E. F., will function under the General Headquarters, French Armies of the East and Northeast, in all matters concerning operations; under the Headquarters Group of French Armies of the East in certain matters concerning supply; and under G. H. Q., A. E. F., in all matters concerning administration and in certain matters concerning supply.

2. Troops: The following army corps, now in sector from east to west in the order named, will pass under the command of this army:

I Army Corps, A.E.F.
IV Army Corps, A.E.F.
French II Colonial Corps
V Army Corps, A.E.F.

French army troops located within the zone of the First Army, A.E.F., pass under the command of this army for the present and will continue in the discharge of their assigned missions.

3. Zone and Sector Limits: The existing corps sectors and zones remain unchanged.

Each corps will submit to these headquarters on the 30th instant a map showing the limits of its sector and zone and the distribution of troops therein, as well as the position of resistance and subsidiary positions in advance and to the rear thereof included in each corps zone.

4. Plans of Defense: The existing plans of defense will continue in force until further orders.

In case of a serious hostile attack the army commander will immediately place one division at the disposal of the corps commander whose front is threatened, provided a reserve division is not already at the disposal of the corps commander within his corps zone.

Corps commanders will prepare plans for the employment of this reserve division, and arrange for the reconnaissance of the terrain by the interested division commander, his staff and suitable details from his command.

For the present the following divisions are designated for possible employment as corps reserves:

American I Corps	American 2d Division (P. C. Vaucouleurs)
American IV Corps	American 1st Division (P. C. Colombey-les-Belles)
French II Colonial Corps	American 33d Division (P. C. Tronville)
American V Corps	American 26th Division (P. C. Mussy-sur-Seine)

5. Detailed Arrangements: Chiefs of general staff sections and chiefs of all corps and services, these headquarters, will make the necessary arrangements with the chiefs of the corresponding sections, corps and services of the French Second and Eighth Armies of the transfer of command.

6. Reports: Reports, telephonic, telegraphic, and written will be made to these headquarters as heretofore prescribed by the French Second and Eighth Army commanders, for French units, and by these headquarters for American units.

7. Posts of Command:

American First Army—1st Echelon, Ligny-en-Barrois
2d Echelon, Neufchateau
American I Corps—Saizerais
American IV Corps—Toul
French II Colonial Corps—Ernecourt
American V Corps—Benoitevaux

By command of General Pershing:

H. A. Drum
Chief of Staff

—13—

A change in a squadron assignment was only one of the hundreds of administrative and operational matters that demanded attention as plans for the offensive were refined and elaborated.

Headquarters, First Army
American Expeditionary Forces
France
29th August, 1918

Special Orders
Number 95

1. Special Orders No. 87, these headquarters, assigning the Eighth (8th) Aero Squadron to the First Army Corps, is revoked.
2. The Eighth (8th) Aero Squadron will proceed overland from Amanty to Ourches, reporting upon arrival to the Fourth Army Corps, for duty.

By command of General Pershing:

H. A. Drum
Chief of Staff

Official:
Stephen O. Fuqua
Lt. Col., General Staff
Assistant G-3

—14—

Headquarters, First Pursuit Wing
Air Service, American E.F.
August 29th, 1918

Operations Memorandum
Number 3

1. The activity of Pursuit Aviation in the 1st Pursuit Wing will conform to the principles outlined below:
2. Pursuit aviation has a double mission to perform:
   (a) Offensive
   (b) Protective

3. Offensive Patrols: Should cross the enemy's lines in sufficient strength to cruise over his rear area, search out enemy aircraft, and attack them with the object of causing maximum casualties and inflicting the greatest possible damage to his air Service and with a further object of obtaining a definite moral superiority. Offensive patrols should cover low, intermediate and high altitudes and it must be borne in mind that pursuit Aviation furnishes its own protection and that the advantage of altitude will frequently outweigh the advantage of numbers in a combat so that low or intermediate patrols should invariable be accompanied by high protection.

4. Protection Patrols: Also have a double mission to perform.-

(a) To place Corps Observation Aviation in a position where it will be and will feel that it is protected.

(b) To protect our ground troops from the results of enemy artillery adjustment, reconnaissance, and photographic aeroplanes.

Protective patrols are not to be regarded as defensive in character. All pursuit aviation is offensive in character but the limitation of the area in which protective patrols are ordered to fly and to fight and the end which it is desired to accomplish by the utilization of protective patrols distinguishes them from offensive patrols; whose mission is to attack and destroy enemy aircraft of every sort wherever found.

5. The performance of the double role of protective patrols cannot be accomplished by the maintenance of a permanent barrage of the sector. Such a procedure is fatiguing for the pilots, expensive in material comparatively to the results obtained, and renders it impossible for us to undertake offensive expeditions in force. Consequently a permanent barrage will only be resorted to at times of intense preparation for attack. It is imperative to prevent all reconnaissance of our rear areas on the part of the enemy air Service.

6. It is to be noted that barrage patrols can only afford effective protection to our Army Corps air service when acting over a limited breadth of front which as a rule should not exceed 15 kilometers. The size and altitude of protective patrols will depend upon the general activity of the sector and the strength and degree of aggressiveness of enemy aviation. On special occasions a triple tier barrage may be established for short periods of time. A depth that protective patrols will penetrate into the enemy rear areas will be prescribed in orders. Patrols must not exceed this depth in extraordinary circumstances; for them to do so leaves the army corps aviation unprotected. For a protective patrol to leave the area assigned to it in order to attack enemy airplanes or for any other reason, constitutes a serious offense.

7. In order to protect effectively our Army Corps airplanes, barrage patrols should operate from 3 to 6 kilometers over the enemy lines.

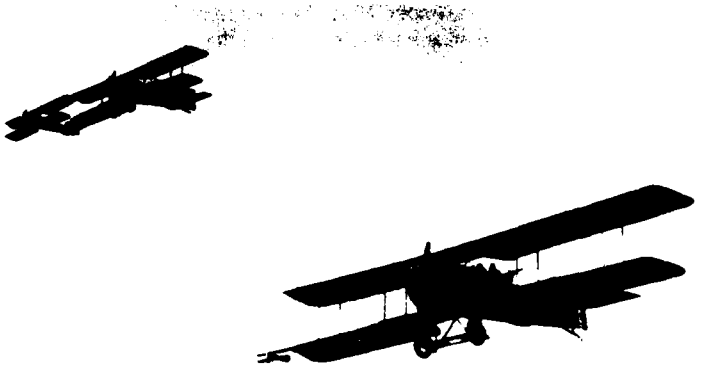
8. For the rigidity of a fixed system of protection patrols will be substituted a system which will comprise patrols especially directed against enemy army Corps Aviation and in addition a number of planes on alert, ready to take off in a few minutes, to cope with any marked increase of enemy aviation over a part of the sector of the enemy and to clear the air of enemy aviation in cases where ground activity makes an increase of aerial activity adviseable.

9. The size of the alert or mobile reserve will be prescribed in orders. The group commanders will be responsible for its proper utilization. It is not intended to use the planes on alert to counter attack every airplane reported by our A.A.A., Observation Post or the Gonio Stations. The alert will be used by group commanders as a sort of "Support System" to reinforce our aviation in case of increased enemy aviation or in case of activity on the part of infantry or artillery.

10. In addition to the routine offensive protective patrols; pursuit aviation will perform 4 types of special missions:

(a) Close protection of Corps airplanes.
(b) Cooperation with Day Bombardment.
(c) Attacks on balloons.
(d) Attacks on grounds troops.

11. Close protection of Corps Aviation: will only be arranged in special cases where the Corps Aviation has to perform particularly difficult and delicate missions. The group commander of the Corps Observation Group will request such protection directly from the nearest pursuit group commander and the latter will be the judge as to whether or not his missions assigned, planes available, etc. will permit



Breguets of the 96th Aero Squadron head for a bombing assault on German territory.

him to furnish the protection requested. It has been found that by furnishing the daily schedule of operations to the Corps Air Service in advance the Corps Air service is generally able to arrange its missions so that they coincide with the time of a routine pursuit patrol; and this patrol after it has concluded its protection of the Corps airplanes is able to continue its patrol of the lines.

12. Cooperation with Day Bombardment: is valuable, in that it enables pursuit patrols to obtain contact with enemy pursuit airplanes. Owing to the long range and slow speed of day bombardment airplanes, a covering protection should not be afforded. A day bombing expedition should be strong to defend itself from attack enemy airplanes.

By sending out pursuit patrols to meet day bombardment units returning from their raid it will often be possible to attack enemy pursuit planes which are following the bombers in the hopes of picking off a straggler. Under these circumstances our pursuit planes by knowing the altitude and route which the day bombardment will follow can obtain the advantage of altitude and surprise, as the enemy pursuit will have its attention directed to the bombers whom they are pursuing.

13. Attacks on balloons: are dangerous and difficult and should only be undertaken in order to destroy the work of some balloon which is particularly embarrassing to our troops. Very light patrols, one [or] two planes, make the attack with a patrol over head to protect the attacking planes from being surprised. Demonstrations against the entire line of enemy balloons along a considerable length of front often give valuable results by causing all the enemy balloons to be hauled down. These results are especially to be sought [in] the preparation of an offensive or when the attack is in progress. They must be organized with great care and precision in order that the attack may take place simultaneously along the entire front.

14. Attacks on ground objectives: Often give valuable results during a major operation. The objectives of attack should as a rule be the enemy reserves, either in mass formation or on the march. They should be undertaken in force as the result desired is the maximum moral effect. The employment of a large number of pursuit planes in attacking ground objectives increases the safety of the operations by multiplying the targets at which the enemy must shoot. In a calm sector, machine gun attacks of objectives on the ground, trenches, machine gun emplacements, artillery positions; etc. produce very little effect either moral or material. They will not be attempted.

By order of Major Atkinson;

Philip J. Roosevelt
Captain, A/S S.C.
Operations Officer

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Headquarters, First Army, A. E. F.
August 30, 1918

Memorandum for: C.A.S., First Army

Daily Air Service operations report covering period from 7:00 P.M. to 7:00 P.M. will be submitted to this Office as early as practicable each evening.

Any information of particular importance secured by the Air Service, will be 'phoned to this office at once.

R. McCleave
Colonel, G.S.
G-3

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Headquarters Air Service
First Army A.E.F.
Office of the Chief of Staff
August 30, 1918

Memorandum No. 1.

1. The First Army, A.E.F., assumed command at 4:00 P.M., August 30th, 1918, of the front Port-sur-Seille (W. of Nomeny) on the east, to Watronville (S.E. of Verdun) on the west, relieving part of the VIII° and II° French Armies. The existing plans of defense will continue in force until further orders.

2. Troops. The following Army Corps, now in sector from east to west in the order named, pass under command of the First Army, A.E.F.

1st Army Corps, A.E.F.
4th Army Corps, A.E.F.
2nd French Colonial Corps
5th Army Corps, A.E.F.

French Army troops located within the zone of the First Army, A.E.F. pass under command of this Army for the present and will continue to discharge their assigned missions.

3. The existing Corps sectors and zones will be obtained by Corps Air Service Commanders from their respective Corps Commanders.

By order of Colonel Mitchell

T.D. Milling
Lt. Col., A.S.U.S.A.
Chief of Staff

Official:
W. P. Kelleher
Major, A.S.U.S.A.
Adjutant

—17—

Headquarters Air Service
First Army
August 30, 1918

Memorandum to Colonel Mitchell,

Subject: Method of Supply of 1st Army Squadrons.

1. The 1st Air Depot at Colombey-les-Belles will supply all American Squadrons east of St. Mihiel. Vinets Depot will supply all American Squadrons west of St. Mihiel. The French Army and Group Parks will supply all French Squadrons. Details of the Supply Method are as follows:

2. West of St. Mihiel.

(A). Airplanes. The squadron supply officer will obtain requisitions for replacement airplanes from the Group Supply Officer, and send pilots with the requisitions to the Vavincourt Airdrome, where the Supply Section will maintain an advanced airplane reserve. The pilots will look over the planes at Vavincourt, accept them, and fly them back to the squadron.

(B). Spare Parts and Supplies. Squadrons will requisition on the group supply officer, who will forward the requisitions to the Mobile Park of the group. If the Mobile Park cannot fill the requisition; it will requisition on the new Air Depot at Vinets, which will send the required material to the Park. If the Air Depot cannot get the material, the Supply Officer of the Mobile Park may go to the French Park No. 5 and try to get the supplies required. Only the Mobile Park Supply Officers may go to the French Park.

Spads and DH-4 aircraft at Colombey-les-Belles.

Wing repair depot at Issoudun.

(C). Gasoline and Oil. Squadrons will requisition for gas, and oil through the Group Supply Officer on the mobile parks of their groups. The Mobile Parks at Souilly and Rembercourt will keep on hand 30 days' reserve supply of airplane oil and gasoline for all squadrons west of St. Mihiel. This supply is already on hand. An automatic supply of 4,500 gallons of airplane gasoline and 1,200 gallons of castor oil per day has been ordered sent to the Gasoline Supply Station of the Quartermaster Department at Souilly, beginning September 10th. The Mobile Parks will keep on hand one week's supply of motor transport gasoline and oil for their groups, requisitioning these supplies from the Quartermaster station at Souilly.

3. East of St. Mihiel.

(A). Airplanes. The squadron supply officer will obtain requisitions for replacement airplanes from the Group Supply Officer, and will send pilots with the requisitions to the 1st Air Depot, where a reserve of airplanes will be kept by the Supply Section. The pilots will look over the airplanes at the First Air Depot, accept them, and fly them to the Squadrons.

(B). Spare Parts and Supplies. Squadrons will requisition on the Group Supply Officer, who will requisition on the First Air Depot, which will deliver the desired supplies to the Group or Park. If the First Air Depot cannot get the supplies, the Supply Officers of the Mobile Parks may try to get the supplies from the 10th French Park. Only supply officers of the Mobile Park or Equipment Officers of the Wings or the Army, may requisition supplies from the French parks.

(C). Gasoline and Oil. The squadrons will requisition for gasoline and oil through the Group Supply Officer on the Mobile park, if there is a Park. Each Group or Park should keep on hand one week's supply of airplane gasoline and oil for squadrons under it. The present automatic supplies to Groups directly from the Quartermaster Corps will be continued. Where there is no such automatic supply, or in case the supply is insufficient, Groups or Parks will requisition on First Air Depot for airplane gasoline and oil. The First Air Depot will have in reserve three weeks' supply for all squadrons served by it. Gasoline and oil for motor transport will be requisitioned by the Groups, or by the Mobile Parks when such parks are operating, directly on the Gasoline Section, Quartermaster Corps, at Neufchateau. Emergency supplies of gasoline and oil for motor transport may be obtained from the First Air Depot.

4. Motor Transport Spare Parts and Supplies. In accordance with Bulletin #9, Headquarters First Army, all requisitions for spare parts and supplies for motor transport must be submitted to G-4, First Army, on Tuesday of every week. The following Sunday of each week, the M.T.O.'s of units making the requisitions will send a representative to M.T.O. Supply Depot #1, Langres, with sufficient transportation to

bring back all supplies ordered. Arrangements will be make between Commanding Officers of all Groups in each area, to have, one truck or truck train get all supplies for that area every week.

Ira B. Joralemon
Major, A.S., U.S.A.
Equipment Officer

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First Army, A.E.F.
Ligny-en-Barrois, Meuse, September 1, 1918

Special Orders
Number 108

1. The First Pursuit Group, consisting of Group Headquarters, 27th, 94th, 95th and 147th Aero Pursuit Squadrons, 218th Aero (Park) Squadron, and Flight C, of 648th Aero Squadron, upon arrival at Rembercourt will report to the Chief of Air Service, First Army, for assignment to duty and station.

By command of General Pershing:

H. A. Drum
Chief of Staff

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Headquarters, Air Service, First Army
American Expeditionary Forces
France, September 1, 1918

General Orders
Number 2.

1. Commanders of Pursuit, Army Observation and Bombing Groups and Wing Commanders of Corps Observation, under the direction of the C.A.S., 1st Army, American E.F., are hereby directed to make arrangements for the handling of information as follows:

2. All information of importance, whether affecting the Air Service directly or indirectly will be phoned to the Information Officer at these

Headquarters immediately upon receipt of such information by the officer with the organization who is charged with such duties.

3. In the event of information of major importance being received, which by its nature clearly indicates the necessity for urgent action, the telephone should not alone be relied upon, but, as it is not always possible to communicate by telephone without delays, suitable arrangements must be made to send urgent messages by special motorcycle messengers to these Headquarters, such messengers to report at once to the Information Officer or his Assistants.

4. Nothing in this order is to be construed as affecting in any way existing instructions as to the furnishing of information and reports from organizations of the Air Service, 1st Army.

By order of Colonel Mitchell:

T. D. Milling
Lieut. Col., A.S., U.S.A.
Chief of Staff

Official:
W. P. Kelleher
Major, A.S., U.S.A.
Adjutant

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On 30 August, the day that Pershing had assumed command of the St. Mihiel sector, Marshal Foch and his Chief of Staff, Gen. Maxime Weygand, had arrived at First Army Headquarters at Ligny-en-Barrois with a new plan for the employment of the American Army. The Allied Commander-in-Chief wanted to restrict the St. Mihiel operation to an attack on the southern face of the salient, to be followed immediately by two attacks by French and American forces in the area west of the Meuse River. The Marshal's plan would have meant placing some American divisions under French command and would have left Pershing holding a sector which would have little activity following the St. Mihiel operation. Pershing objected and suggested that, after the St. Mihiel offensive, tired French divisions be sent in to hold that sector so American forces could be withdrawn and used for the new offensive west of the Meuse.

Pershing discussed the matter with Petain the following day, and on 1 September he sent the A.E.F. Chief of Staff, Maj. Gen. James W. McAndrew, and the Chief of Operations, Brig. Gen. Fox Conner, to talk with Weygand. The next day, 2 September, Foch, Petain, and Pershing met at Bombon and came to an agreement by which the St. Mihiel operation would take place about 10 September but with the objective somewhat reduced. Afterwards the First Army would be moved to the Meuse-Argonne front for an offensive to begin not later than 25 September.

Under the agreement of 2 September, the army for the offensive was cut from 25 to 18 divisions and the objective was pulled back to a line extending from the Moselle River, through Thiaucourt and Vigneulles-les-Hattonchatel, to les Eparges. The main effort was still to be made on the south side with a secondary attack on the west and a holding attack at the nose of the salient.

As a result of these developments, the First Army had to prepare new plans for St. Mihiel, as indicated by the following battle instructions. No major changes were required, however, in the plans and preparations already made for the employment of aviation in the battle.

A concrete rampart overlooking St Mihiel

First Army, A.E.F.
Office of Chief of Staff
Ligny-en-Barrois, September 2, 1918

All preceding instructions from these headquarters for operation against St. Mihiel salient are rescinded, and following are substituted therefor.

Based on the following instructions, the Commanding Generals, I Corps; IV Corps; French II Colonial Corps; V Corps; and the following officers of the First Army; namely the Chief of Army Artillery; Chief Engineer Officer; Chief of Air Service; Chief Signal Officer; A. C. of S., G-1; A. C. of S., G-2; the Chiefs of Services under A. C of S., G-4; the Chief of Tank Service; and the Chief of Chemical Warfare Service, will draw up their plans and submit same to the Chief of Staff, First Army, not later than 6 p.m., September 6.

1. General Plan:

(a) An operation having for its general object the reduction of the St. Mihiel Salient will be made on D day.

(b) The operation will comprise:

(1) An attack from the south through the wooded area southeast of Vigneulles.

(2) A follow up attack on the left flank of the southern attack.

(3) An attack between les Eparges and Seuzey towards Hannonville and Hattonville.

(4) An exploitation and follow up attack on the right flank of the western attack.

(5) Eventual exploitation.

(c) The attack from the south will be delivered by the I and IV Corps and will be divided into four phases:

(1) The first phase line or intermediate objective. . . is the general objective to which divisions must advance as promptly as possible without waiting for others on their right and left. As it is, the line beyond which the artillery (without moving forward) cannot furnish the necessary rolling barrage in front of the advancing infantry, batteries of light artillery will be quickly advanced so as to give support, if necessary, for the advance beyond this line.

(2) The first day line. . . is the general objective to which corps must advance as promptly as possible without waiting for corps on their right or left.

(3) The first phase second day line. . . is the general objective to which the corps will advance under orders from the corps commanders.

(4) The army objective. . . is an objective to which the corps may be ordered to advance after they have reached the first phase second day line, such advance to be made under orders from the army commander

Note: . . . The Exploitation Line to which strong reconnaissances should be pushed after the army objective is reached [is shown on map].

(d) The follow up attack on the left flank of the southern attack will be delivered by the French II Colonial Corps and will be executed as follows:

When the IV Corps on the right of the French II Colonial Corps has made a certain amount of progress, the French II Colonial Corps will advance to the . . . line marked ["First Day (French)"]. In conformity with this plan, the French II Colonial Corps will start its advance at H plus 2 hours. On reaching the first day's objective it will push strong patrols into the Bois de Gargantua, and on the second day will advance to the western limit of its sector. . . .

(e) The attack from the west will be delivered by the V Corps and will be divided into two phases:

(1) The 1st Day Line . . . is the line to which the divisions must advance as rapidly as possible.

(2) The army objective . . . is the line to which the corps will advance under orders from the army commander.

Note: . . . The Exploitation Line to which strong reconnaissances should be pushed after the army objective is reached [is shown on map].

(f) The exploitation and follow up attack on the right flank of the western attack will be delivered by the French II Colonial Corps and will be executed as follows:

When the V Corps on the left of the French II Colonial Corps has made a certain amount of progress, the French II Colonial Corps will advance to the line marked Exploitation Line and follow up . . . In conformity with this plan the French II Colonial Corps will start its advance at H plus 2 hours. It will then continue its progression in liaison with V Corps, within the sector limits assigned it for this exploitation and follow up movement.

(g) That part of the French II Colonial Corps not involved in the southern and western attacks will make deep raids at different points in the enemy's line, especially in the valley east of Spada, and toward Varneville, to detect an enemy withdrawal, and will press the enemy. Upon indications of a withdrawal by the enemy, the French II Colonial Corps will follow on the axis St Mihiel—Hattonville and will join up the southern and western attacks on the army objective between Hattonville and Le Chaufour [Bois].

2. General Organization of Command: The Commanding General, First Army, will have command of the operation, in which following will participate:

I Corps with following divisions:

1st Line (in order from right to left); 82d, 90th, 5th, 2d.

2d Line; 78th

IV Corps with following divisions:
1st Line (in order from right to left): 89th, 42d, 1st.
2d Line: 3d.
French II Colonial Corps with following divisions:
3 divisions now in sector.
V Corps with following divisions:
1st Line (in order from right to left): 26th Div., 1 French div.
(numerical designation to be furnished later)
2d Line: One American div.
Army Reserve: 35th and 91st Divisions.

By command of General Pershing:

H. A. Drum
Chief of Staff

—21—

Headquarters, Air Service, First Army
American Expeditionary forces
September 2nd, 1918

Memo to: Chiefs of Section.

1. Hereafter, all Chiefs of Section will arrange to have one officer present in their office during meal hours.

By order of Colonel Mitchell.

T. DeW. Milling
Lieut. Col., A.S., U.S.A.
Chief of Staff

—22—

Every possible precaution was taken to keep the enemy from learning about the planned assault on the St. Mihiel salient. Pershing concocted an elaborate ruse that involved fake plans, movements of troops, the "loss" of secret papers, and other strategems to make the Germans think that the Americans were going to attack farther to the south, in the vicinity of Belfort. To prevent the Germans from learning of the American build-up in the St. Mihiel area, movements of troops into that sector were made at night. Aviation units were cautioned not to show any increase in aerial activity. The flight

restrictions imposed on units in the area tended to conflict, however, with the need for aerial reconnaissance to find out what was going on behind the enemy lines, and for preventing German reconnaissance behind Allied lines. As indicated in the following order, some relaxation of flight restrictions prior to the battle became necessary.

First Army, A. E. F.
Ligny-en-Barrois, Meuse
September 3, 1918

1. Outpost position: In order to provide proper protection for the artillery and dumps now being located in advance of the position of resistance, corps commanders are authorized to increase the strength of the garrisons of the outpost position for this purpose.

So far as practicable the forward zone within our lines which has been unoccupied for several months, should not be garrisoned during the daytime as signs of unusual activity in this region would convey to the enemy information regarding our offensive intentions.

The number of machine guns in the outpost position should be materially increased.

2. Secrecy: Army corps commanders are authorized to inform such members of their staffs of the details of the proposed plan of operations as they consider necessary for the conduct of the preparations.

3. Aerial Activity: The restriction placed on the air service which prohibited an increase of aerial activity in advance of D day, is removed insofar as concerns the employment of units to secure photographs of the enemy's defensive organization.

By command of General Pershing:

H. A. Drum
Chief of Staff

—23—

General Headquarters, A. E. F.
Chaumont, Haute-Marne, September 4, 1918

From: Commander-in-Chief, A. E. F.

To: Commander-in-Chief of the Armies of the
North and Northeast, Provins

In conformity with your offer of the air division for service with this army I would be very much pleased to have the movement begin at

once [so that it will be ready to operate on September 10]. I also would appreciate it very much if you would place the bombardment *escadre* at my disposal dating from September 8.

Pershing

—24—

Headquarters Air Service, First Army
American Expeditionary Forces
France, September 4th, 1918

Commandant de Vergnette,
Commandant de l'Aeronautique,
II Army.

My dear Commandant:

1. I beg to inform you herein of the number and location of the American units which are assigned to this Command for the coming operations:

2nd Pursuit Group, (13, 22, 49 & 139 Sqdns) Toul
3rd Pursuit Group, (28, 93, 103 and 213 Sqdns) Vaucouleurs
2 Army Observation Squadrons, (24 & 91 Sqdns) Gondreville
9th Night Reconnaissance Squadron Amanty
8 Corps Observation Squadrons, 1st and 12th (Toul), 8th, 90th and 135th (Ourches), 50th (Amanty), 99th and 104th (Souilly)
96th Day Bombardment Squadron, Amanty
15 Balloons—1st (Domevre-en-Haye), 2nd (Griscourt), 3rd (Brouville), 5th (Gironville), 6th (Villers-sur-Meuse), 7th (Petit Montairon), 8th (Diene-sur-Meuse), 9th (Raulecourt), 10th, 11th, and 42nd (Toul), 12th (Sommdieue), 43rd (Ansouville), 69th (Neuf-de-Mandres), 16th (enroute from Souges.)

2. In addition to the American units as listed above, the additional units specified in the telegram quoted herewith are expected to be available at the disposal of this Command:

TELEGRAM

France, September 2nd, 1918

"Commander in Chief":

No. _____. period. It is requested that you direct air units to air-dromes as follows colon Divisional squadrons comma two-hundred-fourteenth comma two-hundred-eighteenth comma twenty-eight and forty-second comma one each to Bicqueley comma Ourches comma Rumont and Souilly period Artillery squadrons colon two-hundred-eighth to Bicqueley comma two-hundred-thirty-sixth to Belrain period Of the remaining squadrons two-hundred-sixth comma two-hundred

nineteenth comma two-hundred-twenty-fifth and two-hundred-thirty-fourth send one to Belrain comma one to Bicqueley and two to Lay St. Remy period Send Groupe de Combat No sixteen to Vaucouleurs South period Please notify these Headquarters of the destination of each squadron stop Pershing."

3. The above telegram has been amended to direct the 219th Squadron to take station at Lay St. Remy.

4. As soon as definite information has been received concerning the respective destinations of each of the Squadrons mentioned in the above telegram, the same will be immediately transmitted for your information.

Cordially yours,

T. DeW. Milling
Lieut. Col., A.S., U.S.A.
Chief of Staff

—25—

One of the most difficult aspects of air support for infantry and artillery during World War I was in communications between aerial observers and command posts on the ground. Radio, which was limited to transmissions by wireless telegraphy from aircraft to receiving stations on the ground, as well as visual signaling systems that were tried, were so uncertain that written messages dropped by aerial observers at designated places were often the best means of reporting aerial observations.

Wireless telephone unit on ground receiving a message

Headquarters Air Service[a]
First Army
Sept. 4, 1918

(Not to be taken on flights)
Army Dropping Point for Messages via Airplane.
Map Reference—Map of France
Scale 1/200,000, Sheet #17, Chalons[b]

1. A dropping point for important messages via airplane has been established at a point 2½ kilometers East Southeast of Ligny-en-Barrois, and between that city and the village of Morlaincourt. A mark has been placed on slope of hill directly above the letters "AI" in Morlaincourt. This mark consists of a hollow white diamond, with white rays projecting from the four corners. The hollow white diamond is placed on a black circle. Long diagonal of diamond lays N. and S. (see sketch below).

2. Neighboring Landmarks. Dropping point lies about two kilometers south of main road Ligny-en-Barrois—Void and about 2 kilometers east of main road Ligny-en-Barrois- -Gondrecourt. Ligny-en-Barrois lies in the narrow winding valley of the Ornain River; this valley also contains a railroad.

In addition there is a canal in this valley from a point 18 kilometers southeast of Ligny-en-Barrois (at Houdelaincourt) to beyond Ligny-en Barrois.

The city of Ligny en Barrois has a population of about 5500 inhabitants. At Ligny en Barrois there is an open water reservoir about 50 meters square, on west side of central part of city, near the canal and railroad.

3. Operation. Watchers are stationed at the diamond to secure messages that may be dropped. Telephone is located near diamond

Motorcycle messengers are on duty. Pilots should circle at low height above field, passing above mark at as low an altitude as is consistent with safety, and as they pass the second time above the mark drop their message. The pilot shall pass over the mark the third time, and if watchers have seen the message fall and located same, a white flag will be waved. In case no message has been seen to fall, the flag will not be waved; in the latter case a duplicate message should be dropped or if none is available, a landing should be made at the airdrome at Maullan, which field lies about 6 km. S.W. of Ligny-en-Barrois, and immediately south of the Ligny-en-Barrois—St. Dizier Road, and brought to the message center in the City of Ligny-en-Barrois.

4. Caution: The field where the hollow diamond is located is not to be used as a landing field, except in case of absolute necessity, as it is unsuitable and dangerous.

By order of Colonel Mitchell

T.D. Milling
Lieut. Col., A.S., U.S.A.
Chief of Staff

—26—

Headquarters, First Army
American Expeditionary Forces, France
6th September, 1918

Special Orders
Number 149.

The 50th Aero Squadron is relieved from further duty with the Fifth Army Corps. This squadron will proceed from Behonne to Bicqueley for station, reporting upon arrival to the First Army Corps for duty.

By command of General Pershing:

H.A. Drum
Chief of Staff

Official:
Stephen O. Fuqua,
Lieutenant Colonel, General Staff,
Assistant G 3

—27—

6 Sept 1918

From Chief of French Military Mission,
To Commander-in-Chief, American Expeditionary Forces.

I have the honor to inform you that the General Commanding the Armies of the North and Northeast has placed, beginning the 8th of September, at the disposition of the First American Army the night bombardment groups Nos. 2 and 18.

H. LeRoy

—28—

First Army, A. E. F.
Ligny-en-Barrois, Meuse, September 6, 1918

Special Orders
Number 151.

1. The following [French] air service units are assigned as follows:

To I Army Corps: 214th Divisional Squadron and 208th Artillery Squadron, with station at Bicqueley.

To IV Army Corps: 218th Divisional Squadron, with station at Ourches.

To V Army Corps; 42d Divisional Squadron, with station at Souilly.

To II Colonial Corps: 28th Divisional Squadron, with station at Rumont and the 236th Artillery Squadron, with station at Belrain.

To Air Service, First Army: 206th Artillery Squadron, with station at Bicqueley. 219th A. I. G. F. Squadron and the 234th Artillery Squadron, with station at Lay-St Remy. 225th Artillery Squadron, with station at Belrain. Groupe de Combat No. 16 with Park No. 102, with station at Vaucouleurs, south.

2. The 28th, 42d, 219th and 236th Squadrons will be under the French Second Army for administration and supply, and under the tactical supervision of the Chief Air Service, American First Army. The 206th, 208th, 214th, 218th, 225th, and 234th Squadrons, and Groupe de Combat No. 16 with Park No. 102, will be under the French Eighth Army for administration and supply and under the tactical control of the Chief Air Service, American First Army.

By command of General Pershing:

H. A. Drum
Chief of Staff

—29—

Headquarters Air Service
First Army
September 6, 1918

General Orders No. 4.

1. The reporting of marking on enemy aircraft is one of the best sources of information that permits the identification of enemy squadrons.

2. The French Army has recently issued an order that pilots and observers will note on their daily reports the description of enemy planes and insignia that are observed, and in this order the following extract appears:

The following extracts from American Pilots and Observers reports show that they have obtained in their observations a precision which has permitted in a short time to ascertain the presence in the Woevre of three enemy squadrons.

"One of the Fokkers had red and blue bands on the fuselage, and a black cross with white border", signed Lieut. Drew.

"Red and blue bands under the rudder," signed Lieut. Jones.

"White and red bands on stabilizer, forward part of fuselage red" signed Lieuts. Putnam and Brooks.

3. Pilots and observers will report the markings on enemy planes seen, with type, (if known), and if unknown, a description of same.

By order of Colonel Mitchell

T. DeW. Milling
Lieut. Col., A.S., U.S.A.
Chief of Staff

—30—

Headquarters, Air Service, First Army
American Expeditionary Forces
France, September 6th, 1918

Operations Memorandum
Number 5.

Effective September 6th, 1918, an officer will be on duty at all hours of the day and night in Observation Wing Headquarters, Pursuit Wing

Headquarters, Army Observation Group Headquarters, First Pursuit Group Headquarters, all Corps Air Service Headquarters and Amanty Airdrome.

By order of Colonel Mitchell

T. DeW. Milling
Lt. Col., A.S., U.S.A.
Chief of Staff

—31—

Headquarters, Air Service, First Army
American Expeditionary Forces
France, September 6th, 1918

Operations Memorandum
Number 6.

1. All previous instructions concerning the transmission of daily written and telephonic Operations to these headquarters are hereby revoked, and the following procedures will become effective September 6th, 1918.
2. Written reports will cover operations from 17:00 o'clock to 17:00 o'clock, and will reach these headquarters before 20:00 o'clock. They may be transmitted to these headquarters in any way, or by any arrangement that the Commanding Officers of Wings, Corps and Squadrons may actually agree to, but it is distinctly understood that each unit will bear full responsibility for its report reaching these headquarters at the time specified.
3. In addition to the above written report, a telephonic report will be made to these headquarters before 20:00 o'clock daily, covering any points of special interest which may occur after the written report has gone forward.

By order of Colonel Mitchell

T. DeW. Milling
Lt. Col., A.S., U.S.A.
Chief of Staff

—32—

Plans prepared and submitted in accordance with the battle instructions issued by First Army headquarters on 2 September (Doc. 20) formed the basis for the First Army field order issued on 7 September. Mitchell's plan for the employment of army aviation was incorporated in the field order as Annex No. 3, which was broken down into detailed plans for bombardment, pursuit, and reconnaissance.

First Army, A.E.F.[a]
Ligny-en-Barrois, September 7, 1918

Field Orders
No. 9
Map: 1/80,000 Commercy
Metz

1. The enemy is retreating on the front from Arras to Reims, under pressure of the Allied troops. He now has in the St. Mihiel salient between les Eparges and the Moselle about 7 divisions holding the front, 1 division southeast of Vigneulles, and 1 division near Metz. The strength and morale of these divisions is in general below the usual standard.

2. Mission of the American First Army:

(a) The First Army will attack at H hour on D day with the object of forcing the evacuation of the St-Mihiel salient.

. . . . . .

(e) Aviation: (For Plan of Employment of Aviation see Annex No. 3.)

(1) Beginning at the commencement of artillery preparation and barrage, the army air service will take the offensive against the enemy with every branch of aviation. The army pursuit aviation will defend the army front from hostile air attack, protect its own observation aviation, and hold itself in readiness to attack troops on the ground in the immediate vicinity of our front. The army observation aviation will carry out all missions, both day and night, ordered by G-2. The bombardment aviation will attack the railroad stations and supply points of Metz, Thionville, Mars-la-Tour, Conflans, Dommary, Baroncourt, Longuyon, the bridges of the Meuse from Dun to Stenay, and the most important hostile airdromes.

(2) The army dropping ground for messages from airplanes will be at a point two and one-half kilometers southeast of Ligny-en-Barrois. Four command airplanes will be held ready to execute any

missions given, at the army landing field at Maulan.

(3) Certain balloon companies will be designated by Chief of Air Service, First Army, to follow advances.

By command of General Pershing:

H. A. Drum
Chief of Staff

Headquarters, First Army[b]
American Expeditionary Forces
France, 7th September 1918

Annex No. 3.
(Field Orders No. 9).

Subject: Plan of Employment of Air Service Units,
1st American Army.

1. Plan of Employment—This will consist of four stages, as enumerated below:

A. Early preparation (from now to day of attack):

B. Preparation immediately preceding the attack (from the beginning of the artillery preparation):

C. The attack (1st and 2nd days):

D. The exploitation.

A. *Early preparation*

I. Its general Intent:

(a) Keeping up the normal bombardment of the sector so as not to draw enemy's attention to our air concentration.

(b) Preventing access to our lines of hostile reconnaissance aviation—Hindering the observation work of hostile balloons.

(c) Gathering all information necessary to the preparation of the attack, especially for the artillery preparation.

These missions should be carried out so as not to change the usual aspect of the sector.

II. Mission of Each Branch of Aviation:

(a) Bombardment—French Night Bombardment, British Day and Night Bombardment—the normal bombardment of the sector.

(b) Pursuit—

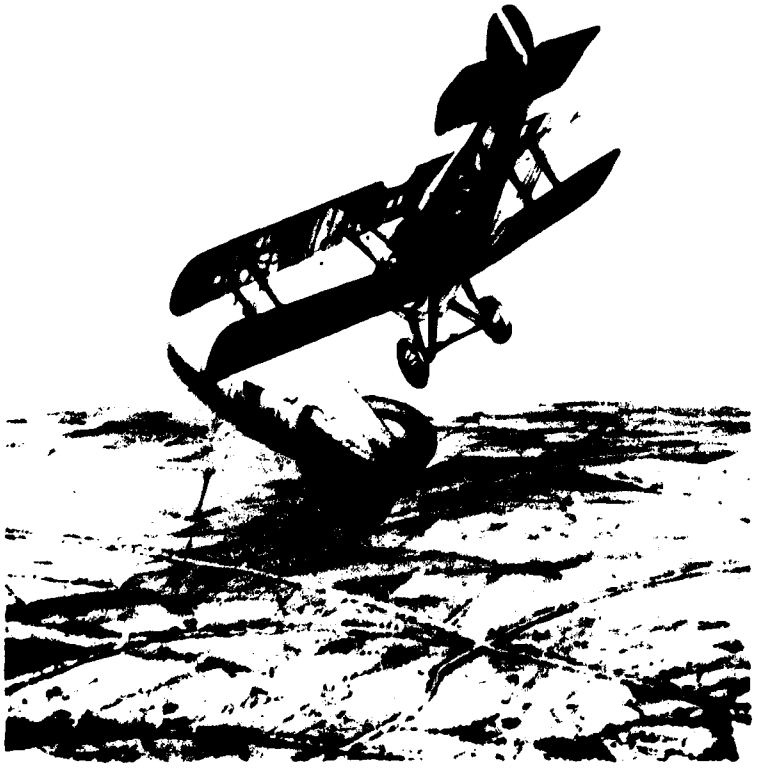
(1) French Air Division Pursuit Aviation—Will be ready to act D-2. It will only be called upon to act during this period, if the activity of hostile aviation should make it necessary to strengthen the Army Pursuit Groups, and only in such proportion as will be necessary to prevent enemy reconnaissance inside our lines.

(2) Army Pursuit Aviation (4 Groups)—It will insure the absolute barrage of the front and protect our observation aviation at every altitude, from the Verdun—Etain Road as far as the Region NE of Nancy. It will carry out offensive patrols; attack balloons and troops on the ground, when ordered.

(c) Army Reconnaisance Aviation—

Photographic reconnaissance will be carried on beyond the line marked by the following points: Pagny-sur-Moselle—Preny—Jaulny—St. Benoit—Vigneulles—Doncourt-aux-Templiers—Maizeray—Etain as far as the Seille Valley and the Metz—Conflans—Etain railway.

Visual reconnaissance will be carried out by day or by night in order to watch the movements of concentration or possible withdrawal of the enemy between the lines mentioned above and the Spincourt—Thionville—Boulay line, according to instructions received from G-2.



(d) Army Artillery Aviation and Army Corps Aviation:

Photographic reconnaissance and visual reconnaissance of kinds ordered by the Army Artillery and Army Corps as far as the line mentioned above.

Spotting of artillery targets and any adjustments or registrations necessary.

B. *Immediate Preparation preceding the attack.*

I. Its general purposes:—The action of aviation should be concentrated forward of the lines, as far as the hostile detraining and refilling railheads throughout the zone of operations. Enemy aviation and balloons should be strongly attacked.

II. Special missions of each branch of Aviation:

(a) Bombardment—Bombardments at medium distance from the zone of attack dealing with detraining and refilling railheads, such as—Metz—Chambley—Conflans—Dommary—Baroncourt—Longuyon—Bridges of the Meuse between Dun and Sedan. Hostile posts of command. Important Aviation Fields, previously ordered by G-3.

(b) Pursuit:

(1) Aerial Division—Will destroy all hostile aviation and balloons throughout the zone assigned to the Army Corps as far as the lines of exploitation, and on the flanks, as far as 12 kilometers north of Pont-a-Mousson, and as far as Etain inclusive.

(2) Army Pursuit Groups—

Will destroy all hostile aviation in front of our lines to a depth of five kilometers.

Will insure the absolute liberty of action of our observation aviation and balloons throughout this zone.

Will attack these hostile balloons, which are considered especially dangerous.

(c) Army Reconnaissance Work—Reconnaissance (photographic and visual) of the whole sector allotted to the Army Observation Group.

(d) Artillery and Army Corps Aviation:—

(1) Photographs of destructions.
(2) Observation of Artillery fire.
(3) Surveillance.
(4) Reconnaissance and command

C. *The attack (1st and 2nd days).*

I. General Purposes—Same as during preceding period. The aviation will take every occasion to attack troops, trains and important targets on the ground.

II. Especial Missions of each Branch of Aviation—

(a) Bombardment—Attack of all important objectives such as large gatherings of troops, material, airdromes and P.C.'s.

(b) Pursuit—Same as during preceding period. Moreover, low flying patrols should attack with bombs and machine guns, either enemy re-inforcements marching to the attack or enemy elements retreating.

(c) Army Reconnaissance—Same as during preceding period.

(d) Army Artillery Aviation and Army Corps Aviation—

(1) Observing artillery fire and its destruction.

(2) Liaison with infantry.

(3) Observation for the benefit of the high command of the maneuvers of the enemy.

D. *The Exploitation.*

The same system will be followed as in the period of attack—it being varied according to the necessities of the moment.

E. *Appendices.*

Appendix No. 1 shows the distribution of the Air Forces;[c]
Appendix No. 2 the plan of Bombardment Aviation;
Appendix No. 3 the plan of Pursuit Aviation;
Appendix No. 4 the plan of Reconnaissance Aviation.

The plans for the utilization of Aeronautical Units with the Army Artillery and with the Army Corps conform to the general scheme and are prepared in detail by those units.

By command of General Pershing:

H. A. Drum
Chief of Staff

Official:
William Mitchell
Colonel A.S., U.S.A.
Chief of Air Service, First Army

Headquarters Air Service, First Army
American Expeditionary Forces
France, September 7th, 1918

Appendix
Number 2.

The Plan of Bombardment Aviation

Four phases are to be considered:

1. Preparation—Before the attack until the time of artillery preparation.

2. During the Artillery preparation.

3. Day of the Attack—On the day of the attack from the hour of the attack.

4. Exploitation.

1. *Preparation*

Object: To hinder enemy concentration by railroads, (arrival of reinforcements and supplies of any nature). Destruction of enemy aviation on its flying fields.

In order to avoid giving the enemy any intimation of the coming attack it is desired that the bombing operations be continued with their present normal activity simply selecting the objectives named below.

Means to employ: Bombardment of the principal railroad centers, points of forced passages leading to the zone of operations *at great distances*. Bombardment of enemy airdromes occupied by bombardment and pursuit aviation. In concentrating on these objectives the Bombardment Aviation to be employed is indicated below:

Objectives	To be Bombarded by	Orders of Mission to be given by	Reports on results to be addressed to
R.R.'s 15 Metz-Sablon 17 Stations 16 *Thionville* 14 Bettemburg 20 Ehrange 19 *Teterchen* *Airdromes* 5 Frescaty 7 Boulay 6 Montoy 9 Buhl	Day and Night British Squadrons	General Trenchard	General Commanding 1st American Army, Chief of Air Service, 1st American Army, by General Trenchard.
R.R.'s 5 Longuyon 8 Conflans 10 Audun-le-Roman 2 Arlon 6 Baroncourt *Airdromes* 3 Mars-la-Tour 9 Puxieux	2 French Night Bombing Groups (at Epiez and Chermisey), each to be under direct orders of the 1st American Army	Chief of Air Service, 1st American Army.	General Commanding 1st Army, G-2, G-3, by Chief of Air Service, 1st American Army

R.R.'s 3 Sedan 2 Mezieres 4 Stenay 1 Vouziers *Airdromes* 2 Mouzon 1 Malny	3 Night Bombing Groups of the C.A.C. (Region Chalons).	French Group of Armies of the Center.	General Commanding 1st Army, Chief of Air Service, 1st American Army, by C. O., G. A. C.
Same targets as for the above French Night Bombing Groups of the G.A.C.	The Day Bombing Groups from a Brigade of the French Aerial Division as soon as they are ready. These Groups will go over the lines W. of Verdun.	Chief of French Aerial Division (or Brigade)	General Commanding 1st Army, G-2, G-3, Chief of Air Service, 1st American Army by Commanding Officer of the Fr. Aerial Division (or Brigade)

2. *During the Artillery Preparation.*

Object: To hinder transportation and detraining of troops in zone of operations. Destruction of enemy aviation on its flying fields. But the present normal bombing activity will be continued through this phase, in order to adhere to the surprise element in the coming attack.

Means to employ: Destruction of railroad centers and other points of forced passages (bridges on the Meuse and Moselle), around the zone of operations at *average distances*, and at the same time the concentration of troops and supplies of all kinds.

To attack the principal airdromes as indicated below:

Objectives	To be bombarded by	Orders of mission to be given by	Reports on results to be addressed to
R.R.'s: 15 Metz-Sablon 17 Stations 16 Thionville 18 Courcelles	British Day and Night Squadrons 4 Night and 3 Day	General Trenchard	General Commanding 1st Army Chief of Air Service, 1st American Army by General Trenchard

Airdromes: 5 Frescaty 7 Boulay 6 Montoy			
R.R.'s 5 Longuyon 9 Mars-la-Tour 8 Conflans 6 Dommary-Baroncourt 1 Vallercy dump *Airdromes:* 1 Malny 2 Mouzon 3 Mars-la-Tour 4 Puxieux	2 French Night Bombing Groups (Epiez and Chermisey) Day Bombing Groups of the Fr. Aerial Brigade under the orders of the 1st American Army.	General Commanding 1st American Army, through Chief of Air Service, 1st American Army	General Commanding 1st Army, Chief of Air Service, 1st American Army by the Commanding Officer of Night Bombing Groups and by the C.O. of the French Aerial Division (or Brigade).
R.R.'s 3 Sedan 1 Vouziers Bridges from Dun to Sedan	3 French Night Bombing Groups of G.A.C. (Region of Chalons).	French Group of Armies of the Center.	General Commanding 1st Army, Chief of Air Service, 1st American Army, by C.O., G.A.C.

3. *Day of the Attack—On the day of the attack from the hour of the attack.*

In general, the targets indicated hereafter, including any important objectives such as troop concentrations or dumps of material (concentration of troops, columns, bivouacs, etc.), reported by aerial reconnaissances, by observation posts or seen by the bombers themselves. But the greatest emphasis should be given to the part relating to the bombing of enemy P.C.'s and also to aerial bombing and fighting in close liaison with our own infantry.

Objectives	To be bombarded by	Orders of mission to be given by	Reports on results to be addressed to
R.R.'s 15 Metz-Sablon 17 Stations 18 Courcelles	3 British Day Bombing Squadrons	General Trenchard	General Commanding 1st American Army, Chief of Air

	Dumps and troop concentrations			Service, 1st American Army by General Trenchard
12	Pagny-sur-Moselle			
9	Mars-la-Tour			
	Dumps			General Commanding 1st Army, G-2, G-3, Chief of Air Service, 1st American Army, by Commanding Officer of the French Aerial Division (or Brigade)
8	Thiaucourt	French Day Bombing Squadrons of Aerial Brigade	Chief of French Aerial Division	
6	St. Jean-les-Buzy			
10	Chambley			
7	Landres			
5	Dommary-Baroncourt			
3	Muzery			
1	Loison: also any troop concentrations and posts of command or communication centers that can be located			

Night Squadrons same general targets as Day Squadrons, also R.R. centers where reserves detrain.

4. *Exploitation*

After the days of the attack, exploitation and continuation of attack.

Observations—Here, too, special emphasis should be given to the part relating to the bombing of enemy P.C., gathering of troops, columns, etc., in close liaison with our infantry. Objectives will be determined according to situation at the time being.

The targets in each case are given in order of their relative importance and in general should be bombed in that order.

The French Bombing Units will be furnished by the 1st American Army with all the documents, maps, information and objectives, etc., which may be necessary for them and which they may not have in their possession for the execution of their missions.

William Mitchell
Colonel, A.S., U.S.A.
Chief of Air Service, 1st Army

Headquarters Air Service, 1st Army
American Expeditionary Forces
France, September 7, 1918

Appendix
Number 3

The Plan of Pursuit Aviation

Composition

1st Pursuit Group, at Rembercourt under command of Major Hartney.

1st Pursuit Wing of 3 Pursuit Groups and 1 Day Bombardment Group under command of Major Atkinson at Toul. 2nd Pursuit Group. Toul; 3rd Pursuit Group, Vaucouleurs North; G.C. (French) No. 16, Vaucouleurs South; 1st Day Bombardment Group, Amanty.

Zone of Action

1st Pursuit Group (Major Hartney) between line Verdun—Eix—Etain, and line Spada—Heudicourt.

1st Pursuit Wing (Major Atkinson) between line Spada—Vigneulles, and line Nancy—Sologne.

These units will be used to fulfill the missions prescribed in the plan throughout the sector of the front mentioned above.

The density, the strength, the altitude, the general mode of work of the patrols will be settled according to the variations of activity of the enemy, and according to the missions which have to be fulfilled, as set down in the plan of employment.

Strength Held in Reserve—Major Atkinson will draw from his wing a certain number of squadrons and hold them in reserve. They will be used to vary the density of Aviation on any given point of the Army front according to the activity of hostile aviation, and the situation; and also, to outmaneuver hostile aviation by operating alternately eastward or westward.

Liaisons—To the effect, Major Atkinson will keep in close touch with:

1. 1st Pursuit Group at Rembercourt.
2. The Army Anti-aircraft service.
3 The radio-goniometric service of the Army.
4. The Chiefs of Air Service of Army Corps.
5. The Chief of Air Service of the Army.
6. The Army Observation Group.

He will ask these units, especially the Chiefs of Air Service of Army Corps, for all information concerning:

Activity of hostile aviation.

Location of our lines.

Operations going on throughout the sector.

Work done by our Observation Aviation, and what help can be given them.

He will transmit all orders issued and information gathered by his wing to:

The Chiefs of Air Service of the Army Corps.

The Commanding Officer of the French Air Division (or to the Commanding Officer of the Brigades).

The Chief of Air Service.

The Commanding Officer of the 1st Pursuit Group (Major Hartney) will maintain the same liaisons as far as he is concerned with Anti-aircraft Artillery and with the Chiefs of Army Corps Air Service included in his sector of front, as prescribed for the Commanding Officer, 1st Pursuit Wing (Major Atkinson).

Liaison with the Pursuit Groups of Neighboring Armies—The Commanding Officer, 1st Pursuit Wing (Major Atkinson) will be in liaison with the Pursuit Group of the VIII French Army. The Commanding Officer of the 1st Pursuit Group (Major Hartney) will be in liaison with the Pursuit Group of the II Army (French), so as to ascertain to what extent and under what conditions these Pursuit Groups are working on the flanks of the Pursuit Aviation of the 1st American Army.

Orders Issued by the Chief of Air Service—The Commanding Officer, 1st Pursuit Group (Major Hartney), and the Commanding Officer, 1st Pursuit Wing (Major Atkinson), will operate in accordance with the general plan without waiting for specific or detailed orders.

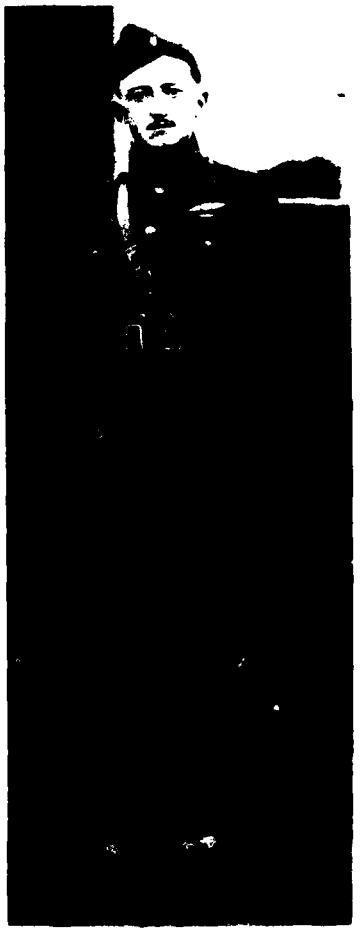
When necessary, special orders will be issued by the Chief of Air Service in the evening for the next day or during the day for immediate action.

When specially ordered, a general reserve will be held under the direct orders of the Chief of Air Service of the Army.

Information Concerning the Enemy—During their flights, pursuit pilots will gather all important information about the enemy such as abnormal activity in enemy lines, all kinds of large convoys, important enemy formations or accumulations of material.

Important information of this nature will be sent to the Chief of Air Service of the Army for transmission to G-2.

William Mitchell
Colonel, A.S., U.S.A.
Chief of Air Service, 1st Army



Maj. Harold E. Hartney, Commanding Officer, 1st Pursuit Group.

Headquarters Air Service, First Army
American Expeditionary Forces
France, September 7th, 1918

Appendix
Number 4

The Plan of Reconnaissance Aviation

Maj. John N. Reynolds, pilot and chief observer, 91st Aero Squadron.

1. Means
   Army Day Reconnaissance
   Normal means—2 Army Reconnaissance Squadrons under the command of Major Reynolds, at Gondreville.
   Emergency means—Special details from the French Aerial Division.
   Night Reconnaissance
   Normal means—Details from Night Bombardment Groups at Epiez. One American Squadron at Amanty, under the command of Major Villome at Epiez. (Branch Intelligence Officer at Amanty).
2. Zone of Reconnaissance
   Closest Limit—Etain—Maizeray—Vigneulles—Rembercourt-sur-Mad—Pagny-sur-Moselle—Vigny.
   Farthest Limit—Spincourt—Thionville—Boulay.
   Western Limit—Etain—Spincourt.
   Eastern Limit—Vigny—Courcelles—Boulay.

In principal the reconnaissance beyond the line Vallee-de-la-Seille—Metz—Conflans—Etain, will be made by photography.

3. Objects of Reconnaissances and Itineraries—Will be determined by G-2, which will send to the Commanding Officers of the Reconaissance Groups, all the useful documents and the maps of the itineraries.
4. Orders of Missions and Summaries—The Chiefs of the Day and Night Reconnaissance Groups will receive their orders of mission direct from G-2, and will send their summaries to that Office.
5. Execution of the Missions—
   First Phase (Preparation).

The photographic reconnaissance will be made at a high altitude with Camera 50, with magazine, and with a powerful lense camera in order to obtain the details of the important points.

The visual day reconnaissance should start before daybreak in order to fly over the enemy lines at the first light of the day, and in order to observe the end of the night movements of the enemy. Reconnaissance will be made at the end of the day in order to observe the beginning of the night movements.

In the middle of the day, the surveillance of the enemy lines

will be mainly done by balloons, especially by those of the Army Artillery.

Second Phase (Artillery Preparation).

Photographic reconnaissance will be made in order to notice the destruction caused in the Zone of the Army Reconnaissance (either by gun or by plane) or the important movements or concentration which could be taken as objectives by the Bombardment Aviation.

Visual Night Reconnaissance will be made, when necessary, at low altitude in order to determine exactly the direction and the importance of the movements, the strength of the enemy troops and to observe the movements of retreat.

Command Reconnaissance—One flight will be kept in reserve at the disposal of G-3 in order to perform command reconnaissances (immediate verification of important information, immediate seeking out of any special information requested by G-3).

Third Phase (Attack—first and second days). Frequent visual reconnaissances at low altitude will be made in order to keep constant information of the aspect of the enemy sector, mainly between the line—les Eparges—Fey-en-Haye (Pont-a-Mousson) and the line—Arnaville—Conflans—Etain, in order to determine the important detrainments, concentrations, convoys, bivouacs, the direction of movement and dispositions of the enemy.

Fourth Phase (Following up the Attack). The mode of employment of Reconnaissance Aviation will be determined, according to the situation after the attack.

6. Special Dispositions—The summaries of the Information gathered will be sent to the following at the same time as they are sent to G-2:

The French Air Division.

The Commander of the Night Bombardment Groups.

The Commander of the Army Reconnaissance Group (Major Reynolds).

The Aeronautique of the neighboring armies.

At Laheycourt.

At Flavigny.

The important and urgent messages will be dropped at the Army Dropping Ground 2½ kilometers southeast of Ligny-en-Barrois, by the Reconnaissance Airplanes when they return. These messages will be confirmed afterwards in the usual summary.

Reports of enemy movements, etc., requiring immediate action will be made by the most direct means of communication directly to G-3, Army Headquarters.

William Mitchell
Colonel, A.S., U.S.A.
Chief of Air Service, 1st Army

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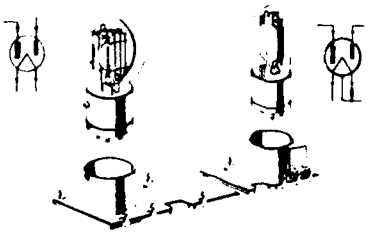
For the Battle of St. Mihiel, the Signal Corps established and operated a network of radio stations to intercept radio signals from, and to transmit and relay reports concerning, enemy aircraft operating in the First Army sector. The net included four observation (intercept) posts as well as stations at Headquarters of the First Army and at the U.S. pursuit bases in the area. One of these stations, that at Vaucouleurs, served as the command post for the net. The procedures outlined below provided for "alert" messages as well as periodic reports of enemy aircraft activity. The French Air Division and the French Eighth Army also were tied into the net, and provisions were made, although apparently not implemented, to include an airborne station (*Doc.* 41).



American Expeditionary Forces
Headquarters, 1st Army
September 7, 1918

Memorandum #1

Composition of Anti-Aircraft Radio Net

1. Composition of Net.

Stations	*Call Letters*
Dieulouard Observation	Sheet A Line 16
Royaumeix Observation	Do A Do 17
Commercy Observation	Do A Do 18
Les Monthairons Observation	Do A Do 19
Toul Pursuit	Do A Do 20
Vaucouleurs Pursuit	Do A Do 21
Rembercourt Pursuit	Do A Do 22
Air Service, 1st Army	Do A Do 10

Wavelength of the net—1130 meters.

2. Code to be Employed.
   1. Periodical Messages: Each even hour (6, 8, 10, etc. until 20) the Observation stations will transmit a message made up in the following manner:
      1st. Call Letter of station.
      2nd. Letter "R" followed by the number of enemy pursuit planes seen during the previous two hours.
      3rd. Letter "F", if pursuit planes were observed in Allied territory. Letter "D" if observed in enemy territory.
      4th. Letter "A" followed by a number giving the average altitude in thousands of meters of pursuit planes.
      5th. Letter "B" followed by number of enemy artillery observation planes seen during previous two hours.
      6th. Letter "V" followed by number of enemy observation and photographic planes seen during previous two hours.
   2. Special Messages: These messages may be transmitted at any time, and are made up in the following manner.
      1st. Call letters of the observation station.
      2nd. Number of enemy planes observed.
      3rd. Letter N, S, E, or W, giving the direction of the enemy planes from the observation post.
      4th. Direction of flight of the enemy planes. Letter N, S, E, or W. Letter R if the enemy planes are flying in circles.
      5th. A number giving the approximate altitude in thousands of meters of the enemy planes.
      The letter I inserted between the letter giving the direction of flight of the enemy planes and the number giving the altitude means that the alert is of a very urgent character.
3. Regulation of the Net:

The Station at Vaucouleurs will be the P. C. T. (See Wireless Service Regulations). At each even hour, beginning at six (6) o'clock, and ending at twenty (20) o'clock, this station will, in the order given below, call each of the Observation Stations, transmitting "BR" (invitation to transmit). The station called will then send its Periodical Message, as above prescribed.

Order of Transmission:

1. Dieulouard
2. Royaumeix
3. Commercy
4. Les Monthairons

The Pursuit Stations at Toul and Rembercourt will listen-in, but are not to transmit until all the above stations have finished their periodical messages. If difficulty is experienced in the reception of any of these messages, a repetition may be requested from the P. C. T., which station will furnish required information.

It must be understood that all Pursuit Stations will listen-in continuously during the hours of operation, in order to receive any Special Messages from Observation Stations.

Immediately after the transmission of a Special Message, the P. C. T. will call the Pursuit Stations in turn, requesting acknowledgement of the receipt of this message.

4. Liaison with French Air Service Hdqrs. (Division Aerienne): The French Radio Officer of the Division Aerienne will install an E-3-bis Set, which will listen-in for the Periodical Messages sent by the Observation Stations, and may request any repetition from the P. C. T.

By Command of General Pershing:

Hugh A. Drum
Chief of Staff

Official:
Robert Logrhy
Capt. Signal Corps
Radio Officer, 1st Army.

—34—

With French aviation units coming under Pershing's control for the St. Mihiel offensive, Mitchell sought approval for bringing the attached Allied units into the system that had been established for assigning army aviation missions to U.S. units of the First Army (Doc. 2). Col. Hugh A. Drum, Chief of Staff, First Army, approved this plan, which gave Mitchell control of tactical (i.e., pursuit and bombardment) operations of French as well as American aviation of that First Army, and placed reconnaissance operations under the orders of Lt. Col. Willey Howell, Assistant Chief of Staff, G-2, First Army. These procedures, which also covered the handling of mission reports, were announced in a circular issued by Mitchell the following day (Doc. 39).

Air Service, First Army, A.E.F.
Ligny-en-Barrois, Meuse, September 7, 1918

For Chief of Staff, First Army

1. The French Aerial Division has reported this morning and all units of this force will be in place within three days. All other air units, both American and French, are either in place or arriving. The British aviation also is cooperating with us.

2. It is therefore considered very necessary that the control over this very large force be made as simple and as systematic as practicable.

3. The missions of the aviation have been ordered by the commanding general, through G-3, the reconnaissances through G-2; the whole conforming to the plan prescribed in general orders.

4. In order to avoid any doubt in the matter your approval is requested as follows: That all tactical missions for any branch of the army air services be given to the chief of air service for execution. This includes:

All American Army units or French units attached to the Army;
The French Air Division;
The French Night Bombardment Wing.

5. G-2 to give all orders for reconnaissance direct, and receive the reports direct of the reconnaissances ordered by G-2.

6. As the reports of missions performed in the various branches of aviation are addressed to the chief of air service, and as these reports often contain matter of interest to the Chief of Staff, G-2 and G-3, which require immediate action, it is recommended that such data be sent direct from the headquarters of the chief of air service to the necessary offices or officers.

Wm. Mitchell
Colonel, A.S., U.S.A.
C. A. S., First Army

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Headquarters, Air Service, First Army
American Expeditionary Forces
France, September 7th, 1918

Operations Memorandum
Number 7.

Order from Headquarters, 1st Army is attached hereto showing the assignment of the 8th Squadron to the 4th Corps. It is directed that acknowledgement be made of the receipt of same.

By order of Colonel Mitchell

T. DeW. Milling
Lt. Col., A.S., U.S.A.
Chief of Staff

Copies to:
C.A.S., 4th Corps,
8th Squadron

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Headquarters, Air Service, First Army
American Expeditionary Forces
France, September 7th, 1918

Operations Memorandum
Number 8.

Copy of order from Headquarters, First Army is attached hereto which assigns the 50th Squadron to the 1st Army Corps. It is directed that you notify these headquarters immediately upon arrival of all units of this squadron at proper station.

By order of Colonel Mitchell

T. DeW. Milling
Lt. Col., A.S., U.S.A.
Chief of Staff

Copies to:
C.A.S., 1st Army Corps,
50th Aero Squadron.

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Metz, Conflans, and many other important objectives in the zone designated for reconnaissance by army aviation units (Doc. 32, App. 4) were beyond the 15-kilometer limit placed on pursuit operations by the following instructions. Consequently, reconnaissance of rear areas during the Battle of St. Mihiel had to be carried out without pursuit protection except during the first and last stages of a mission.

Headquarters, First Pursuit Wing
Air Service, American E.F.
September 7th, 1918

Operations Memorandum
Number 5.

Protection for the Army Observation Group.

1. Wing Headquarters will designate the Group which will protect the Army Observation Group on the following day, before 14 h 00 daily; and will inform the Group Commander of the Pursuit Group so designated and the Group Commander of the Army Observation Group by telephone.

2. The Group Commander, Army Observation Group and the Group Commander of the designated Pursuit Group will then make arrangements so that the Group Commander of the designated Pursuit Group can inform the Wing Commander, 1st Pursuit Wing, approximately how many sorties the Army Observation Group will require his Pursuit Group to make on the following day. This information will be furnished as early as possible.

3. No protection for the Army Observation Group will penetrate more than 15 kilometers into the enemy lines; it must therefore either clear the way for the Army Observation Planes, escorting them into the enemy lines for a depth of 15 kilometers or else meet the Army Observation planes at a point and time to be agreed upon by the Group Commanders concerned, approximately 15 kilometers in the enemy lines.

By order of Major Atkinson,

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

Members of the First Pursuit Wing staff: (l. to r.) Capt. Philip J. Roosevelt, Maj. Bert M. Atkinson, and Capt. John Wentworth.

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First Army, A. E. F.
Ligny-en-Barrois, Meuse, September 8, 1918

Special Orders
Number 163

1. The following air service units, having been placed at the disposal of the American First Army, will be reported to the Chief Air Service, First Army, for duty:

The French Aerial Division, headquarters at Tannois.

The 2d and 18th groups of night bombardment (French), headquarters at Epiez.

2. The 11th and 20th Aero Squadrons, now stationed at Amanty, are assigned to the First Army Air Service, and will be reported to the Chief Air Service, First Army, for duty.

3. Flights A and C, 360th Park Squadron, now stationed at Colombey-les-Belles, are assigned to the First Army Air Service, and will proceed to Vaucouleurs for station, reporting upon arrival to the Chief, Air Service, First Army, for duty.

By command of General Pershing:

H. A. Drum
Chief of Staff

—39—

Headquarters Air Service
First Army, American Expeditionary Forces
France, September 8, 1918

Circular.

The Chief of Staff, First Army, has approved the following method of command for all air service units belonging or attached to the First Army.

1. All tactical missions for any branch of the Army Air Service will be given to the Chief of Air Service, First Army, for execution. This includes:

All American Units or French Units attached to the Army.

The French Night Bombardment Wing.

The French Air Division.

2. The reports of missions sent to the Chief of Air Service which contain matters of interest and information to the several staff sections will be forwarded directly by him to the officer or officers concerned.

3. G-2 will give all orders for reconnaissance, direct to the Army Reconnaissance Units and will receive the reports direct, of the reconnaissance it orders.

William Mitchell
Colonel, A.S., U.S.A.
C. A. S., 1st Army

—40—

Headquarters
First Pursuit Wing
Air Service, American E.F.
September 8th, 1918

Operations Memorandum
Number 7.

Capture by the Enemy.

1. Organization Commanders are directed to instruct their pilots and observers in the proper conduct in case of capture by the enemy.

2. Prisoners of War are required by International Law to inform the enemy truthfully of their name and their rank. The giving of any information in addition to the above may have extremely serious consequence. However, in answering questions of the enemy, while it is best not to answer at all, in case untruthful answers are given the enemy may deal extremely severely with such a prisoner.

3. Prisoners of War are advised under no circumstances to pit their wits against those of their interrogators. The interrogators are experienced men and if a prisoner talks at all it is almost positive that sooner or later he will give information of value to the enemy.

4. It is possible that immediately after his capture a prisoner may be extremely well treated and even quite generously entertained. Such entertainment is not prompted by motives of affection or hospitality; it is expected to return to the enemy a definite result. Prisoners of War should be cautioned against expanding to their captors, under the influence of generous entertainment, possibly accompanied by alcoholic stimulants.

5. Shortly after his capture a Prisoner of War may be left entirely alone with intimate friends who are in the same unfortunate circumstances. Even under these circumstances conversation must be reduced to the minimum. The employment of the dictograph under

such circumstances is quite general.

6. All pilots and observers should be impressed with the fact that by talking to the enemy, if they are captured, they may do serious harm to the American and Allied Armies and endanger the lives of many soldiers. It is suggested that an Officer who had just arrived at the front for less than 24 hours; or who had just returned to the front after a more or less prolonged stay in the Hospital, would be less likely to be able to furnish information of value and would therefore be less seriously cross-examined, than one who had been at the front for some weeks.

By order of Major Atkinson,

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

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American Expeditionary Forces[a]
Headquarters First Army
September 9th, 1918

Supplement #1 to
Radio Memorandum #1

Composition of Anti-Aircraft Radio Net

I. Messages of Tremblecourt Sector

1. The Radio Station at Royaumeix Observation will be used for the transmission of messages from both Royaumeix and Tremblecourt anti-aircraft sectors.

2. Line #23, Sheet A, on the Chart of Call Letters for undamped wave stations will be assigned to the Tremblecourt Sector.

3. The Radio Station at Royaumeix, upon being called by the P. C. T. will transmit first the Periodical Messages pertaining to the Royaumeix Sector; then, without further instructions, that pertaining to Tremblecourt Sector. Each of these messages will be preceded by the call of the Sector concerned.

II. Receipt of Information from 8th French Army

1. In order that the American Pursuit Groups may be kept in touch with the activity of enemy aviation on our right, the station at Vaucouleurs will listen-in and copy the Periodical Messages sent by the P. C. T. of the anti-aircraft net (8th French Army) to the French Division Aerienne.

2. These messages are transmitted by the 8th Army on demand of the Division Aerienne at approximately fifteen (15) minutes after each even hour on a wavelength of 1450 meters. Call letters will be furnished to the Vaucouleurs station later.

3. The Code employed by the 8th French Army is identical with that prescribed in Memorandum #1. The Observation Station Call letters are as follows:

Malzeville ..... P
Luneville ..... E
Baccarat C

III. An E-3-bis station will be installed at Headquarters, 1st Army for the use of the Chief of Air Service. Material and personnel for this station will be provided by the Air Service.

Call Letters ..... Sheet A, Line 10.

The duties of the station are as follows:

1. To listen-in for Periodical Messages sent by Observation Stations of the 1st Army.

2. To listen-in for messages from the French Division Aerienne concerning the departure of patrols for different sectors of the Front.

3. To assure communication with the Pursuit stations at Toul, Rembercourt and Vaucouleurs.

4. This station will listen-in on the wavelength assigned for the anti-aircraft Net (1130 meters).

IV. Special observation planes equipped with damped wave transmitters may be dispatched for the purpose of sending information in regard to the enemy airplane activity. Should these planes be employed,[b] Pursuit Group Stations will be equipped with a Type A1 receiver and amplifier, to enable them to obtain this information. The wavelength to be employed is 500 meters. The code used will be as follows:

1st. Call Letters of airplane WDA, or WPA, for the 1st Army.

2nd. Area over which enemy planes have been seen. This will be designated by one (1) letter and one (1) numeral, letter representing sectors as shown on map issued by Air Service, numeral giving distance from line in kilometers (even numerals for areas in Allied territory, odd numerals for enemy territory).

3rd. Letter "R" followed by number of pursuit planes seen.

4th. Letter "B" followed by number of artillery ranging planes.

5th. Letter "V" followed by number of Operation and photographic planes seen.

6th. Letter "A", followed by average altitude of enemy planes.

7th. One of the following groups:

G.A. (great activity)
N.A. (normal activity)
F.A. (Slight activity)

These planes may also transmit information regarding the visibility, using for this purpose, the letter "W", followed by a numeral (0 to 5, 0 meaning very poor visibility, 5 meaning excellent visibility)

By command of General Pershing:

Hugh A. Drum
Chief of Staff

Official:
Robert Loghry
Capt. Signal Corps,
Radio Officer, 1st Army

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Headquarters, Air Service, First Army
American Expeditionary Forces
France, September 9th, 1918

Operations Memorandum
Number 10.

1. It is directed that effective this date, Operations Reports from all units will show the following information by Squadrons:
   Pilots on roll
   Pilots available
   Observers on roll
   Observers available
   Planes on hand
   Planes available.
2. It is further directed that all units hereafter report immediately any points of unusual importance occurring during the course of the day. This includes important combats, planes lost over the enemy lines, etc.

By order of Colonel Mitchell

T. DeW Milling
Lt. Col., AS., U.S.A.
Chief of Staff

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Headquarters Air Service, First Army
American Expeditionary Forces
France, September 9, 1918

Circular No. 2

1. The 1st Air Depot, at Colombey-les-Belles, will supply all American squadrons with replacements of officer personnel (ground officers, pilots and observers).

2. A report from the Wing and Group Commanders will accompany the operations report, sent to the Air Service, 1st Army, each evening, requesting the number of replacements necessary for their units. The allocation of this personnel will be made from these headquarters, the 1st Air Depot being given the necessary instructions will furnish them.

3. The provisions of General Orders No. 111, G. H. Q., A. E. F., July 8, 1918, will apply with reference to the replacements of enlisted personnel.

By order of Colonel Mitchell

T. DeW. Milling,
Lieut. Col., A.S., U.S.A.
Chief of Staff

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The various corps and divisions of the First Army prepared their own detailed plans for the employment of their aviation in the Battle of St. Mihiel. The plan for the employment of the aviation units of one corps is included later (Doc. 49). The field order printed below details the role assigned to aviation units of the 5th division. Some of the most critical and most difficult problems in aviation operations in direct support of ground forces were in the area of communications. Signalling systems used at St. Mihiel are described in the liaison plan annexed to the division field order.

5th Division
9 Sept., 18
12 Hours

Field Order
No. 41

Maps: Commercy 1/80000
Chambley
Bois de Prete 1/20000

I. (a) General object of the offensive: The reduction of the St Mihiel salient.

(b) Mission and Zone of the 1st Army Corps: (See map attached.) The 1st Army Corps will attack between Limey (inclusive) and Bois de Prete (exclusive), and will hold on the remainder of the Corps front.

(c) The 90th Division will attack on the right of, and the 2nd Division on the left of the 5th Division.

. . . . . .

III. General Instructions:

. . . . . .

(g) Air Service: See Annex to paragraph III (g). To the 5th Division are attached the following units:

12th Aero Squadron.
Balloon Company No. 2.

. . . . . .

Jno. E. McMahon
Major General

Annex No. 2 (Par. III g).

Plan for Air Service.

1. Aviation:

The 12th Aero Squadron (18 planes—Aerodrome: Toul) is assigned to the 5th Division for all aviation duties. This squadron will be charged with the following:

Visual reconnaissance.
Surveillance.
Infantry contact patrols.
Adjustment and control of fire of divisional Artillery,
Alert planes for special missions,
Photographic missions required by the 1st Army Corps,
Protection of tanks from hostile aeroplane.

Position of front line troops will be staked out when called for by aeroplanes. A dropping ground will be established near each P. C., (exact location designated later) where panels may be displayed for signalling to aeroplanes. The Division liaison officer will provide teams of special observers at the dropping ground to watch for aeroplane signals and a relay of runners to deliver messages to the Division P. C.

The aero squadron will keep 2 planes constantly on the alert from 1/2 hour before dawn throughout the hours of daylight, and will receive its orders direct from the Division Commander by telephone, radio or special courier or through the Chief of the Aviation Service, 1st Army Corps.

Missions for the divisional artillery will be ordered by the divisional artillery commander direct or through the division

commander, or through the Chief of the Aviation Section, 1st Army Corps. The squadron will maintain a liaison officer at the headquarters of this Division, who will be responsible that orders are transmitted to the squadron and that the reports are received at division headquarters without delay.

Planes returning from missions of any kind will drop messages, giving full reports of the results of their missions, at the Division P. C. The squadron will keep a surveillance plane constantly over the divisional sector of attack throughout the hours of daylight, and will be in continual communication by radio with the division P. C., and the artillery battalion assigned for fugitive targets.

Artillery adjustment planes will be sent out as ordered by the division artillery commander.

The office of the Chief of Air Service, 1st A. C., will be maintained at Headquarters, 1st Army Corps. The office of the Group Commander, 1st Corps Observation Group will be maintained at the aerodrome at Toul. An officer will be on duty at each of these offices throughout the 24 hours of the day during active operations. Markings, and conventional signals and panels indicated in Liaison Plan.

2. Aerostation:

The 2nd Balloon Company (camp and balloon bed in Bois de Remenau-Vaux, one and one-half kilometer northeast of Griscourt) is assigned to the 5th Division and will perform the following duties:

Surveillance and visual reconnaissance of the division sector.

Spotting of enemy batteries.

Adjustment and control of fire of divisional artillery.

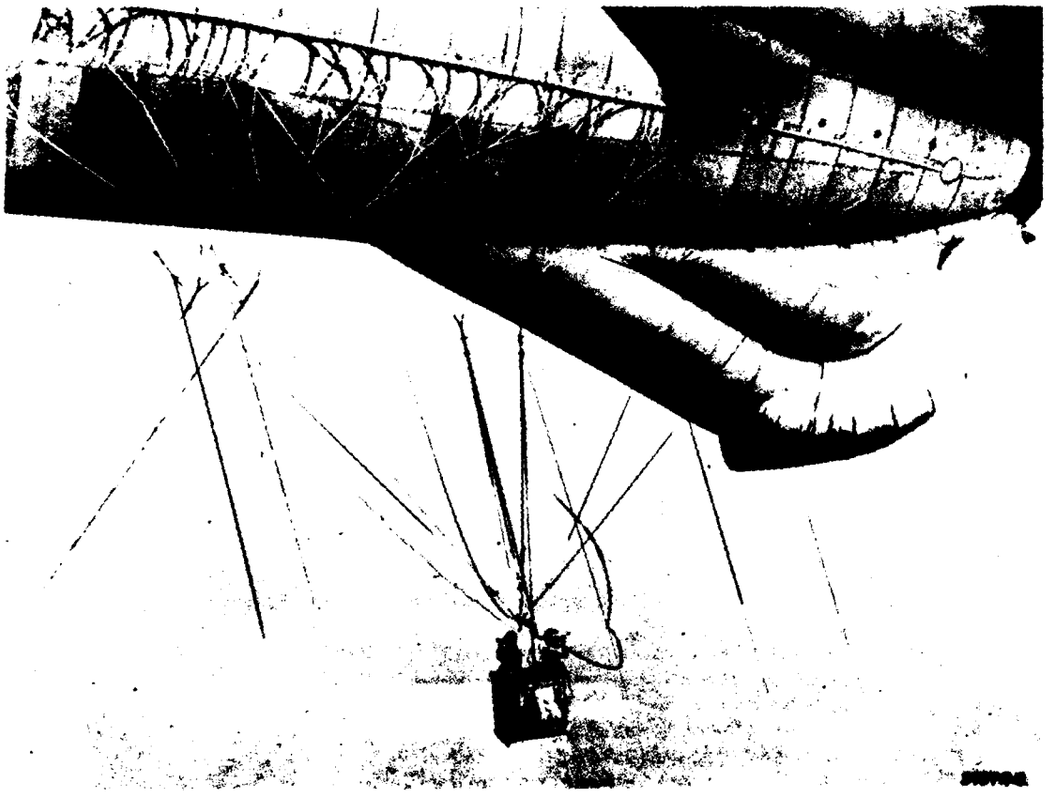
These balloons will receive orders direct from the division commander by telephone, radio, or special courier, or from the Chief of the Air Service, 1st Army Corps, or from the balloon wing commander.

Balloons will ascend at dawn, weather conditions permitting, and will remain continuously in ascension whenever observation is possible. Each balloon company will, at all times, have direct communication with the nearest battery of anti-aircraft artillery and will immediately notify such battery of any change in location of point of ascension.

Direct communication will be established from the balloon company to the headquarters of the divisional artillery in order that enemy activity, requiring artillery action, may be reported direct to artillery headquarters.

During active operations the balloon company will maintain an officer at division headquarters and will be responsible that any enemy movements and activities in the rear areas are promptly reported to the division commander.

. . . . . .



An observation balloon.

Annex No. 8 (Par. 5a.)

Plan of Liaison.

I. Telephone liaison of the 5th Division.

II. Table of indicatives and technical characteristics for transmission by radio.

III. Characteristics for aeroplanes and balloons assigned to mission with the infantry.

IV. Signal Codes
  1. Signals made by the Infantry
    (a) By fireworks
    (b) By panels
  2. Signals made by the Infantry aeroplanes.
    (a) By fireworks
    (b) By radio
  3. Signals made by balloon

V. Keys and ciphers employed.
VI. Liaison by pigeons
VII. Liaison by runners and couriers
VIII. Liaison axes
IX. Liaison (Agents, Officers and N. C. Os.)
X. Weighted Messages
XI. Advance center of information
XII. Visual Signals

Chapter I.

Telephonic Liaison of the 5th Division

1. Telephone Inter-Divisional Code Series D. Supplement X issued Sept. 9th, 1918.

2. 1st Army Corps P. C. Code name is Buster
2nd Division (on left) Code name is Surprise
90th Division (on right) Code name is Taylor

3. In addition to the above the following code names and numbers have been assigned offices and organizations of First Corps:

Hqs. Balloon Wing A	Buster 40
Headquarters Observation Group	Birdie
1st Balloon Company	Basket
2nd Balloon Company	Billows
5th Balloon Company	Breeze
42nd Balloon Company	Brilliant

Chapter III.

Characteristics of Aeroplanes and Balloons.

Observation Squadron No. 1	2d Div	Streamer on Left Wing
Observation Squadron No. 2	5th Div	Streamer on both wings Fires two cartridges, each of two stars
(fr) Observation Squadrons No. 208 and 214	Corps Heavy Artillery	

(Fr) Observation Squadron No. 50	90th and 82d Div	Streamer on right wing

American Balloons:

B-1	2nd Division	One streamer
B-2	5th Division	Two streamers
B-12	90th and 82nd Division	Three streamers
B-5	Corps Artillery	

Any balloon is to work for any artillery, army corps and division when called upon: Provided this work does not interfere with assigned mission.

Teams of observers to watch for plane signals will be established at each P. C. consisting of one N. C. O. and four men.

Marking front line positions:

1. When called for by the airplane the front lines if in the open will be marked by the use of the marking panels, if in the woods by the use of Red Bengal flares. Bengal flares will be lighted two at a time a few feet apart.

Platoons in rear of friendly troops will not mark their positions.

Battalion and Regimental P. C.'s will indicate their positions by displaying their identification panels.

Chapter IV.

Signal Codes

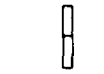
1. Signals made by the Infantry.

(a) By fireworks.

Objective reached	Yellow smoke rocket
Request for barrage fire	Six star V. B. cartridge
Friendly light artillery is firing on us	Three star V. B. cartridges
Friendly Heavy Artillery is firing on us	Three star V. B. cartridge followed by green parachute V. B. cartridge
We are going to advance, increase range	Rocket with green stars
We are here	Bengal red flare
Message understood	One red rocket
Repeat signal or message	One white rocket
One hour delay ordered in execution of next phase.	Caterpillar rocket followed by flag rocket

(b) By panels:
The panel signals in columns 2, 3 and 4, pages 76-77, "Liaison for All Arms" will be used. Light Artillery No's 1 to 23 inclusive.
Heavy Artillery No's 24 to 46 inclusive.

(c) Optional Signals:


Where are the P.C.'s of my units?

Tell me what you see on my right.

Tell me what you see on my left.

Where are my advanced elements?

Report that I am ready to advance.

First phase first day's objective reached.

First day's objective reached.

First phase second day's objective reached
(to be used on D day if objective is reached on that day.)

Army objective reached.

Fireworks used by infantry to signal aviators.

2. Signals made by Infantry Aeroplane.

(a) By fireworks.

I am the Aeroplane of Right Division.	1 cartridge of one star.
I am the Aeroplane of the 5th Division.	2 cartridges each of two stars.
I am the Aeroplane of left Division.	2 cartridges each of 1 star.
Where are you (call for marking out line),	1 cartridge of six stars.
Understood.	1 cartridge of three stars.
Threatened counter attack in my direction	1 caterpillar.
Anti-tank gun at this point	Yellow smoke.

(b) By means of Radio telegraphy.

Table No. 1.

ART	Artillery.
AVI	Enemy airplane.
BAV	Anti-aircraft battery.
BCA	Anti-tank battery.
BTA	Battery in action.
BTO	Battery occupied.
CAV	Cavalry.
COV	TRAIN (Convoy).
DIR	Direction (followed by the name of the locality).
DRO	Right at------
EST	East of------
FDF	Wire.
FRO	Front (followed by a figure indicating the length in meters.)
GAU	Left at------
IFG	Infantry in columns.
IFD	Deployed infantry.
IFR	Massed infantry.
IDI	Here available airplane.
NOR	North of------
OUS	West of------
PRF	Depth (followed by a figure).
QUE	Rear at------
RAS	Nothing to signal.
SUD	South of------
TAM	Friendly troops.
TCF	Railway Train.
TET	Head at.
TRA	Trenches.
REG	Airplane wants to adjust (Signal to be sent after the objective has been designated, wherever the observer is in position to secure satisfactory adjustment.)
RLV	Relieve me.
VRV	Am coming to relieve you.

Table No. 2.

TJRS	Communicating Trench
TAVX	Trench
TPZB	Grenade fight at------
TEHO	Command post of battalion at------
TOUK	Command Post of Brigade at------
TMSV	Command post of division at------
TGOR	Command post of regiment at------
TUBC	Indication of enemy attack at------

TKRP I do not see troops at------
TVBO Friendly troops at------
TBAU Friendly troops progressing at------
TCOJ Friendly troops stopped while progressing at------
TIMD Friendly troops retreating at------
TFPA Enemy troops at------
TNBR Enemy troops progressing at------
TRUS Enemy troops retreating at------
TDNP Very heavy enemy barrage fire at------
TXCB I see no points of fall at------
THBV Friendly tanks moving at------
TLML Friendly tanks stopped at------
TZAO Enemy tanks at------
TSIG Enemy machine guns at------

(c) Signals made by Balloons. (Same as Aeroplane).

Chapter V.

Keys and Ciphers Used.

(Changes will be announced from time to time.)
Keys and bands of ciphers for coordinates 324 now in effect.
Code now in effect: Wabash
Messages by courier or runner need not be in code or cipher.

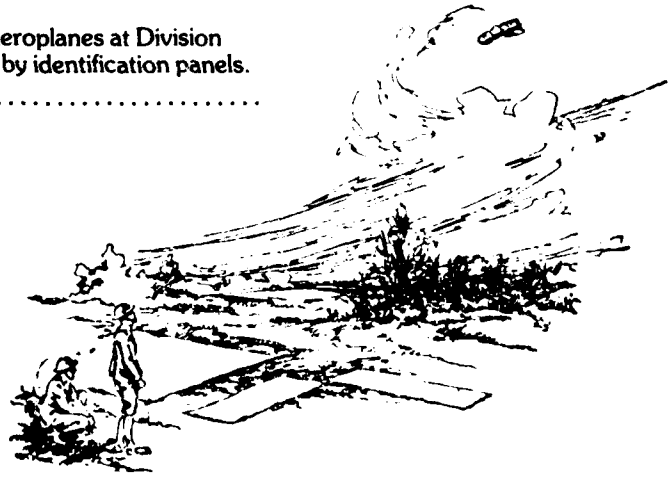
. . . . . .

Chapter X.

Weighted Messages.

Weighted messages will be dropped from aeroplanes at Division and Artillery Headquarters; at points located by identification panels.

. . . . . .



Panel signal to airplanes: "Battery has fired."

—45—

Pershing wanted to fight the Battle of St. Mihiel before the rainy season, which usually began about the middle of September. To avoid getting bogged down in mud on the Woevre plain, he had hoped to launch his offensive by 7 September, or by the 10th at the latest. Difficulties in assemblying his forces, especially a wait for some French artillery, made it necessary to delay the attack. It was raining on 10 September, and had been on and off for five days, when Drum informed the various commanders of the day and hour of attack. The weather would continue to be bad on the 11th, and it would be pouring down rain when the attack began on the 12th.

First Army, A.E.F.
Office of the Chief of Staff
Ligny-en-Barrois, September 10, 1918

From: Chief of Staff
To: Commanding Generals, I Corps, IV Corps, V Corps, II Colonial Corps, Chief of Artillery, First Army, Chief of Air Service, First Army, A. C. of S., G-3, First Army, French Second Army, French Eighth Army

The army commander directs you to be informed as follows:

(a) The day of the attack is September 12, 1918.

(b) The hour of the attack will be 5 a.m., i.e., H (hour) is 5:00, Sept. 12, 1918.

The I and IV Corps will attack at H hour.

The V Corps will attack at H plus three hours.

The Fr. II Col. A. C. will attack as follows:

(1) The attack west of IV Corps at H plus one hour.

(2) The attack south of the V Corps at H plus four hours.

(3) Designated raids will be at H plus no hours, i.e., at H hour.

(c) The artillery bombardment will commence at:

(1) I and IV Corps at H minus 4 hours.

(2) V Corps at H minus 4 hours.

(3) II Col. A. C.

(A) The attack west of IV Corps at H minus 4 hours.

(B) The attack south of V Corps at H minus 4 hours.

(C) The designated raids and rest of front of this corps at H minus 4 hours.

H. A. Drum
Chief of Staff

—46—

American Expeditionary Forces
Headquarters First Army
September 10, 1918

Supplement #2
to Radio Memorandum #1.

Composition of Anti-Aircraft Radio Net.

1. Section I, paragraphs 1, 2 and 3 "Messages of Tremblecourt Sector" to Supplement #1, Radio Memorandum #1, Headquarters, 1st Army, September 9, 1918, are hereby revoked.
2. An undamped wave station will be provided at Tremblecourt for the use of the Observation Station at that place.
3. Call Letters, Sheet A, Line 23.
4. The P. C. T. at Vaucouleurs will call the Observation Stations for their Periodical Messages in the following order:
   1. Dieulouard
   2. Tremblecourt
   3. Royaumeix
   4. Commercy
   5. Les Monthairons

By Command of General Pershing:

Hugh A. Drum
Chief of Staff

Official:
Robert Loghry
Capt., Signal Corps
Radio Officer, 1st Army

Note: This Supplement #2 is to be attached to Radio Memorandum #1, Headquarters First Army, American E. F., Subject "Composition of Anti-Aircraft Radio Net", dated September 7, 1918, and distributed to aviation units attached to 1st American Army.

—47—

5th Division
10 Sept. 18

Memorandum.

The following changes and corrections are made in annexes to Field Order No. 41, these headquarters.

. . . . . .

Correction to Annex No. 8. Add:
Balloon #5 assigned to Corps Artillery: observation for adjustment and control of fire.
Balloon #1 assigned to Division.
Balloon #2 already assigned to Division will make no observation for fire control.
Radio call.
Balloon #5—ED2
Balloon #1—AP6
Balloon #2—AP2

. . . . . .

By command of Major General McMahon:

C. A. Trott
Chief of Staff

—48—

Headquarters Air Service First Army
American Expeditionary Forces
France, September 10th, 1918

General Orders
No. 3.

Par. 1. General Orders No. 1, August 28th, 1918, is amended to read as follows:
Paragraph 2, after Assistant Operations Officer, insert Assistant Operations Officer in Charge of Army Artillery Squadrons (French): Captain P. A. Block, Aviation French Army (during operations).
Paragraph 8, fourth line, strike out word Vavincourt.

By order of Colonel Mitchell.

T. D. Milling
Lt. Col., A.S., U.S.A.
Chief of Staff

Official:
W. P. Kelleher,
Major, A.S., U.S.A.
Adjutant.

—49—

American Expeditionary Forces
American Air Service
Headquarters Air Service
Fifth Army Corps
10 September 1918

From: Chief, Air Service, Fifth Army Corps
To: Commanding General, Fifth Army Corps, American Exped. Forces
Subject: Plan of employment of Air Service Units Fifth Army Corps.

I. Units:
99th Aero Squadron
104th Aero Squadron
42nd (French) Aero Squadron
6th Balloon Company
7th Balloon Company
8th Balloon Company
12th Balloon Company

II. Employment of Units:
(a) Army Corps
Squadron, 99th Aero
Photographs of Corps Sector
Command Plane
Adjustments with Corps Artillery
Visual Reconnaissance Corps Sector
Balloon Company No. 7
Surveillance
Adjustments Artillery

(b) 26th Division:
104th Aero Squadron: (Minus one flight)
Adjustment Divisional Artillery
Infantry Contact
Visual Reconnaissance
Balloon Company No. 6:
Adjustment Artillery
Surveillance of Front and Enemy Lines
Infantry Contact

(c) 15th Division:
42nd French Squadron:
Adjustment Divisional Artillery
Infantry Contact
Visual Reconnaissance

Balloon Company No. 8:
Adjustment Artillery
Surveillance of Front and Enemy Lines
Infantry Contact

(d) 4th Division:
One Flight 104th Aero Squadron:
Adjustment Divisional Artillery
Infantry Contact
Visual Reconnaissance
Balloon Company No. 12:
Adjustment Artillery
Surveillance of Front and Enemy Lines

III. Plan of Operation:

(a) From now until preparation day the Air Service will make routine visual reconnaissances; carry out photographic missions; cooperate in problems with infantry; and in all ways take advantage of every opportunity to permit pilots and observers becoming familiar with their respective sectors.

(b) Preparation Day:
Control with Divisional and Corps Artillery
Photos of Destructions

(c) Day of Attack:
Corps Squadron Will Furnish:
Command Plane
Photo Missions of First Line when Objective Reached
Visual Reconnaissance Rear of Enemy Lines
Planes for Counter Battery Work
Divisional Squadrons Will Furnish:
Infantry Contact Planes
Fugitive Target Planes
Balloons:
Surveillance
Infantry Contact

A. R. Christie
Major, AS USA

—50—

On the evening before the attack on the St. Mihiel salient, Mitchell was given a list of targets to be bombed that night by units under his command or by Trenchard's Independent Force. Bad weather, however, prevented bombing operations that night.

First Army, A.E.F.[a]
Ligny-en-Barrois, September 11, 1918 [6 p. m.][b]

Memorandum for: Chief of Air Service, First Army

1. The following bombing targets for this evening and tonight are designated:

Vigneulles and roads in vicinity, to destroy transport and troops on the road [and block traffic].
Chambley—railroad center and ammunition dump.
[Road junction of Champs just S. W. of Chambley (transport).]
Mars-la-Tour—railroad center, dump and airdrome (British).
Gondrecourt—munition dump.
Valleroy (at once if possible) munition dump.
Metz (Station) (British).
St-Jean-les-Buzy—dump.
Dommary-Baroncourt—railroad center and dump.

[You will issue the necessary orders for the above and request cooperation of the British Independent Air Service.]

By command of General Pershing:

H. A. Drum
Chief of Staff

—51—

Headquarters, Air Service, First Army
American Expeditionary Forces
France, September 11th, 1918

Operations Memo
Number 12.

1. Request has been made to Headquarters, Independent Forces, R.A.F., that telephonic reports of Operations of British day and night bombing squadrons attached to the First American Army be telephoned direct to your Headquarters.

2. It is directed that all such reports be immediately telephoned to the Operations Section, these Headquarters.

By Order of Colonel Mitchell

T. DeW. Milling
Lt. Col., A.S., U.S.A.
Chief of Staff

Copy to:
C. O., 1st Pursuit Wing.

—52—

By September 1918 German reserves on the Western Front were being depleted. Believing that the Allies were planning to attack in the St. Mihiel area, the Germans decided to pull back and shorten their lines. The withdrawal from the St. Mihiel salient was just getting started when the Allies struck. At that time the Germans had 8 divisions and 2 brigades in the line and 5 divisions in reserve in the area. By First Army estimates, the German air service in the sector consisted of about 150 pursuit, 120 reconnaissance, and 25 battle planes.

Some 550,000 Americans and 110,000 French took part in the Allied offensive. The Allied artillery consisted of 3,000 guns, for which more than 3,300,000 rounds of ammunition were available. The French contributed 400 tanks, some of which were manned by Americans. The status of Allied aviation under Pershing's command at the beginning of the battle is shown by the following list of units and their locations and by First Army reports on aircraft (Doc. 53) and aviation gas and oil (Doc. 54).

The gasoline normally used by the Air Service, AEF was refined in the United States and shipped across the Atlantic in tankers. In France it was shipped from the port to a depot by railway tank cars and delivered to the hangers on the flying fields in small tank wagons or in 55-gallon drums.

A higher grade gasoline, called "fighting gasoline," combat gasoline," or "fighting spirits," was developed for high-altitude flying and stunt work. This gasoline, which was colored red to distinguish it from regular aviation gas, arrived at the hanger in the 55-gallon steel drums in which it had been shipped from the refinery in the United States. Some pursuit pilots liked to use fighting spirits, but others preferred the regular aviation gas. With either kind, the planes were refueled with cans and funnels, the gas being strained through a chamois to keep dirt from getting into the tank.

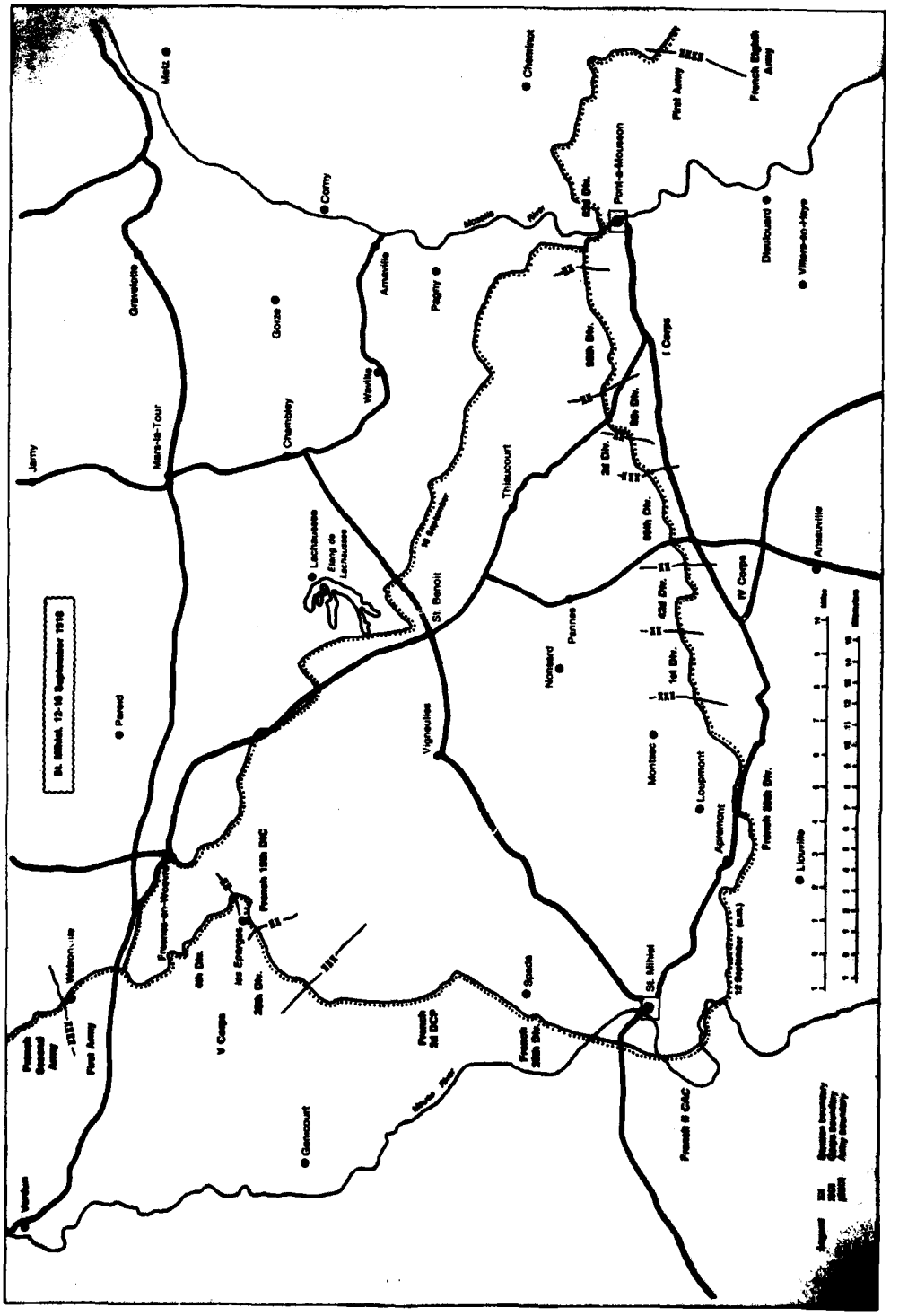
"BB Oil" was a medium-heavy aviation oil that was also called "Liberty Oil." It was refined from petroleum in the United States and shipped to France in wooden barrels. Being miscible with gasoline, this oil could not be used in rotary engines in which gasoline was admitted to the crankcase on its way to the cylinders. Rotary engines used castor oil, which was shipped from the United States or purchased from the French.

Air Service, First Army[a]

OUR SITUATION AT THE BEGINNING OF THE OPERATION

At the beginning of the operation the airplanes of the First Army consisted of 297 pursuit planes, of which 226 were available; 259 observation planes, of which 219 were available; and 55 bombing planes, of which 42 were available—a total of 611 planes, of which 487 were available; while the French units attached to the First Army had 627 planes, of which 430 were available. Twenty-one Allied balloons took part in the operation. Fifteen of these balloons were American and six French. The geographical distribution of the Air Service engaged in the operation were as follows:

Unit	Station
HEADQUARTERS, AIR SERVICE, 1ST ARMY	Ligny-en-Barrois
Corps Observation Wing Headquarters	Toul
1st Corps Air Service Headquarters	Saizerais
1st Corps Observation Group Headquarters	Toul
1st Aero Squadron	Toul
12th Aero Squadron	Toul
50th Aero Squadron	Bicqueley
Photo Section #1	Toul
Flight "B", 648th Aero Squadron	Toul
208th Escadrille (French)	Bicqueley
214th Escadrille (French)	Bicqueley
Balloon Wing Company "A" (Corps Hq.)	Saizerais
1st Balloon Company	Domevre-en-Haye
2nd Balloon Company	Griscourt
5th Balloon Company	Dieulouard
42nd Balloon Company	Ville-au-Val
4th Corps Air Service Headquarters	Toul
4th Corps Obser. Group Headquarters	Ourches
90th Aero Squadron	Ourches
135th Aero Squadron	Ourches
8th Aero Squadron	Ourches
Photo Section #4	Ourches
Flight "C", 255th Aero Squadron	Ourches
218th Escadrille (French)	Ourches
Balloon Wing Company "C"	Toul
3rd Balloon Company	Hamonville
9th Balloon Company	Raulecourt
43rd Balloon Company	Ansauville
69th Balloon Company	Neuf-[Etang]-de-Mandres


St. Mihiel, 12-16 September 1918
Pannes
Nonsard
Montsec
Thiaucourt
Vigneulles
St. Benoit
Lachaussee
Etang de Lachaussee
Chambley
Gorze
Mars-la-Tour
Jarny
Conflans
Pagny
Amanvillers
Metz
Chesnois
Pont-à-Mousson
Dieulouard
Villers-en-Haye
Arnaville
Loupmont
Apremont
St. Mihiel
Vigneulles
Spada
Genicourt
Verdun
Watronville
Fresnes-en-Woevre
Fresnes
Heudicourt
Essey
Pannes
Limey
Rembercourt
Beney
Xammes
Flirey
Richecourt
Villecey
Norroy
Jaulny
Gorze
Chambley
Warnéville
Amanvillers
Pagny
Thiaucourt
Vigneulles
Nonsard
Pannes
Montsec
Loupmont
Apremont
St. Mihiel

5th Corps Air Service Headquarters	Souilly
5th Corps Observation Group Headquarters	Souilly
99th Aero Squadron	Souilly
104th Aero Squadron	Souilly
42nd Escadrille (French)	Souilly
88th Aero Squadron	Souilly
Photo Section #5	Souilly
Balloon Wing Company "B"	Benoite-Vaux
6th Balloon Company	Villers-sur-Meuse
7th Balloon Company	Ft. Genicourt
8th Balloon Company	Dieue-sur-Meuse
12th Balloon Company	Sommedieue
Second Colonial Corps (French)	Rumont
277th Escadrille (French)	Rumont
47th Escadrille (French)	Rumont
28th Escadrille (French)	Rumont
236th Escadrille (French)	Belrain
20th Balloon Company (French)	Thillombois
52nd Balloon Company (French)	Boncourt
53rd Balloon Company (French)	Vignot
183rd Aero Squadron (Mobile Park #1)	Toul
Army Observation Group Headquarters	Gondreville
24th Aero Squadron	Gondreville
91st Aero Squadron	Gondreville
Photo Section #2	Gondreville
Flight "B", 255th Aero Squadron	Gondreville
Army Artillery Observation Group Headquarters	Ligny-en-Barrois
206th Escadrille (French) (Army Art.)	Bicqueley
219th Escadrille (French) (Army Art.)	Lay St. Remy
11th Balloon Company	Gezoncourt
39th Balloon Company (French)	Minorville-Domevre
234th Escadrille (French) (Army Art.)	Lay St. Remy
225th Escadrille (French) (Army R.R. Art.)	Belrain
10th Balloon Company	Royaumeix
41st Balloon Company (French)	Jouy-sous-les-Cotes
93rd Balloon Company (French)	Genicourt-sur-Meuse
16th Balloon Company (in reserve)	Toul
1st Pursuit Group Headquarters	Rembercourt
27th Aero Squadron	Rembercourt
94th Aero Squadron	Rembercourt
95th Aero Squadron	Rembercourt
147th Aero Squadron	Rembercourt
Flight "C", 648th Aero Squadron	Rembercourt
218th Aero Squadron	Rembercourt

A liberty loan poster decorates the side of an American lorrie at the flying headquarters of the 1st Aero Squadron.

1st Pursuit Wing Headquarters	Toul
2nd Pursuit Group Headquarters	Toul
13th Aero Squadron	Toul
22nd Aero Squadron	Toul
49th Aero Squadron	Toul
139th Aero Squadron	Toul
Flight "A", 255th Aero Squadron	Toul
3rd Pursuit Group Headquarters	Vaucouleurs #1
28th Aero Squadron	Vaucouleurs #1
93rd Aero Squadron	Vaucouleurs #1
103rd Aero Squadron	Vaucouleurs #1
213th Aero Squadron	Vaucouleurs #1
360th Aero Squadron	Vaucouleurs #1
16th French Combat Group	Vaucouleurs #2
Day Bombardment Group Headquarters	Amanty
96th Aero Squadron	Amanty
Flight "A", 648th Aero Squadron	Amanty
11th Aero Squadron	Delouze
Night Bombardment Group (French)	Epiez
11th Caproni Squadron (French)	Epiez
130th Caproni Squadron (French)	Epiez

3rd Caproni Squadron (Italian)	Chermisey
14th Caproni Squadron (Italian)	Chermisey
15th Caproni Squadron (Italian)	Chermisey
9th Aero Squadron (Night Reconnaissance)[b]	Amanty
French Aerial Division P. C.	Tannois
1st Brigade P. C.	St. Martin-Sorcy
Combat Escadre #1 P. C.	Ochey
Combat Group #15 (Escadrilles 37-81-93-97)	Ochey
Combat Group #19 (Escadrilles 73-85-95-96)	Ochey
Combat Group #18 (Escadrilles 48-94-153-155)	Autrey
Park #115	Chaudeney
Bombardment Escadre #12 P. C.	Neufchateau
Bombardment Group #5 (Escadrilles 117-120-127)	Martigney-les-Gerbonvaux
Bombardment Group #6 (Escadrilles 66-108-11)	Tantonville
Bombardment Group #9 (Escadrilles 29-123-129)	Neufchateau
Park #105	Harchechamp
Escadrilles de Protection (239-240)	Martigny-les-Gerbonvaux
2nd Brigade P. C.	Combles
Combat Escadre #2 P. C.	Combles
Combat Group #13 (Escadrilles 65-15-84-88)	Brabant-le-Roi
Combat Group #117 (Escadrilles 77-89-91-100)	Rancourt
Combat Group #20 (Escadrilles 69-99-159-162)	Remennecourt
Park #113	Pargny-sur-Sauix
Bombardment Escadre #13 P. C.	Villiers-en-Lieu
Bombardment Group #3 (Escadrilles 107-126-128)	Combles
Bombardment Group #4 (Escadrilles 131-132-134)	St. Dizier
Park #103	Baudonville.:s
Escadrille de Protection (46)	St. Dizier
Army Air Service Troops	
474th Aero Squadron	Rembercourt
477th Aero Squadron	Bicqueley
462nd Aero Squadron	Vaucouleurs
463rd Aero Squadron (With 8th Fr. Ar.)	La Neuve Ville
434th Aero Squadron	Lay St. Remy
495th Aero Squadron	Remicourt

Plane Situation, First Army
Sept. 11 1918

Station	Group	Squadron	On hand yesterday	Lost	Received	On hand to-day	Due on Order	Available for duty	Type	Spad 13	Salmson 4	DH 4s B	DH 4s OB.	Breg. B	Breg Ob.
Toul	2nd Pursuit Group	13	25	0	0	25	0		Spad	25					
		22	25	1	0	24	1			24					
		49	25	0	0	25	0			25					
		139	25	0	0	25	0			25					
	1st Corps Observation	1	23	0	0	23	1		Salmson		23				
		12	24	2	0	22	2				22				
Gondreville	Army Observation Group	24	24	0	0	24	0				24				
		91	24	0	0	24	2				24				
Vaucouleurs Field No. 1	3rd Pursuit Group	28	25	0	0	25	0		Spad	25					
		93	25	0	0	25	0			25					
		103	25	0	0	25	0			25					
		213	25	0	0	25	0			25					
Ourches	4th Corps Observation Group	8	24	0	0	24	0		DH 4				24		
		90	24	0	0	24	0		Salmson		24				
		135	24	0	0	24	0		DH 4				24		
Amanty	Night Recon. Day Bombing	9	18	0	0	18	7		Breg						18
		96	19	0	0	19	0							19	
Bicqueley	1st Corps Observation Group French														
Souilly	5th Corps Observation Group	50	20	0	0	20	4		DH 4's				20		
		99	24	0	0	24	0		Salmson		24				
		104	24	0	0	24	0				24				

Rembercourt	1st Pursuit (218th Park) (Flight C, 648 Supply)	27	25	0	0	25	0	Spad	25					
		94	25	0	0	25	0		25					
		95	25	0	0	25	0		25					
Total			572	3	0	569	17		199	165		68	19	18

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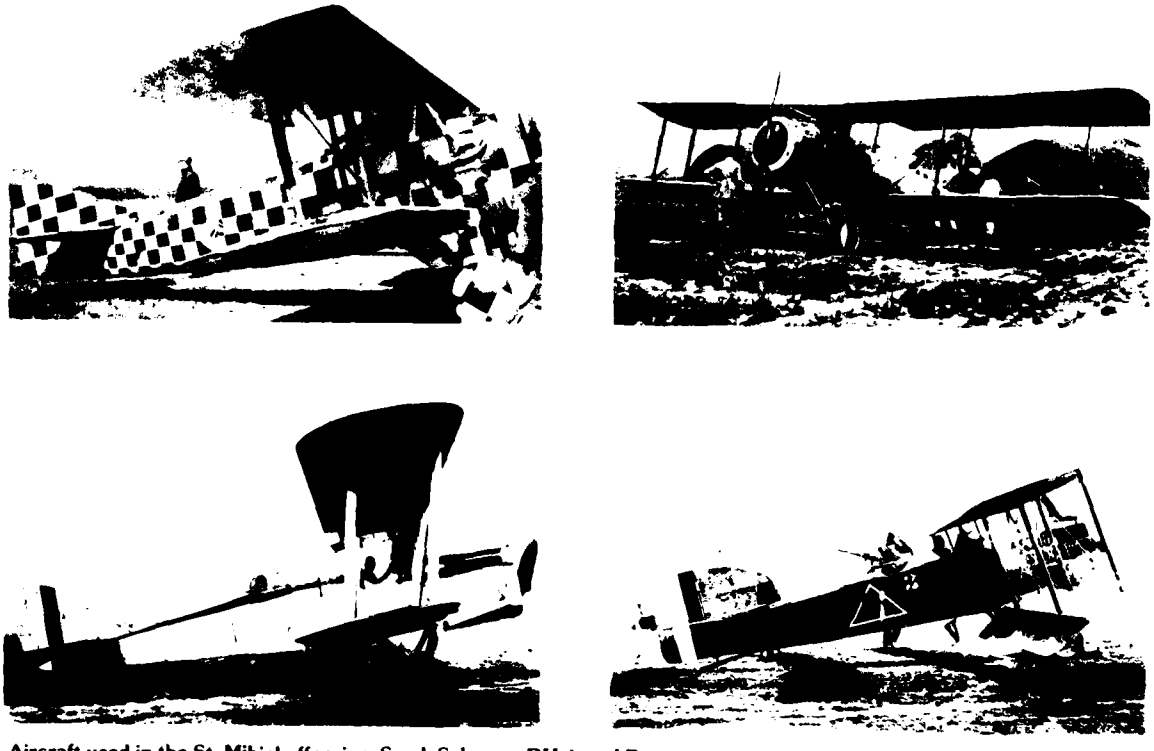
Airplane Gas and Oil Report
Air Service First Army
Date: Sept 11, 1918

Station	Kind	Gallons on hand yesterday	Gallons Delivered	Gallons Received	Gallons on hand today
First Air Depot	Fighting Spirits	747	276		471
	Gasoline	46,962	9,146	20,907	58,723
	Castor Oil	25,528	747		24,781
	BB Oil	14,953	600	4,000	18,353
Rembercourt	Fighting Spirits	3,838	117	0	3,721
	Gasoline	51,097½	695½	0	50,402
	Castor Oil	7,850	117	0	7,733
	BB Oil	100	64	0	36
Souilly	Gasoline	6,000			6,000
	Castor Oil	9,000			9,000
Toul	Gasoline	8,842			24,264
	Castor Oil	155			4,550
	BB Oil				900



Aircraft used in the St. Mihiel offensive: Spad, Salmson, DH-4, and Breguet.

12 September 1918

Pershing and several of his staff were at Fort Gironville, overlooking the battlefield, when the infantry attack began. On the south side of the salient he had seven American divisions in the line. They were, from right to left, the 82d (astride the Moselle River), 90th, 5th, and 2d of I Corps, and the 89th, 42d, and 1st of IV Corps. With IV Corps driving toward, the line pivoted on the 82d Division. It was bad going in the rain and mud, but things began to look better by about 0900. The sun began to break through the clouds. It was evident that German resistance was weakening. Columns of smoke appeared behind enemy lines, as sign that the Germans were burning supplies to prevent capture. By 0930 or 1000 the 1st Division had broken the enemy's first line of resistance. By 1230 the 1st Division had reached its first-day objective. At 1345 a squadron of the 2d Cavalry passed through the 1st Division to cut the St. Mihiel-Metz railroad. The object was to prevent the Germans from using the railroad to withdraw their troops from the point of the salient. The cavalry, however, did not have sufficient force and had to retreat. IV Corps continued to drive ahead. By evening both I and IV Corps had passed their first-day objectives.

On the western side, where the bombardment and assualt began three hours later than on the south, progress was not so good. V Corps, which was on the west, had three divisions,

No-Man's Land—the strip of territory between German and American lines.

A 155-mm artillery gun.

An artillery piece in action at St. Mihiel.

the U.S. 26th, the French 15th Colonial, and the U.S. 4th, but with only part of the 4th in the line, the rest being in the corps reserve. The plan called for the line to pivot on the 4th, with the 26th driving toward Vigneulles-les-Hattonchatel in the center of the salient. Most elements of the 26th, as well as the 15th Colonial, were unable, however, to reach their objectives for the day.

In the center Pershing had the French II Colonial Corps with three French divisions, the 39th, 26th, and 2d Cavalry dismounted. Protecting the flanks of the U.S. IV and V Corps, the II Colonial made holding attacks to keep the Germans occupied to try to prevent their withdrawing from the lower part of the salient.

Orders

—55—

On the afternoon before the battle began, Mitchell assembled the members of his staff and the commanders of the various aviation units at First Army Headquarters at Ligny-en-Barrois to go over the orders for the next day. Having personally written the orders for the Air Service, Mitchell would have tried them out on a not-too-bright but valuable member of his staff to see if he understood them—if he did, anyone would. Standing before the large 12-foot by 12-foot relief map he had had made of the St. Mihiel area, Mitchell traced out the line held by the Germans. The First Army would attack the next day. When satisfied that each commander understood his job, Mitchell let him go, to return to his unit, alert his men, and issue his own orders for the battle the next day.

Headquarters Air Service, First Army[a]
American Expeditionary Forces
September 11th, 1918

Battle Orders No. 1.

1. The enemy is losing ground, personnel and materiel at all points of the front on which the allied armies are attacking.[b] On the front of the first Army he is holding the line Pont-sur-Seille—St. Mihiel—Fresnes-en-Woevre—Chatillon-sous-les-Cotes in his old positions. His air service is estimated at 150 pursuit, 120 reconnaissance and 25 battle air planes, which is being re-inforced. The strength of his

ground troops is estimated at about seven divisions, with from 3 to 5 divisions in reserve. The strength and morale of these divisions is reported low. There are signs that he intends to withdraw from his front lines and make his main resistance at some point further to the rear.

2. The First Army attacks on the whole front on 12 September, 1918. The hour of the attack will be 5 H 12 September, 1918. The First and Fourth Corps will attack at H hour. The 5th Corps will attack at H hour plus three hours. The 2nd French Colonial Corps will attack as follows:—

The attack west of the 4th Corps at H plus one hour. The attack south of the 5th Corps at H plus four hours. The artillery bombardment will commence as follows:—1st and 4th Corps H minus four hours. The Second Colonial Corps will attack at H minus four hours.

3. OUR AIR SERVICE WILL TAKE THE OFFENSIVE AT ALL POINTS WITH THE OBJECT OF DESTROYING THE ENEMY'S AIR SERVICE, ATTACKING HIS TROOPS ON THE GROUND AND PROTECTING OUR OWN AIR AND GROUND TROOPS.

4. (a) The Corps Sectors of reconnaissance are as announced in Annex #3, Field Orders #9, Appendix #4, dated September 7th, 1918. Particular attention is to be paid to minute reconnaissance of the enemy lines to determine whether he has been re-inforced or has changed his dispositions. Important information [involving] immediate action obtained by Corps Air Services will be sent by telephone, radio or courier airplane to the C.A.S., 1st Army or to the nearest brigade of the French Air Division.

(b) The 1st Army Observation Group (Reynolds) will execute the reconnaissance and surveillance as ordered in the plan of reconnaissance, Annex #3, Field Orders #9, Appendix #4, dated September 7th, 1918. Particular attention is to be paid to minute reconnaissance of the enemy lines to determine whether he has been re-inforced or has changed his dispositions. Important information involving immediate action obtained by Air Services will be sent by telephone, radio or courier plane to the C.A.S., 1st Army, or to the nearest brigade of the French Air Division. Three airplanes will be held ready to execute any special reconnaissance ordered.

(c) The Army Artillery Group (Block) will execute the observation ordered for the Artillery to which it is attached. Important information involving immediate action obtained by Air Services will be sent by telephone, radio or courier airplane to the C.A.S., 1st Army or to the nearest brigade of the French Air Division.

(d) The First Pursuit Wing, (Atkinson) will cover the front Pont-sur-Seille—St. Mihiel, inclusive. An absolute barrage will be established against enemy aviation, our own observation aviation will be protected and an attack against all balloons exposing themselves on this front will be made early in the morning. After 9:00 A.M., one

pursuit group loaded with bombs will be held in reserve to be used for the purpose of attack of hostile troops or convoys on the ground, so as to be ready to leave the ground 15 minutes after the receipt of the order.

The First Bombardment Group will attack the hostile division and corps posts of command and such enemy positions as present a suitable target.

The right flank of the First Pursuit Wing will be protected by the First Brigade (French) Aerial Division and the Aerial defenses of the 8th French Army. Close liaison will be maintained by the 1st Pursuit Wing (Atkinson) with both of these and with the Army Corps so as to keep close track of the advance of the troops.

(e) The First Pursuit Group (Hartney) will cover the front Chatillion-sous-les-Cotes—St. Mihiel, inclusive. A barrage will be maintained against hostile aviation, observation aviation will be protected and hostile balloons will be attacked opposite the front of the 4th Corps.

The left flank will be protected by the aerial defenses of the 2nd French Army with which close liaison will be maintained. Close liaison will also be kept with the Corps Air Services so as to keep track of the advance of the troops.

(f) The Army Night Bombing and Reconnaissance Wing (Major Villome) will execute the night reconnaissance directed in accordance with the schedule provided for. Railroad centers and airdromes will be bombed systematically as provided for in the plan of employment. Particular attention will be paid to the German Night Bombing Airdromes.

(g) The French Air Division (Vaulgrenant) will take the offensive against the enemy's aviation and troops on the ground. The Brigades will execute successive attacks, passing over both sides of the St. Mihiel salient. On the right (east) of the area opposite the front of the 1st and 4th Army Corps and on the left of the second Colonial Corps, the meeting point of these two axes being approximately the area Jonville-Hadenville-Chambley. The principle being to operate along the axes indicated so as to take the enemy aviation in reverse and force it towards our lines. Attacks will be made against the ground troops of the enemy when occasion offers.

The bombardment aviation will attack the objects on the ground which show themselves to be the most dangerous as operations develop.

Provision will be made for guarding the 1st Army's right flank against hostile air attack. Close liaison will be maintained by radio and courier planes with the Corps Air Services so as to insure the air division's cooperation in the attack.

5. The equipment section will hold itself ready to insure the supply and movement of any units required.

6. The Army Dropping Ground for messages from airplanes is a point two and one-half kilometers south-east of Ligny-en-Barrois. The Army Landing Field is Maulan, six kilometers west of Ligny-en-Barrois. The First day Bombardment Group will provide a detail of four command airplanes to take station at Maulan, beginning at 7:00 A.M., September 12th.

7. Reports will reach the Chief of Air Service at Headquarters, Air Service, First Army, Ligny-en-Barrois.

A liaison officer from each Corps Air Service, each Wing or independent group of the Army Air Service, and the French Aerial Division will report at the Headquarters, C.A.S., 1st Army at 21-00 H each day to receive orders.

A liaison officer for the night bombardment Group, (Villome) will report at the Headquarters, C.A.S., 1st Corps, at 14-00 H each day to receive orders.

William Mitchell.

Read and explained to assembled
Corps Air Service Commanders
Group Commanders
Wing Commanders
Chief of Staff of the Air Division
Staff of the C.A.S., 1st Army at 15-30, September 11th, 1918, without giving H hour.

Copies by an officer to—
C-S, 1st Army
G-3, 1st Army
G-2, 1st Army
Corps Observation Wing, (Brereton)
C.A.S., 1st Corps (Hall)
C.A.S., 4th Corps (Anderson)
C.A.S., 2nd C.A.C., (Pennes)
C.A.S., 5th Corps., (Christy)
1st Observation Group (Reynolds)
Artillery Observation Group (Block)
1st Pursuit Wing (Atkinson)
2nd Pursuit Group (Johnson)
3rd Pursuit Group (Thaw)
G.C. 16 (Meanig)
1st Bombardment Group (Dunsworth)
Night Bombardment Wing (Villome)
1st Pursuit Group (Hartney)
1st Air Division (Vaulgrenant)
Independent Air Forces (Trenchard)

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Headquarters Air Service, First Army
American Expeditionary Forces
France, September 12th, 1918

Operations Memo
Number 11

1. All previous orders or memorandums concerning the hours for submission of Daily Operations Reports are hereby revoked.

2. Telephonic Report covering operations from 7:00 P.M. to 5:00 P.M. of the day following will be phoned to these Headquarters as soon after 5:00 o'clock as possible. Any important operations between 5:00 and 7:00 P.M. will be phoned to these Headquarters as soon after 7:00 p.m. as possible.

3. Written reports covering operations from 7:00 P.M., to 7:00 P.M., will be forwarded to these Headquarters as soon as possible after its compilation.

4. The form in which these reports are to be rendered and the subject matter will be in accordance with that embodied in previous instructions.

By order of Colonel Mitchell

T. DeW. Milling
Lt. Col., A.S., U.S.A.
Chief of Staff

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Headquarters Air Service First Army
American Expeditionary Forces
France, Sept. 12, 1918

Memorandum:

The dropping point where the messages for the Second French Army must be dropped is Northwest of the village of Laheycourt, and is indicated by an arrow of white canvas. (See sketch below).

By order of Colonel Mitchell

T. DeW. Milling
Colonel, A.S., U.S.A.
Chief of Staff

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Headquarters, Air Service, First Army
American Expeditionary Forces
France, September 12th, 1918

Office Memorandum:

1. All incoming information, messages, and reports having to do with the tactical situation, will be delivered immediately to the Information Office for distribution.
2. The Information Office will separate and transmit the information and reports so received to the officials concerned.

By order of Colonel Mitchell.

W. P. Kelleher
Major, A.S., U.S.A.
Adjutant

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First Pursuit Group
Operations Office
Sept. 11th, 1918

Operations Order
Number 120.

1. The following schedule of Operations is announced as effective for tomorrow, Sept., 12th, 1918.

MISSION	REGION	ALTITUDE
Patrol	Watronville to St. Mihiel	High
27th	6 h 15 to 7 h 45, 11 h 15 to 12 h 45, 15 h 00 to 16 h 30	
94th	7 h 30 to 9 h 00, 12 h 30 to 14 h 00, 16 h 15 to 17 h 30	
147th	8 h 45 to 10 h 15, 13 h 45 to 15 h 15, 17 h 15 to 18 h 30	
95th	10 h 00 to 11 h 30.	

2. Each patrol will consist of two echelons of not more than three (3) planes each. The patrols of the lower echelon will operate from an altitude of from 2500 to 3500 meters, and the patrol of the upper echelon from an altitude of 3500 to 5500 meters.
3. The patrols of the 147th Squadron will be performed by the lower echelon flying first to the Watronville end of the sector, and the highest echelon flying from the St. Mihiel end, both echelons meeting

within the limits of the altitude prescribed for each at a point about the middle of the sector. The other patrols scheduled above will be conducted at the discretion of the Squadron Commanders.

4. Patrols will fly this sector, but will not cross the enemy lines unless necessary to finish an engagement already started.

5. The patrol over this airdrome will be in effect and will be maintained hourly by the 95th Squadron from 7 h 00 to 18 h 00. Each patrol starting on the hour will be of one hour and fifteen minutes duration.

6. In addition to the above a mobile reserve of one flight will be maintained throughout the day commencing at 10 h 00. The 94th Squadron will hold its flight on alert while the 27th is on patrol and vice versa, and the 95th Squadron will hold its flight on alert while the 147th Squadron is on patrol and vice versa.

7. Voluntary patrols of two (2) or more planes will henceforth be permitted after consultation at this office.

8. The patrols scheduled above plus any voluntary patrols will have in mind the protection of our balloons as a primary mission, and also keep in mind paragraph four (4) of this Operations Order.

By order of Major Hartney

Romer Shawhan
1st Lt. A.S.S.C.
Group Operations Officer.

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First Pursuit Group
Operations Office
Sept. 11th, 1918

Operations Order
Number 121

1. The following schedule of operations is announced as effective for tomorrow Sept. 12th, 1918, and cancels operations order #120.

2. Henceforth the sector of this Group will be Chatillon-sous-les-Cotes to St. Mihiel north included. From the latter point the line running to Etang-de-Lachaussee northeast of Vigneulles.

3. The 1st Army attacks on the whole front at 5 h 00 Sept. 12th, 1918.

Mural painted by Cpl. Claude a Jackson.

4. The Air Service will take the offensive at all points with the object of destroying enemy air service, attacking his troops on the ground where ordered and protecting our planes and ground troops.

5. This Group will maintain a barrage against hostile aviation: observation aviation will be protected and hostile balloons will be attacked opposite the front of the 5th Corp.

6. The following patrols will be maintained throughout the day:

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to St. Mihiel
27th	6 h 15 to 7 h 45, 11 h 15 to 12 h 45, 15 h 00 to 16 h 30.
94th	7 h 30 to 9 h 00, 12 h 30 to 14 h 00, 16 h 15 to 17 h 30
147th	8 h 45 to 10 h 15, 13 h 45 to 15 h 15, 17 h 15 to 18 h 30.
95th	10 h 00 to 11 h 30

7. Each patrol will consist of two echelons of four (4) planes each, the patrols of the lower echelon will operate from an altitude of 2500 to 3500 meters, and the patrol of the upper echelon from an altitude of 3500 to 5500 meters.

8. In addition to the above a mobile reserve of one flight will be maintained throughout the day commencing at 10 h 00. The 94th Squadron will hold its flight on alert while the 27th is on patrol and vice versa, and the 95th Squadron will hold its flight on alert while the 147th Squadron is on patrol and vice versa.

9. These orders may be cancelled and new ones issued after 10 h 00.

10. Squadrons will perform liaison duty as follows, and the mission in each case will be 1) To discuss progress of troops; 2) Location of new balloons; 3) Missions being attempted.

Hours	To	Squadrons
10 h 00	2nd C.A.C. Rumont	27th
10 h 00	5th Army Corps, Souilly	94th
15 h 00	2nd C.A.C. Rumont	95th
15 h 00	5th Army Corps, Souilly	147th

11. Pilots must do their utmost to observe all activity on the ground reporting any interesting items immediately upon returning to the field for transmittal to the Intelligence, C.A.S., 1st Army.

By order of Major Hartney

Romer Shawhan
1st Lt. A.S.S.C.
Group Operations Officer.

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27th Aero Squadron
Operations Office
1st Pursuit Group
Amer. E. F.
Sept. 11, 1918

Operations Order
No. 122

1. The following schedule of operations is in effect for the 27th Aero Squadron for Sept. 12, 1918.

MISSION	REGION		FLIGHT	TIME
Patrol	Watronville to St. Mihiel		"B"	6 h 15 to 7 h 45
Do	Do	Do	"C"	11 h 15 to 12 h 45
Do	Do	Do	"A"	15 h to 16 h 30

2. Each patrol will consist of two echelons of not more than 3 planes each. The lower echelon will operate from an altitude of from 2500 to 3500 meters, and the upper echelon from an altitude of from 3500 to 5500 meters. The flight Commanders will lead their respective flights on these patrols.

3. Patrols will not cross the enemy lines unless necessary to finish an engagement. They will have in mind the protection of our balloons as a primary mission. All movements of enemy troops, Cantonments, sites of enemy balloons, or other information that may be of interest to the Army will be reported upon the return of the pilots to this squadron.

4. In addition to the above "B" flight will be on alert from 12 h 30 to 14 h 00. "C" Flight will be on alert from 16 h 15 to 17 h 30.

5. Flights that are on alert will hold their machines in readiness to take off within ten minutes after the time that they are notified of a mission.

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95th Aero Squadron
September 12, 1918

Operations Order
No. 99.

10 h 00 to 11 h 30, Second flight. Patrol. Altitude—High. Line—Watronville to St. Mihiel. Lieuts. Mitchell, Proudfit, and Heinrichs will

fly the lower echelon at 2500 to 3500 meters. Lieuts. Taylor, Avery and Gill will fly the upper echelon at 3500 to 5500 meters.

Alerts.

13 h 45 to 15 h 13	Third flight.
17 h 15 to 18 h 30	First flight.

2. Hourly Patrols.

7 h 00 to 8 h 30	Lieut. Gravatt
7 h 30 to 9 h 00	Lieut. Curtis
8 h 00 to 9 h 30	Lieut. McLanahan
8 h 30 to 10 h 00	Lieut. Knowles
9 h 00 to 10 h 30	Lieut. Woodard
9 h 30 to 11 h 00	Lieut. Sewall
10 h 00 to 11 h 30	Lieut. Buckley
10 h 30 to 12 h 00	Lieut. Hall
11 h 00 to 12 h 30	Lieut. Weatherhead
11 h 30 to 13 h 00	Lieut. Bailey
12 h 00 to 13 h 30	Lieut. Butz
12 h 30 to 14 h 00	Lieut. Holden
13 h 00 to 14 h 30	Lieut. McLanahan
13 h 30 to 15 h 00	Lieut. Sewall
14 h 00 to 15 h 30	Lieut. Curtis
14 h 30 to 16 h 00	Lieut. Gravatt
15 h 00 to 16 h 30	Lieut. Knowles
15 h 30 to 17 h 00	Lieut. Woodard
16 h 00 to 17 h 30	Lieut. Taylor
16 h 30 to 18 h 00	Lieut. Heinrichs
17 h 00 to 18 h 00	Lieut. Weatherhead

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Headquarters First Pursuit Wing
Air Service, American E. F.
September 12th, 1918

Operations Orders
Number 12.

1. Information of the Enemy: See Par 1, Battle Order No. 1, c.s., Headquarters, Air Service, First Army, attached.

2. Plan of Operations: The First Army will attack at 5 h 00 Sept. 12th. A double tier of pursuit patrols will be maintained over the sector of the Wing throughout the day. The purpose of this barrage is to create an area 5 kilometers in front of our advancing lines in which it will be safe for our army corps observation aviation to work. The lower tier of the barrage will be between 2500 and 3500 meters, and the upper tier will be 3600 meters. Enemy Balloons will be attacked.

The Day Bombardment Aviation will attack the objectives designated in Par. 4, this order.

3. The First Pursuit Wing: The sector of the Wing is between the lines, St. Mihiel—Flirey—Arnaville.

The Western sector of the Wing is between the line St. Mihiel—Lachaussee to the line, Flirey—Arnaville.

The eastern sector of the Wing is from the line Flirey—Arnaville to the line Nancy—Solgne.

The Second Pursuit Group: will maintain a double tier barrage over the eastern sector of the Wing from daybreak to dark. Especial emphasis is laid on the importance of getting off the first patrol at the earliest possible moment.

The 11th and 20th Aero Squadron, First Day Bombardment Group will be subject to the orders of the Group Commander, 2nd Pursuit Group for cooperation in the barrage patrols of the sector assigned to that Group. These Squadrons have a total of 18 DH4's available for this work.

The Second Pursuit Group will also provide such protection as the Army Observation may require.

Flirey, France.

The Second Pursuit Group will attack every balloon appearing in ascension in the sector assigned to the Group. This attack made at as early an hour as practicable, due consideration being given to weather and atmospheric conditions.

The Third Pursuit Group: The entire 3rd Pursuit Group will be on alert after 9 h 00 subject to the call of the Chief of Air Service First Army. It will be prepared to carry out missions of bombardment and to attack designated [objectives] on the ground. Attention is directed to Section D, Paragraph 4, Battle Order Number 1, c.s., Headquarters Air Service, First Army.

G.C. 16: will maintain a double tier barrage of the western sector of the Wing from daylight until dark. Especial emphasis is laid on the importance of the sending of the first patrol at the earliest moment possible. In addition G. C. 16 will attack every balloon appearing in ascension in the sector assigned to that Group, this attack to be made at as early an hour as practicable, due consideration being given to the weather and atmospheric conditions.

4. First Day Bombardment Group: The 96th Aero Squadron will attack the hostile division and Corps posts of command located at Buxieres, Heudicourt, Hattonchatel, Woel, Beney, Rembercourt-sur-Mad and Xonville, and any enemy positions or concentrations which may present suitable targets.

The 11th and 20th Aero Squadron, less 4 planes to be used in accordance with paragraph 6, Battle Orders No. 1, c.s., Headquarters, Air Service, First Army, will be placed subject to the orders of the Group Commanders, 2nd Pursuit Group for cooperation on the barrage patrols of the sector assigned to that Group.

By Order of Lieut. Colonel Atkinson,

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

Copy to:
C.A.S. 1st Army
1st Pursuit Group
2nd Pursuit Group
G. C. 16
1st Day Bombardment Group
Escadre No. 1

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Headquarters
2nd Pursuit Group 1st Pursuit Wing
Operations Office
September 11, 1918

Operations Order
No. 51

1. Sector of the 2nd Pursuit Group is from Seicheprey to Port-sur-Seille.

2. Mission of all regular patrols.

a) To prevent all reconnaissance either visual or photographic of our rear area.

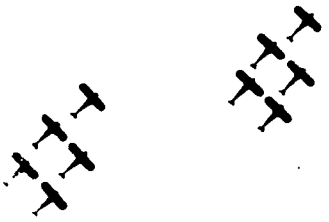
b) To create an area three kilometers in depth on the enemy side of the line of battle in which it will be relatively safe for our Corps Observation to operate.

c) Of all protection patrols.

To protect the observation planes during the course of their mission and until they are well within our own territory. Patrols will not penetrate into enemy territory beyond the line which is marked by the towns Nonsard Pannes Preny Lorry Louvigny St Jure unless directed to do so by orders from these headquarters.

3. The following schedule will be in effect September 12th. 1918. covering the period up to 9 h 00.

	13th Squadron
5:30- 7:30	Two flights of at least 5 planes each available for protection patrol. The missions for these patrols will be definitely assigned in later orders.
7:00- 8:45	Patrol 5 planes Seicheprey to Port-sur-Seille 2-3 kilometers in front of line of battle, altitude 3500-5500 M.
	22nd Squadron
5:30- 7:15	Patrol 5 planes Seicheprey to Port-sur-Seille 2-3 kilometers in front of line of battle, altitude 2500-3500 M.
8:30-10:15	Patrol 5 planes Seicheprey to Port-sur-Seille 2-3 kilometers in front of line of battle, altitude 3500-5500 M.
	49th Squadron
5:30- 7:15	Patrol 5 planes Seicheprey to Port-sur-Seille 2-3 Kilometers in front of line of battle, altitude 3500-5500 M.



8:15-10:00	Patrol 5 planes Seicheprey to Port-sur-Seille 2-3 kilometers in front of line of battle, altitude 2500-3500 M.
5:30- 7:30	Two flights of at least 5 planes each available for protection. The Mission for these patrols will be definitely assigned in later orders.
6:45- 8:30	Patrol 5 planes Seicheprey to Port-sur-Seille 2-3 kilometers in front of line of battle, altitude 2500-3500 meters.

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

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Headquarters
2nd Pursuit Group 1st Pursuit Wing
Operations Office
September 12, 1918

Operations Order
No. 52.

1. The Sector of the 2nd Pursuit Group is from the line Flirey—Arnaville to the line Nancy—Sologne.
2. Mission
a) To attack and either destroy or force to the ground every enemy balloon in the sector assigned.
b) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our Army Corps Observation Aviation to Work.
c) To prevent all enemy reconnaissance either visual or photographic.
3. All patrols at 2500-3500 meters will be made along a line 2-3 kilometers in advance of the line of battle.
All patrols at 3500-5500 meters will be made along a line 3-5 kilometers in advance of the line of battle.
All patrols of 2500-3500 meters will be responsible for the execution of mission "A".
4. The following schedule will be in effect September 12th, 1918, in addition to schedule given in Operations Order No. 51.

	13th Squadron
8:30-10:15	Protection patrol 5 planes, details of mission to be furnished in later order.
10:00-11:45	Patrol 5 planes along sector altitude 2500-3500 meters.
12:00-13:45	Protection patrol 5 planes, details of mission to be furnished in later order.
13:15-15:00	Patrol 5 planes along sector altitude 3500-5500 meters
16:15-18:00	Patrol 5 planes along sector altitude 2500-3500 meters.
	22nd Squadron
11:30-13:15	Patrol 5 planes along sector at altitude 2500-3500 meters.
14:45-16:30	Patrol 5 planes along sector at altitude 3500-5500 meters.
17:45-19:30	Patrol 5 planes along sector altitude 2500-3500 meters.
	49th Squadron
11:45-13:30	Patrol 5 planes along sector altitude 3500-5500 meters.
14:30-16:15	Patrol 5 planes along sector altitude 2500-3500 meters.
17:40-19:25	Patrol 5 planes along sector altitude 3500-5500 meters.
	139th Squadron
9:55-11:40	Patrol 5 planes along sector altitude 3500-5500 meters.
10:30-12:15	Protection patrol 5 planes, details of mission to be furnished in later order.
13:00-14:45	Patrol 5 planes along sector altitude 2500-3500 meters.
16:10-17:55	Patrol 5 planes along sector altitude 3500-5500 meters.

5. All parts of Operations Order No. 51, which conflict with this order are revoked.

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

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Headquarters
2nd Pursuit Group 1st Pursuit Wing
Operations Office
September 12, 1918

Operations Order
No. 53

1. Effective immediately and until further orders all patrols from 2nd Pursuit Group will operate over the entire sector of the wing which is from the line St Mihiel—Lachaussee to the line Flirey—Arnaville.

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

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Operations Office
13th Aero Squadron
September 11th, 1918

Flying Order
No. 40

1. Sector of the 2nd Pursuit Group is from Seicheprey to Port-sur-Seille.
2. Mission of all regular patrols.
A.) To prevent all reconnaissance either visual or photographic of our rear area.
B.) To create an area three kilometers in depth on the enemy side of the line of battle in which it will be relatively safe for our Corps Observation to operate.
C.) Of all protective patrols. To protect the observation planes during the course of their mission and until they are well within our own territory. Patrols will not penetrate into enemy territory beyond the line which is marked by the towns Nonsard, Pannes, Lorry, Louvigny, St. Jure, unless directed to do so by orders.
3. The following schedule will be in effect September 12th, 1918 covering the period up to 9 h 00.

5:30 to 19:30 Two flights of at least 5 planes each available for protection patrol. The mission for these patrols will be definitely assigned in later orders.

7:00 to 8:45 Patrol 5 planes Seicheprey to Port-sur-Seille 2-3 kilometers in front of line of battle, altitude 3500 to 5500 meters.

By order of Captain Biddle

Sydney Gross
1st Lieut. A.S. SIG. R.C.
Operations Officer

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Operations Office
13th Aero Squadron
September 12th, 1918

Flying Order
No. 41

1. The sector of the 2nd Pursuit Group is from the line Flirey—Arnaville to the line Nancy—Solgne.

2. Mission.

A). To attack and either destroy or force to the ground every enemy balloon in the sector assigned.

B.) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our Army Corps Observation Aviation to work.

C.) To prevent all enemy reconnaissance either visual or photographic.

3. All patrols at 2500-3500 meters will be made along a line 2-3 kilometers in advance of the line of battle.

All patrols at 3500-5500 meters will be made along a line 3-5 kilometers in advance of the line of battle.

All patrols at 2500-3500 meters will be responsible for the execution of mission "a".

4. The following schedule will be in effect September 12th 1918 in addition to the schedule given in operations order No. 51 Headquarters 2nd P.G.

9:30 to 10:15 Protection patrol 5 planes, details of mission to be furnished in later order.

10:00 to 11:45 Patrol 5 planes along sector altitude 2500-3500 M.

12:00 to 13:45 Protection Patrol 5 planes, details of mission to be furnished in later order.

13:15 to 15:00 Patrol 5 planes along sector altitude 3500 to 5500 M.
16:15 to 18:00 Patrol 5 planes along sector altitude 2500 to 3500 M.
5. All parts of flying order No. 40 which conflicts with the above are hereby revoked.

By order of Captain Biddle

Sydney Gross
1st Lieut. A.S. SIG. R.C.
Operations Officer

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Operations Office
22nd Aero Squadron
2nd Pursuit Group
September 11, 1918

Operations orders
No. 21.

1. The following schedule will be in operation for Sept. 12th, 1918.
5.30-7.15. Patrol 5 planes Seicheprey to Port-sur-Seille 2 to 3 kilometers in front of the line of battle, altitude 2500-3500 M.
8.30-10.15. Patrol 5 planes Seicheprey to Port-sur-Seille 2 to 3 kilos in front of our lines of battle, altitude 3500-5500 M.

By order of Capt. Bridgman

George B. Gillson
2nd Lt. A.S. U.S.A.
Operations Officer

—70—

Operations Office
22nd Aero Squadron
2nd Pursuit Group
September 12, 1918

Operations Orders
No. 21

Addition. From 9.00 on.
1. The following schedule will be in effect for Sept. 12, 1918.

11.30-13.15 Patrol 5 planes along sector. Alt. 2500-3500 M.
14.45-16.30 Patrol 5 planes along sector. Alt. 3500-5500 M.
17.45-19.30 Patrol 5 planes along sector. Alt. 2500-3500 M.

By order of Capt. Bridgman

George B. Gillson
2nd Lt. A.S. U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 12th, 1918

Operations Order
No. 33

1. All available planes, including those with bomb racks installed will be held on alert from 8:00 o'clock, ready to leave within ten (10) minutes after receiving call from this office.
2. They will be prepared to carry out missions of bombardment and to attack designated targets on the ground.
3. The sector of the Group is between the lines: St. Mihiel—Lachaussee and Nancy—Solgne.
4. All conflicting orders are hereby revoked.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 12th, 1918

Operations Order
No. 35

1. The 103rd Squadron will furnish a patrol of 3 planes to leave as soon as possible to make a reconnaissance in the region of Rupt de Mad (river) southwest of Thiaucourt. All phases of enemy activity will

(l. to r.) Robert Soubiran, Kiffin Yates Rockwell, Ciecomski (French armament officer), Capt. Georges Thenault, Andrew C. Campbell, and William Thaw, posing next to an aircraft at the 103d Aero Squadron.

be observed, and pilots will on their return, telephone their reports to Wing Headquarters from this office.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 12th, 1918

Operations Order
No. 36

1. The 93rd Squadron will furnish a patrol of three planes to leave as soon as possible to make a reconnaissance in the region of Rembercourt-Charey and Dampvitoux. All phases of enemy activity will be observed, and pilots will, on their return, telephone their report to Wing Headquarters from this office.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

—74—

Third Pursuit Group
Operations Office
September 12th, 1918

Operations Order
No. 37

1. The following squadrons will send out all their available planes as soon as possible to bomb and attack with machine guns all concentrations of troops on the respective roads assigned to each Squadron:

28th Squadron, road between Arnaville and Waville.
93d Squadron, road between Waville and Chambley.
213th Squadron, road between Waville and Rembercourt.

2. If better objectives are seen in the immediate region of the roads assigned, Flight Commanders may decide to attack them.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 12th, 1918

Operations Order
No. 38

1. The 103rd Squadron will send out all their available planes as soon as possible to bomb and attack with machine guns all concentration of troops on the roads between Pannes and Beney, and between Chambley and Dampvitoux.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 12th, 1918

Operations Order
No. 39

1. The 28th, 93rd, 213th Squadrons will send all available planes to bomb and attack with machine gun fire any concentration of troops seen on the roads between Vigneulles and St. Benoit, and between Dampvitoux and Chambley, with the mission of hampering the enemy's retreat.
2. Planes will leave by flights, the first to leave at 16:15, and the others to follow in the shortest possible time in order.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 12th, 1918

Operations Order
No. 40

1. The 103rd Squadron will send all available planes to bomb and attack with machine gun fire any concentration of troops seen on the roads between Vigneulles and Chambley, with the mission of hampering the enemy retreat.
2. Planes will leave by flights, the first to leave as soon as possible and the others to follow in the shortest possible order of time.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 12th, 1918
15:00 o'clock

Operations Memorandum
Number 49

1. According to the latest available information the present line of battle is approximately: Summit of Montsec, northwest to a point between Pannes and Essey, northeast to 1 kilometer south of Thiaucourt (Chateau Thiaucourt), north of Vieville, east to Mosell river.
2. Squadron Operations Officers will keep the pilots advised on any changes in the line of battle.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Officer
September 12th, 1918
15:45 o'clock

Operations Memorandum
Number 50

1. According to latest available information the present line of battle is approximately: Le Mont, Montsec, Nonsard, Pannes, Thiaucourt, Vieville-en-Haye, Vandiers.
2. Squadron Operations Officers will keep their pilots advised on any changes in the line of battle.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 12th, 1918

Operations Memorandum
Number 51

1. To Squadron Commanders:
If necessary to complete minor repairs on planes work will be continued until midnight in order to have a maximum number of planes available for tomorrow.
Great care will be taken in handling light in hangars.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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103rd Aero Squadron
September 12th, 1918

Flying Orders

All available planes, including those with bomb racks installed, will be held on alert from 8.00 o'clock, ready to leave within ten (10) minutes after receiving call from this office. They will be prepared to carry out missions of bombing and to attack designated targets on the ground.

The sector of the Group is between the lines St. Mihiel—Lachaussee and Nancy—Solgne.

Special Mission. A patrol of three planes will be made to leave as soon as possible to make a reconnaissance in the region of Rupt de Mad (river) southwest of Thiaucourt. All phases of enemy activity will be observed, and pilots will, on their return telephone their reports to Wing Headquarters from this Office.

Road Strafing. All available planes will leave immediately to bomb and attack with machine gun fire any concentration of troops seen on the roads between Vigneulles and Chambley, with the mission of hampering the retreat.

Planes will leave by flights, the first to leave as soon as possible and the others to follow in the shortest possible time in order.

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Operations Office
213th Aero Pursuit Squadron
September 12th, 1918

Operations Order
Number 12.

1. All available planes will leave as soon as possible to bomb and attack with machine guns all concentrations of troops on the road between Waville and Rembercourt.
2. If better objectives are seen in the immediate region of the roads assigned, Flight Commander may decide to attack them.

By order of Lieut. Hambleton

E. N. Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

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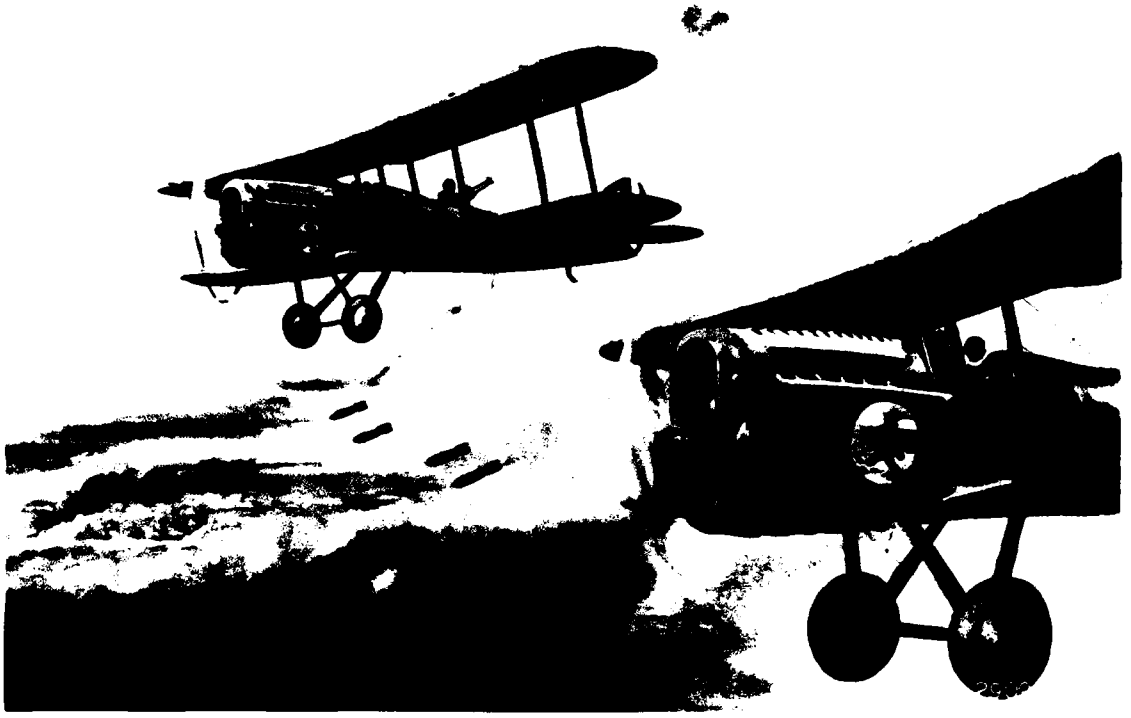
Operations Office
213th Aero Pursuit Squadron
September 12th, 1918

Operations Order
Number 13.

1. The 213th (and 28th, 93rd, and 103rd) Squadron will send all available planes to bomb and attack with machine gun fire any concentration of troops seen on the roads between Vigneulles and St. Benoit, and between Dampvitoux and Chambley, with the mission of hampering the enemy's retreat.
2. Planes will leave by flights, the first to leave at 16:15, and the others to follow in the shortest possible time in order.

By order of Lieut. Hambleton

E. N. Hunt
1st Lieut., A.S., U.S.A.
Operations Officer



DH-4 aircraft of the 11th Aero Squadron, in a bombing attack.

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The following order for a training flight apparently was issued before receipt of the 1st Wing's operations order for the first day of the Battle of St. Mihiel (Doc. 63). The 20th, as well as the 11th Aero Squadron, had received DH-4 aircraft at the end of August and had moved to Amanty at the end of the first week in September. Up until the time they became part of the new Day Bombardment Group that was formed at Amanty on 10 September, the 11th and 20th Squadrons thought they were to be biplace pursuit units. They had no bombs and no training in bombardment when the Battle of St. Mihiel began. Both squadrons flew barrage patrols with the 2d Pursuit Group (Doc. 63) during the first two days of the battle and switched to bombardment on 14 September.

Headquarters, 20th Aero Squadron
1st Day Bombardment Group
A.P.O. 703, A.E.F.
Sep 11, 1918

Operation Order
No. 1

The following named officers will stand-by at 8:30 a.m. Sept 12, 1918, for an exercise Flight at 9:00 a.m.

1st Lt M W Leach	1st Lt H W Wilmer
1st Lt S P Randell	1st Lt G H Fiske
1st Lt R E Townes	1st Lt W H Bunkley
1st Lt P H Rhinelander	1st Lt H C Preston
1st Lt W C Potter	1st Lt W F Frank
1st Lt K G West	2nd Lt G W Shultz
1st Lt M C Cooper	1st Lt M C Leonard
1st Lt S Howard	1st Lt E A Parrott
2nd Lt D MacWhirter	1st Lt W S Holt

1st Lt E A Parrott
Operations Officer

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Operations Office
96th Aero Squadron
Sept 12, 1918

Operations Order No. 58

The following pilots and observers will stand by for bombing mission at one and remain until relieved:

Position Pilot	Observer	Plane No.
1. Gundelach	Way	1
2. Farnsworth	R E Thompson	13
3. Beverly	Newbury	15
4. Codman	Evans	19
5. Bates	Pressler	3
6. C P Young	Smith	20
7. Hopper	Kelley (camera)	5

8. Hopkins	Williams	9
9. Elliott	Ellis	10
10. Forshay	O'Donnell	8

P H Way
2nd Lt A S U S A Operations Officer

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Headquarters 24th Aero Squadron
1st Army Observation Group

Missions for September 12th 1918.

1. Visual Reconnaissance at 14.30 o'clock

Observer	Pilot	Plane No.
Lt. Lee III	Lt. Hill	
Lt. Cousins	Lt. Smith	
Lt. Holland	Lt. Tuttle	
Lt. Weitishek	Lt. Hall	
Lt. Collins	Lt. Goodfellow	

2. Special Cross Country Flight at 10:00 o'clock Lt. Cauchon and Lt. Wengert will report to Lt. Snyder at Group Observers room at 9.00 o'clock for information on their trip. Lt. Wells, Lt. Peters, Lt. Conroy, Lt. McCarty, Lt. Cottrell and Lt. Rubel will report to Lt. Dillon at C. hangar at 9:30 o'clock.

By order of Lieut. Maury Hill, A.S. U.S.A.

John W. Cousins
1st Lieut. Inf.
Operations Officer

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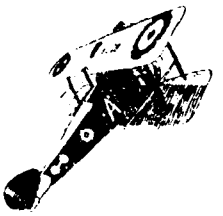
Headquarters 91st Aero Service Squadron

Missions for Sept. 12, 1918.

1. Reconnaissance

	At 10:00	
Lt Mangan[b]	Lt Lambert	13
Lt Schricker	Lt Powell	1

	At 2:30	
Lt. Mangan	Lt. Lambert	
Lt Schricker	Lt. Powell	
	At 5:00	
Capt Wallis	Lt Strahm	
Capt Roper	Lt Hughey	
	Lt Frierson	



2. Photographic

Missions outlined in Blue at 11:45		
Capt Wallis	Lt Strahm	
Capt Roper	Lt Hughey	
	Lt Frierson	
Missions outlined in White at 11:45		
Lt Cousins	Lt Hill	17
Lt Hammond	Lt Diekema	3
Lt Sieper	Lt Chamberlin	
Lt Martin	Lt Coles	
Lt Badham	Lt Kenney	5
Capt Tabachnik	Lt Delana	
Missions outlined in Red at 11:45		
Lt Lawson	Lt Cook	8
Lt Lowry	Lt Guilbert	11
Lt Jervey	Lt Kelty	16
Lt Seymour	Lt Douglass	18
Lt Richardson	Lt Baker	10
Lt Jannopoulo	Lt Van Heuvel	15
RESERVE		
Lt Snyder 8	Maj Reynolds	4

By order of Major John N. Reynolds.

John H Snyder, 2nd Lt. A.S.
Operations Officer

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Headquarters
Observation Group—Fourth Army Corps
Operations Office
Sept. 11, 1918

Operations Order #8.

1. Pursuant to Field Order #14, Headquarters 4th Army Corps, Sept. 8th, 1918; The squadrons operating under the direction of this group will submit to this office not later than midnight of the day "D" minus one, a schedule of operations based on the following requirements:

(a) The 8th, 90th and 135th Squadrons will each furnish, during the day "D", one infantry Contact plane and one artillery counter attack Plane at the following hours: H to H plus [0:45, H plus] 0:45 to H plus 1:45, H plus 1:45 to H plus 2:45, H plus 2:45 to H plus 4:00. Planes leaving field at such a time that they can test out radio and be on lines at time indicated and will remain on line for time specified. All planes will operate in the areas occupied by the divisions to which they are assigned.

(b) Each squadron will be prepared to furnish Artillery Adjustment planes at the hours, H to H plus 2:00 and H plus 2:00 to H plus 4:00.

(c) Two (2) Reserve Alert planes will be held in readiness from daylight to dark.

(d) In addition to the above, the 8th squadron will furnish one Artillery plane to work with the 8th Howitzer Battery under the plan of liaison prescribed. The 90th Squadron will furnish 2 Command Planes to operate from the landing field near Menil-la-Tour. These planes must be ready to operate from that field at daybreak, on the Day D. Also the 90th Squadron will furnish 1 Courier Plane (Observer a [?] Machine Gunner) to operate from Menil-la-Tour field.

2. Planes sent on the various missions, will be equipped with all the radio and other equipment necessary for the proper discharge of the mission.

3. It shall be the duty of the officer in each squadron in charge of flying to report the departure to Group Operations Office of all missions as heretofore, and he will also be directly responsible for the getting off promptly of all the Alert Calls for his squadron in addition to the regular scheduled flights.

4. In the event the hour H is such that Observation is impossible, the schedule will be delayed until such time as it is possible to carry out the missions. The Pilots and Observers will therefore hold themselves in readiness in case they do not get off at the scheduled time

5. Radio Department will have an Operator "Listening in" at all hours when planes are out and will report promptly, the signal "I am going to land" or "Relieve me."
6. Observers will send out the proper signal whenever possible in case it is necessary for them to cease work before they are due to leave the lines.

By order of Major J. T. McNarney.

Jack Phinizy, 1st Lt., C.A.C.
Group Operations Officer

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Headquarters
Observation Group—Fourth Army Corps
Operations Office
Sept. 11, 1918

Operations Order #9.

1. After H hour plus 4:00 hour on the day "D", and until such a time thereafter as may be deemed necessary, the squadrons under this command will be prepared to furnish [to] the limit of their capacity the personnel and material for the discharge of such missions as may be assigned to them by this office.
2. The Squadron commanders will therefore have their entire command "Stand by" in the event that other sorties must be made.
3. Every effort will be made to have the maximum number of airplanes available at all time.

By order of Major J. T. McNarney

Jack Phinizy, 1st Lt., C.A.C.
Group Operations Officer

—90—

Headquarters
Observation Group—Fourth Army Corps
8 A.M. Sept. 12, 1918

Operations Order 10

Each squadron will keep one infantry plane and one artillery counter attack plane on the line until further notice.

By order of Major J. T. McNarney

Jack Phinizy, 1st Lt., C.A.C.
Group Operations Officer

—91—

Headquarters
Observation Group—Fourth Army Corps
American E.F.
2:30 P.M.
September 12, 1918

Operations Order No. 10.

Beginning at 5:30 P.M. today the Artillery Counter Attack Plane will be on the line until dark.

This plane will endeavor to locate Allied batteries and upon finding one or some of them will drop a message stating that it is using a certain wave length and call letter, and that objectives will be designated to the battery thus notified.

After this had been done the plane will adjust the fire of the battery until it is properly corrected.

By order of Major J. T. McNarney

Jack Phinizy, 1st Lt., C.A.C.
Operations Officer

Note: This plane will pay especial attention to movements and troops in rear of enemy lines.

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Headquarters 90th Aero Squadron
Observation Group—Fourth Army Corps
Sept. 12, 1918

Infantry Contact Planes

(Equip each of these planes with one streamer on each wing).

Observer	Pilot	Plane No.	Time
Lt. Vinson, F. L.	Lt. Rohrer, L.E.	16	5:20
Lt. Loew, W. O.	Lt. Kinsley, W.E.	10	6:00
Lt. Shuss, P.B.	Lt. Livingston, J.W.	2	7:00
Lt. Sherrick, J.C.	Lt. White, M.O.	1	8:00

(Planes (a) and (b) will be reserved).

Reserve — Lt. Neidecker, B.C.

(Reserve pilot must be on field from 4:30 and plane ready).

Artillery or Counter Attack Planes

Lt. Walden, D.M.	Lt. Lee, M.G.	15	5:20
Lt. Bogle, H.C.	Lt. Young, J.S.	19	6:00
Lt. Sullivan, A.P.	Lt. Bovard, J.M.	11	7:00
Lt. Hayden, V.B.	Lt. Pierson, N.E.	14	8:00

(Reserve planes (c) and (d).)
(Equip planes 15—19—11 and 14 with two message containers.)

Command Planes

Lt. Francis, W.L.	Lt. Cowle, H.H.	3	5:00
Lt. Lake, H.A.	Lt. Conover, Harvey	4	5:20
	Lt. Dorrance, G.M.	6	5:20

Reserve Artillery Plane

Lt. Parr, A.E.	Lt. Pike, G.M.	17	

Photographic Plane

Lt. Lindstrom, G.T.	Lt. Carver, Leland	12	

Lt. Broomfield will be in charge of the field and will report to Lieut. Gallop for instructions.

All Pilots not on the above schedule will be on the field ready to fly.

Observers will be at Group Headquarters excepting while on a mission and one half hour prior to time scheduled for departure.

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer

—93—

Headquarters
90th Aero Squadron
Observation Group—Fourth Army Corps
9:30 Sept. 12, 1918

Infantry Contact Planes

(Equip each plane with one streamer on each wing)

Observer	Pilot	Plane No.	Time
Lt. Lowe, W.O.	Lt. Kinsley, W.E.	10	9:45
Lt. Vinson, F.L.	Lt. Rohrer, L.E.	16	10:45

Lt. Harold M. Gallop

Lt Shuss, P.B.	Lt. Livingston, J.W.	2	11:45
Lt. Sherrick, J.C.	Lt. White, M.O.	1	12:45

Artillery Counter Attack Planes

These will go out in the following order for one hour tours, each leaving on return of the one ahead of it.

Lt. Parr, V.B.	Lt. Pike, G.W.	17	9:45
Lt. Walden, D.M.	Lt. Lee, G.M.	15	
Lt. LSullivan, A.P.	Lt. Vovard, J.M.	11	
Lt. Hayden, V.B.	Lt. Pierson, N.E.	14	

Photographic Mission

Lt. Lindstrom, G.T.	Lt. Carver, Leland Protection	7	1:00 P.M.
Lt. Grier, A.T.	Lt. Ellis, H.R.	9	1:00 P.M.

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer

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Headquarters
90th Aero Squadron
Observation Group—Fourth Army Corps
Noon, September 12, 1918

Hourly reconnaissance trips will be made this afternoon, the planes leaving on the return of the one scheduled ahead of it at about the hour named.

To test wireless call XG (no. of plane).

Observer	Pilot	Plane No.	Time
Lt. Sullivan, A.F.	Lt. Bovard, J.M.	11	12:15
Lt. Hayden, V.B.	Lt. Pierson, N.E.	14	1:15
Lt. Burger	Lt. Niedecker, B.C.	9	2:15
Lt. Shuss, P.B.	Lt. Livingston, J.W.	2	3:15
Lt. Sherrick, J.C.	Lt. White, M.O.	1	4:15
Lt. Parr, A.E.	Lt. Pike, G.M.	17	5:15

Lt. Lindstrom, G.T.	Lt. Carver, Leland	12	6:15
Lt. Grier, A.T.	Lt. Niedecker, B.C.	9	7:15

Observers and pilots will keep in touch with the advance and keep up their maps.

Drop messages at Divisions and Corps Headquarters showing as much information as possible.

Equip all planes with the following:

1. Streamer on each wing.
2. Two message tubes.
3. Wireless either 270 or 125 wave length, preferably 270.

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer

Reports

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27th Aero Squadron, A.S.[a]
Operations Office
1st Pursuit Group
September 12th, 1918

Atmospheric conditions—cloudy and rain.
From 16 h Sept/11 to 16 h Sept/12/18.

1)—1 Patrol. 7 h 29 to 10 h 05, 8 planes. Lts. Vasconcells, Luke, Clapp, Hewitt, Donaldson, Hudson, Dawson and Wehner. Alt. 200 meters. Lt. Luke has not returned. For results of this patrol see pilots reconnaissance reports.[b]

2)—1 Patrol. 11 h 23 to 12 h 40, 6 planes. Lts. Rucker, Clapp, Wehner, Nicolson, Wilson and Stout. Alt. 300 meters. For results of this patrol see reconnaissance report of Lt. Rucker.

1)—Alert. 15 h 10 to____,[c] 3 planes. Lts. Donaldson, Roberts and Stout.

Summary

a)	Sorties	14
b)	Combats	1
d)	Pilots available	18
e)	Pilots total	19

f)	Pilots missing	1
i)	Enemy planes unconfirmed	1 (balloon)
j)	Total planes	23
k)	Available planes	14
l)	Total flying hours	14 h 52″
m)	Total service hours	14 h 22″
o)	Patrols	2
s)	Planes dropped	2

—96—

27th Aero Squadron[a]
Sept. 12, 1918

Combat and Reconnaissance Reports

Lt. E. W. Hewitt reports: Left ground at 7 h 30 to go on individual patrol and reconnaissance. Our artillery is very active at St. Mihiel. German artillery is very active on the heights east of St. Mihiel. Saw enemy balloon up at Montsec. Motor trouble prevented me from going further over the lines.

Lt. Leo H. Dawson reports: Left ground at 7 h 50. Followed Lieut. Donaldson until we became separated due to low clouds. Found I was too far South of the lines, turned and flew North until I encountered a line of balloons. Flew by them unmolested, thinking they were ours. Proceeded North East crossing a range of mountains in the vicinity of a town which I take to be Vigneulles. Was fired at by machine guns and fired good bursts from both guns at troops on ground. I then turned and started out. Noticed a Salmson with American Cocardes on ground right side up. North east of Mihiel. Was forced to land at French Airdrome, out of gas at Erize. Returned from there home, and landed this airdrome at 10 h 05. This was my first flight over this sector, consequently the locations of which I saw is principally guess work.

Lt. E. W. Rucker Jr. reports: Patrol, inside, over and beyond lines St. Mihiel, Douaumont. Most artillery activity in section Lacroix-Vigneulles-Cambres where some guns near former No Man's land were firing in the open. Was archied from St. Mihiel to approximately Moinville but it was archied also and guns seemed to be nearer the lines than formerly in Verdun region. Villages north of Vigneulles were being heavily shelled as was Vigneulles itself. Observed some of our artillery moving forward north of Lacroix. Attempted straffing A.A. (supposedly) battery near Savonnieres and St. Mihiel. Fired approximately 175 rounds.

Lt. R. W. Donaldson reports: Left ground at 7 h 45. Patrolled from St. Mihiel to Verdun. Clouds very low. Flew at 300 meters. Visibility very poor. Heavy artillery action on both sides. Heaviest, just south east of Verdun about six or eight km. Saw one of our balloons in this vicinity, saw three of our Spads and one Salmson. The Salmson was near Verdun. No enemy aircraft. No combats.

Lt. K. S. Clapp reports: Left ground at 7 h 50. Flew to Lamorville. I flew from Lamorville to les-Eparges in circles. Found the road from Mouilly to St. Remy being heavily shelled. The town of Lamorville or Lavigneville is on fire. I saw our troops advancing from Vaux-les-Palameix on the road North East. From Maizy [?] to Ronurois [?] our troops are advancing in open file, but could not see any enemy infantry in the open at that place. I saw one Bi-place machine for an instant in the clouds and mist, but could not detect whether it was a Bregeut or an enemy machine.

Lt. J. F. Wehner reports: Individual patrol against enemy aircraft and reconnaissance. Patrolled from Combres to Montsec. In the vicinity of Montsec, saw a balloon (Sausage) at 7 h 40, and attacked from the rear, firing 100 rounds. The balloon did not burn, but was immediately hauled down. The machine gun fire in the vicinity of the balloon was terrific. In the rear of St. Mihiel noticed particularly rapid and incessant light artillery fire. While N. E. of St. Mihiel attacked a wagon train of 7 wagons which were retreating through the woods. I dispersed several of the horses. I saw the white balloon at 8 h 00 N. E. of St. Mihiel, and also another south of Montsec. Confirmation of balloon requested.

Lt. Donald Hudson reports: Left ground at 7 h 40. Went to St. Mihiel. Flew over our lines almost to Verdun. Made a circle into German lines and back to our lines. I followed our lines down to Combres and flew down to St. Mihiel and back to this point several times. There is heavy enemy artillery fire along this part of the line. Fired several rounds into automobiles in the town of St. Mihiel. Saw no enemy balloons off the ground. Saw 3 of our own balloons, 2 of our Spads and 2 of our Brequets. Returned to airdrome at 8 h 50.

Lt. E. W. Rucker reports: Started out with Lt. Hoover to straffe woods. Lt. Hoover had to return with broken prop. Went to edge of woods as ordered east of Spads. Transport mentioned in order was not in evidence. Many villages east and north east of that point were on fire.

Lt. Frank Luke reports: Saw 3 E. A. near Lavigneville and gave chase following them directly east towards Pont-a-Mousson where they disappeared towards Metz. Saw enemy balloon at Marieulles. Destroyed it after three passes at it. Each within a few yards of the balloon. The third pass was made when the balloon was very near the ground. Both guns stopped so pulled off to one side. Fixed left gun

and turned about to make one final effort to burn it, but saw it had started [?] the next instant it burst into great flames and dropped on the winch, destroying it. The observer Joseph M. Fox who saw the burning said he thought several were killed when it burst into flames so near the ground. There was a good field near our balloons, so landed for confirmation. Left field and started back when my motor began cutting out. Returned to same field, and there found out my motor could not be fixed, so returned by motor cycle. Attached you will find confirmation from Lt. Fox and Lt. Smith. Both saw burning.[b]

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94th Aero Squadron
Operations Office
September 12th, 1918

To-day's Schedule of Operations.

1. Patrol. Reconnaissance for Enemy Troops. (5) planes. Lieut. Chambers, Patrol Leader. 7 h 35 to 9 h 10. Lieuts. Eastman, Cook, Jeffers, and Sparks. See Lieuts. Taylor and Cook's reconnaissance reports. Altitude reached 300 meters. Visibility at time of patrol very poor.

2. Patrol of Upper Echelon. Reconnaissance for Barrage Patrol. (4) Planes. Lieut. Cates, P. L. 12 h 20 to 12 h 36. Lieuts. Palmer, Snow, and Zacharias. See reconnaissance report of Lieuts. Cates, Zacharias, Snow, and Palmer.

3. Patrol of Lower Echelon. Reconnaissance for Barrage Patrol. (3) planes. Lieut. Coolidge, P. L. 12 h 30 to 13 h 51. Lieuts. Cook and Eastman. See reconnaissance report of Lieut. Eastman. Lieut. Cook had not as yet returned. Lieut. Coolidge panned on road two kilometers East of Fresnes-au-Mont, toward St. Mihiel.

4. Voluntary Patrol, Verdun to St. Mihiel. (2) planes. Lieut. Rickenbacker and Chambers. 12 h 26 to 13 h 54. See reconnaissance report of Lieut. Chambers and Rickenbacker.

(a)	Sorties	14
(b)	Trials	0
(c)	Combats	0
(d)	Pilots Available	20
(e)	Total Pilots	20
(f)	Pilots Missing	1
(g)	Pilots Wounded	0
(h)	Enemy Planes confirmed	0
(i)	Enemy planes unconfirmed	0

Lt. Reed M. Chambers, 94th Aero Squadron, credited with six aerial victories.

(j)	Total Planes	24
(k)	Available Planes	17
(l)	Total Flying Hours	18 h 16
(m)	Total Service Hours	18 h 16
(n)	Alerts	0
(o)	Patrols	3
(p)	Protection Patrols	0
(q)	Voluntary Patrols	1
(r)	Special Missions	0
(s)	Planes Dropped	0
(t)	Planes Received.	0

A. L. Cunningham
2nd Lieut. AS. USA.

—98—

94th Aero Squadron
9/12/18

Reconnaissance Report

Time out: 7 h 35
Time in: 8 h 25
Max. Altitude: 200 m.

Missions: Reconnaissance for enemy troops.
Weather: 300 m. good underneath.
Pilot: Lt. Taylor, F. C., Eastman, Cook, Jeffers, and Sparks.

Lieut. Taylor Reports: Three Towns in flames; Lavigneville, Chatillon and Creue. Barrage very heavy over Vigneulles and Creue. Infantry seen advancing through valley as far as Chatillon. Boche still in St. Mihiel. No Boche balloons seen at Vigneulles. Our balloons at Troyon-sur-Meuse up 250 meters.

J. Bayard H. Smith
1st Lieut. AS. USA
Acting Operations Officer

—99—

94th Aero Squadron
9/12/18

Reconnaissance Report

Time out: 7 h 45
Time in: 9 h 00
Max. Altitude: 200 m.
Mission: Reconnaissance.
Weather: Poor.
Pilot: Lt. Taylor, P.L., Lts. Eastman, Cook, Jeffers, and Sparks.

Lt. Cook Reports: In region of Deuxnouds-aux-Bois saw grey colored Biplace with red, white and dark cocardes at 8 h 15. Explosion in region of Creue. American Infantry with very few French intermingled advancing in columns toward Vigneulles-les-Hattonchatel at 8 h 25. Enemy balloon up for a few minutes in region of Heudicourt.

Arthur L. Cunningham
2nd Lieut. AS. USA

—100—

94th Aero Squadron
9/12/18

Reconnaissance Report

Time out: 12 h 10
Time in: 13 h 35
Max. Altitude: 1500 m.

Mission: Reconnaissance-Barrage Patrol.
Weather: Fair.
Pilot: Lt. Cates, P.L., Lt. Snow, Zacharias and Palmer.

Lieut. Cates Reports: A very large column of black and white smoke was seen in the region of Chatillon, filling the entire valley north of St. Mihiel. A machine was seen on the ground in the region of Lacroix sur Meuse.

Lieut. Zacharias Reports: Large fire observed in the region of Chatillon. Several minor fires noted at points north of Chatillon. Enemy anti-aircraft activity in the region of Heudicourt.

Lt. Snow Reports: I saw one Spad, No. 22, down with two or three diagonal stripes in white in the region of Lacroix sur Meuse. Artillery activity all along the line. Received three bullets in plane when flying over region of Hattonchatel Creue. These bullets were fired from the ground.

Lieut. Palmer Reports: Dense clouds of smoke, both black and white, observed filling the entire valley north of St. Mihiel.

J. Bayard H. Smith
1st Lieut. Air Service, USA.
Acting Operations Officer

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94th Aero Squadron
9/12/18

Reconnaissance Report

Time out: 12 h 30
Time in: 13 h 51
Max. Altitude: 1500 m.
Mission: Reconnaissance-Patrol.
Weather: Poor.
Pilot: Lt. Coolidge, P.L., Cook, and Eastman.

Lieut. Eastman Reports: Patrol formed by Lieuts. Coolidge, Cook and myself. Early in patrol became coupled alone with Lieut. Coolidge. Noted number of fires in region east of Wadonville, meeting considerable enemy anti-aircraft fire in that vicinity. One fire of a large hangar, apparently an enemy munitions dump, was out of control near Woel. Our Artillery appeared to be taking great effect on the

ridges southwest of Vigneulles les Hattonchatel. Received attention from enemy anti-aircraft around St. Mihiel, where we passed one of our Salmsons several times. At end of patrol, Lieut. Coolidge went "en panne" in our lines without injury. Two kilometers east of Fresnes au Mont identified plane No. 22 of 95th Squadron "en panne" just in our lines. A single Spad, apparently separated from its patrol and continuing alone, was near us at times, possibly Lt. Cook.

Lieut. Cook has not returned.

J. Bayard H. Smith
1st Lieut. Air Service, USA
Acting Squadron Operations Officer

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94th Aero Squadron
9/12/18

Reconnaissance Report

Time out: 16 h 12
Time in: 17 h 25
Max. Altitude: 5200 m.
Mission: Reconnaissance.
Weather: Very bad rain storm.
Pilot: Chambers, P.L., Sherry, & Kaye.

Lt. Chambers Reports: Observed very numerous fires in region of Vigneulles and Montsec. American Artillery advancing along road from Vigneulles to Chatillon; look like 75. No German planes seen. Great many fires observed from Fresnes to Doncourt.

J. Bayard H. Smith
1st Lieut. AS. USA.
Acting Operations Officer

—103—

Headquarters 95th Aero Squadron
Operations Office
Sept. 12, 1918

Report of Operations from 18 h 00 Sept. 11 to 18 h 00 Sept. 12.

1) Patrol 10 h 00 to 11 h 00; 2 planes; 1400 meters; field line Chatillon and St Mihiel; Lts. Heinrichs and Taylor; 1 combat, see report.

2) Patrol 10 h 15 to 11 h 15; 2 planes; altitude 550 meters; line Chatillon and St Mihiel; Lts. Mitchell and Holden. Lt. Holden had forced landing at Lacroix sur Meuse, see reconnaissance report of Lt. Heinrichs.

3) Patrol 10 h 25 to 12 h 00; 2 planes, altitude 500 meters; line Chatillon and St Mihiel; Lts. Avery and Proudfit; nothing to report.

4) Patrol 10 h 40 to 11 h 50; 2 planes; altitude 600 meters; Chatillon and St Mihiel; Lts. Curtis and Sewall; see reconnaissance report of Lt. Curtis.

5) Patrol 10 h 55 to 11 h 30; 1 plane, altitude 550 meters; Chatillon and to St Mihiel; Lt. Woodard; nothing to report.

6) Patrol 11 h 35 to 12 h 35; 2 planes; altitude 600 meters; Chatillon to St. Mihiel. Lts. McLanahan and Knowles; nothing to report.

Summary

a) Sorties 11
b) Trials 9
c) Combats 1
d) Pilots available 18
e) Total pilots 19
j) Total planes 24
k) Available planes 17
l) Total flying hours 10 h 10
m) Total service hours 10 h 10
o) Patrols 6.

Edward Butts Jr.
1st Lt. AS USA
Operations Officer

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Operations Office
147th Aero Squadron
Amer. E.F.
September 12th, 1918

Daily Report No. 96, 9/11 to 9/12 to 16 h. 00.
To Operations Officer, First Pursuit Group

1. Patrol, 3 planes, Lieuts. O'Neill (leader) Muther and Jones. Altitude 500 meters. Clouds very low. Mission patrol along lines from Chatillon-sous-les-Cotes to St. Mihiel. Time 9 h. 15 to 10 h. 55.

Lieut. O'Neill reports no E.A. sighted. Concentrated allied artillery activity. Fresnes-en-Woevre, Manheulles and heights along sector being heavily shelled. No balloons up. No movement of enemy troops sighted near front. Many Allied bombers crossing up and down the lines.

Lieut. Muther reports no E.A. observed. Clouds low at 500 meters. The town of Fresnes-en-Woevre was seen to be on fire. Our artillery firing from about 200 yards past front line between St. Remy and Compierre-aux-Bois. Many Allied planes observed.

Lieut. Jones reports no E.A. observed. No balloons up. Allied artillery very active. Many Allied planes, including bombers, going over lines all over sector. Saw some French troops in the region of Mouilly. Could not distinguish Americans on lines. Not very much activity on roads. Enemy artillery not very active. The above observed about 10 h. 45.

2. Patrol, 5 planes, Lieuts. White (leader), Brotherton, Dowd, Simon and Bronson. Altitude 1,000 meters. Clouds very low. Mission patrol from Chatillon-sous-les-Cotes to St. Mihiel. Time 13 h. 45 to 14 h.15. Nothing to report.

Lt. Bronson was forced to land at Pierrefitte, due to engine conking. Pilot unhurt.

Summary

a)	Sorties	6
b)	Trials	0
c)	Combats	0
d)	Pilots available	19
e)	Total pilots	22
f)	Pilots missing	0
g)	Pilots wounded	0
h)	Enemy planes confirmed	0
i)	Enemy planes unconfirmed	0
j)	Total planes	25
k)	Available planes	16

l)	Total flying hours	7 h. 15
m)	Total service hours	7 h. 15
n)	Alerts	0
o)	Patrols	2
p)	Protection patrols	0
q)	Voluntary patrols	0
r)	Special missions	0
s)	Planes dropped	0
t)	Planes received	0

By order of Lieut. James A. Meissner

G.A.S. Robertson
1st Lt. A.S. U.S.A.
Acting Operations Officer

—105—

147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good at 500 meters.
Mission: Patrol along lines from Chatillon-sous-les-Cotes to St. Mihiel.
Route Actually Followed: Watronville to St. Mihiel.
Names of Pilots on Patrol and Leaders: Lts. O'Neill (leader), Muther, and Jones.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
9 h. 15	10 h. 55	500 meters	147th	Sept. 12

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down out of Control E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

No enemy aircraft sighted. Concentrated Allied artillery activity. Fresnes-en-Woevre, Manheulles, and heights along sector being heavily shelled. No balloons up. No movement of enemy troops sighted near front. Many allied bombers crossing up and down lines.

R. A. O'Neill
2nd Lt. Air Service, U.S.A.

No enemy aircraft observed. Clouds low at 500 meters. The town of Fresnes-en-Woevre was seen to be on fire. Our artillery fires from about 200 yards past front lines between St. Remy Dompierre-aux-Bois. Many Allied planes observed.

W. P. Muther
1st Lt. Air Service, U.S.A.

No enemy aircraft observed. No balloons up. Allied artillery very active. Many Allied including bombers going over lines all over sector. Saw some French troops in the region of Mouilly. Could not distinguish Americans on lines. Not very much activity on roads. Enemy artillery not very active. The above observed at 10 h. 45.

A. H. Jones
2nd Lt. Air Service, U.S.A.
E. A. Love
1st Lt. A.S. U.S.A.
Squadron Operations O.

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147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Poor.
Mission: Patrol lines btw. Chatillon-sous-les-Cotes and St. Mihiel.
Route Actually Followed: Watronville to St. Mihiel.
Names of Pilots on Patrol and Leaders: Lt. Raible (leader), Brotherton, Love, Abernathy, and Muther.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
18 h. 55	19 h. 55	1,000	147th	Sept. 12

Number of E.A. Seen: 4 Time: 19 h. 30

Number of E.A. Encountered: Time:
None
Type: Unknown Altitude: 4,500 m.
Region: Fresnes-en-Woevre Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames: E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down out of Control. E.A.: Allied:
Markings on E.A.:

Artillery gunners at St. Mihiel in the heat of action.

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Our artillery active. Not much Hun artillery activity. No E. A. observed. Around and in vicinity of Vigneulles-les-Hattonchatel big fire observed, probably ammunition dump.

Joseph C. Raible, Jr.
1st Lt. Air Service, U.S.A.
Leader

Woods and villages on fire from Fresnes-en-Woevre south to St. Mihiel. 4 E.A. observed around Fresnes-en-Woevre south to St. Mihiel. 4 E.A. observed around Fresnes-en-Woevre at about 4500 meters at 19 h. 30.

Walter P. Muther
1st Lt. Air Service, U.S.A.

Much artillery activity on our side of lines and several fires near Monts and north.

W. E. Brotherton
2nd Lt. Air Service, U.S.A.
S. M. Purcell
2nd Lt. Air Service, U.S.A.
Squadron Operations O.

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First Pursuit Group
Operations Office

Operations Report, 17:00, Sept. 11th, 1918. Sept. 12th, 1918.

1. Atmospheric Conditions. Very cloudy and raining intermittently throughout the day.

2. Enemy Aerial Activity.

a. Airplanes. Allied activity very strong over the entire sector and correspondingly weaker in enemy activities especially on our left. At no time were large patrols seen.

b. Balloons. Many balloons were seen in ascension early this morning, but upon attack by our planes were immediately hauled down and as far as we are able to learn were kept down for the balance of the day.

c. Anti-aircraft. Not over annoying, but rather active in the locality of St. Mihiel, Heudicourt.

3. Activity of Your Own Organization.

a. 1 Patrol. 7 h 20 to 10 h 05, 8 planes, altitude 200 meters, Chatillon to St. Mihiel. See reconnaissance report attached. Lt. Luke has not returned.

1 Patrol. 7 h 45 to 9 h 10, 5 planes, altitude 300 meters. Chatillon to St. Mihiel. 94th Squadron. See reconnaissance report attached.

1 Patrol. 3 planes, 9 h 15 to 10 h 55, altitude 400 meters. Chatillon to St. Mihiel. 147th Squadron. See reconnaissance report attached.

1 Patrol. 10 h 00 to 11 h 00, 2 planes, altitude 1400 meters. Chatillon to St. Mihiel. 95th Squadron. 1 Combat. See reconnaissance report attached.

1 Patrol. 10 h 15 to 11 h 15, 2 planes, altitude 550 meters. Chatillon to St. Mihiel. 95th Squadron. See reconnaissance report attached. Lt. Holden had forced landing at Lacroix sur Meuse.

1 Patrol. 10 h 25 to 12 h 00, 2 planes, altitude 500 meters. Chatillon to St. Mihiel. 95th Squadron. Nothing to report.

1 Patrol. 10 h 55 to 11 h 30, 1 plane, altitude 550 meters. Chatillon to St. Mihiel. 95th Squadron. Nothing to report.

1 Patrol. 11 h 25 to 12 h 35, 2 planes, altitude 600 meters. Chatillon to St. Mihiel. 95th Squadron. Nothing to report.

1 Patrol. 11 h 25 to 12 h 40, 6 planes, altitude 300 meters. Chatillon to St. Mihiel. 27th Squadron. See reconnaissance report attached.

1 Patrol. 12 h 20 to 13 h 36, 4 planes, altitude 1300 meters. Chatillon to St. Mihiel. 94th Squadron. See reconnaissance report attached.

1 Patrol. 12 h 30 to 13 h 51, 3 planes, altitude 350 meters. Chatillon to Mihiel. 94th Squadron. See reconnaissance report attached.

Lt. Coolidge had forced landing on road two kilometers of Fresnes-au-Mont toward St. Mihiel. Lt. Cook has not as yet returned.

1 Patrol. 13 h 45 to 14 h 15, 5 planes, altitude 1000 meters. Chatillon to St. Mihiel. 147th Squadron. Nothing to report. Lt. Bronson had forced landing at Pierrfitte.

b. 1 Patrol. 1 Voluntary Patrol. 2 planes, 12 h 26 to 13 h 54, altitude 1500 meters. Chatillon to St. Mihiel. 94th Squadron. See reconnaissance report attached.

4. Miscellaneous.

All intelligence items of interest which happened during the day were reported at 9 h 00 and 15 h 00 by telephone to C.A.S. 1st Army. These bulletins are herewith attached. These items more fully

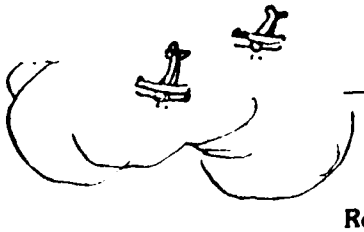
explained will be seen in the reconnaissance reports of the day, also attached.

Group Summary

(a)	Sorties	48
(b)	Trials	0
(c)	Combats	2
(d)	Pilots Available	75
(e)	Total Pilots	80
(f)	Pilots Missing	2
(i)	Enemy Planes Unconfirmed	1 balloon
(j)	Total Planes	96
(k)	Available Planes	64
(l)	Total Flying Hours	50 h 33
(m)	Total Service Hours	50 h 33
(o)	Patrols	13
(q)	Voluntary Patrols	1
(s)	Planes Dropped	2

	27th	94th	95th	147th
Pilots on Hand	19	20	19	22
Pilots Available	18	20	18	19
Planes on Hand	23	24	24	25
Planes Available	14	17	17	16

Romer Shawhan
1st Lieut. A.S. U.S.A.
Group Operations Officer



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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Above clouds good.

Mission: Line patrol.

Route Actually Followed: Toul, Louvigny, Villers, St. Boussant, Seicheprey, Toul

Names of Pilots on Patrol and Leaders:

Hour of Departure	Hour of Return	Altitude	Squadron	Date
7:00	8:45	3500	13th	Sept. 12

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:
Clouds very thick at 1000 meters. Above clouds visibility good and could see ground through occasional holes.

J. Dickinson Este
1st Lieut. A.S. U.S.A.

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Poor
Mission: Patrol
Route Actually Followed: Flirey to Pont-a-Mousson
Names of Pilots on Patrol and Leaders: Lt. Little, McCormick (leader), Agar, Tucker, La Force.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
5:45	8.01	3200-1000 M	22	Sept. 12

Number of E.A. Seen: 2 Time: 6.55
Number of E.A. Encountered: 1 Time: 6.55
Type: Bi-place, Type not known Altitude: 2200 M.
Region: Limey (N.E. of Flirey) Combats: 1
Number of Rounds Fired: 150 Confirmations Requested: no
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:
While flying at 2500 Meters it was almost impossible to observe action on the ground, but while flying at 1000 meters a number of fires could be seen behind the enemy lines. Did not observe any movement of any troops. Lt. McCormick appeared to have his machine under control at all times and also while he was trying to bring his machine into the wind so as to land on the aerodrome. No doubt he was killed instantly as the machine crashed very hard.

R. J. Little
2nd Lt. A.S. U.S.A

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Bad
Mission: Patrol
Route Actually Followed: Toul—Seicheprey—Pont-a-Mousson.
Names of Pilcts on Patrol and Leaders: Capt Bridgman (leader), Lts. Kimber, Little, McCormick, Tucker, La Force, Agar.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
6.15	7.35	1800 M.	22nd	Sept. 12

Number of E.A. Seen: 1, 1, 5 Time: 6.55–7.00–7.10
Number of E.A. Encountered: 1 Time: 6.55
Type: Hannoveraner, Rumpler, Rumplers. Altitude: 800-800-1500 M.
Region: Pois de Pretres Combats: 1
Number of Rounds Fired: 150 Confirmations Requested: 1
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: 1 Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:
At 6.55 attacked Hannoveraner at 800 M., over Bois le Pretres. Fired 150 shots at very close range from good position. E.A. went

down straight through clouds as out of control. Lost sight E.A. in clouds. Confirmation requested.

At 7.10 saw 5 enemy Rumplers in Region of St. Marie at 1500 meters. They retreated far into their lines too quickly for me to attack.

Motor was hit by bullet from ground, was flying at 200 M. Was obliged to land just beyond former German lines near Remenauville. Plane not injured.

Ray Claflin Bridgman
Capt. A.S. U.S.A.

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good under clouds.
Mission: Patrol
Route Actually Followed: Toul—Sector—Toul.
Names of Pilots on Patrol and Leaders: Lts Sperry (leader), Hudson and Beane

Hour of Departure	Hour of Return	Altitude	Squadron	Date
8.36	10.20	2000-4000 M	22	Sept. 12

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:
Saw one plane come down in control at 9.50 and land West of Pont-a-Mousson in our trenches. Could not determine its Nationality. Nothing else to report.

John A. Sperry
1st Lt. A.S. U.S.A.

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines:

Mission: Patrol

Route Actually Followed: Menil-la-Tour—Seicheprey—Thiaucourt—Preny—Marieulles.

Names of Pilots on Patrol and Leaders: Lt. Brooks (leader) Lts. Tyndall, Doolin, Jones, Hassinger, Howard and Parrott in Liberty plane.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11.29	13.05	1000-3000 M	22	Sept. 12

Number of E.A. Seen: 8 Time: 12.20

Number of E.A. Encountered: Time:

Type: Fokkers and another biplace type. Altitude: 2500 M.

Region: Charey Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

2 Trains going from Metz at 12.15. 1 train going SouthWest from Arnaville at 12.20. 7 Boche Fokkers another bi-place type going toward Lauchaussee at 12.20. 800 meters away and strong wind prevented us from gaining their vicinity. Slight anti-aircraft in region in back of Pagny accurate. Fires observed in region of Arnaville (separate places) and Bois de Thiaucourt.

A. R. Brooks
2nd Lt. A.S. U.S.A.

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Very Hazy
Mission: Patrol
Route Actually Followed: Toul—Menil-la-Tour—Pont-a-Mousson—Region of Thiaucourt.
Names of Pilots on Patrol and Leaders: Lt. Sperry (leader), Lt. Beane, Lt. Kimber, Brooks, Hudson.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
17.55	18.15	1000 M	22	Sept. 12

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:
Left patrol because of a leak in the radiator, causing the engine to overheat.

John A. Sperry
1st Lt. A.S. U.S.A.

8 smoke fires seen between Lauchaussee and St. Mihiel at 6.00–6.20. No activity East of Moselle. 4 fires seen behind Thiaucourt—between Thiaucourt and Lauchaussee at 7.10. Saw no enemy machines.

A. R. Brooks
2nd Lt. A.S. U.S.A.

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Headquarters 2nd Pursuit Group
1st Pursuit Wing

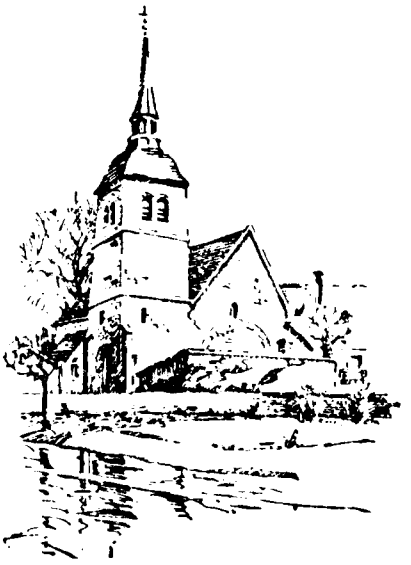
Report of Operations #76

From 19 h 00 Sept. 11th to 17 h 00 Sept. 12th

I. Patrols

1. Seicheprey, Port-sur-Seille
   5 h 30–7 h 06
   2500 meters
   6 planes 49th
   See pilot's report. No EA activity.
2. St Mihiel, Pont-a-Mousson
   5 h 45–9 h 01
   2500 meters
   6 planes 22nd
   See Capt. Bridgman's report. Capt. Bridgman had forced landing, 3 combats. See pilot's report. Lt. McCormick killed in accident.
3. Flirey, Nomeny
   6 h 35–8 h
   2500 meters
   2 planes 13th
   See pilot's report.
4. Port-sur-Seille, Seicheprey
   6 h 45–8 h 27
   2000 meters
   7 planes 139th
   Nothing to report.
5. Villers, St Bussant, Louvigny, Seicheprey
   7 h–8 h 45
   3500 meters
   5 planes 13th
   Nothing to report
6. Flirey, Pont-a-Mousson
   7 h 58–8 h 30
   1100 meters
   2 planes 139th
   Nothing to report

7. Seicheprey, Port-sur-Seille
   8 h 36–10 h 20
   4000 meters
   3 planes 22nd
   Saw plane, identity not known, land in control in our trenches at Pont-a-Mousson at 9.50
8. Beaumont, Montsec
   9 h–10 h 25
   1500 meters
   5 planes 49th
   Nothing to report
9. Flirey, Belme, Arnaville
   9 h 57–11 h 49
   1500 meters
   7 planes 139th
   Lt. Lindsey has not returned. Last seen near Pont-a-Mousson
10. Over field
    10 h–10 h 25
    5 planes 13th
    Nothing to report
11. Preny, Marcille, Menil-la-Tour, Seicheprey, Thiaucourt
    11 h 29–13 h 05
    3000 meters
    6 planes 22nd
    (1 D.H. 20th) 7 EA seen inside German lines.
12. Over field
    13 h 30–14 h
    5 planes 13th
    Nothing to report
13. Pont-a-Mousson, Nomeny, Flirey
    13 h 25–14 h 26
    1500 meters
    4 planes 139th
    (1 D.H. 20th) Nothing to report
14. Pont-a-Mousson, Thiaucourt, Montsec
    14 h 42–16 h 30
    600 meters
    6 planes 49th
    (1 D.H. 11th) No aerial activity. Many fires
15. Flirey, Nomeny
    14 h 50–16 h 05
    1200 meters
    2 planes 13th
    Nothing to report



16. Over field
    14 h 54–15 h 20
    3 planes 22nd
    Returned—Motor trouble.

II. Protection
    None

III. Alerts
    None

IV. Trials
    1. 6 h 30–6 h 45
       2 planes 13th
       Testing
    2. 7 h 35–7 h 48
       1 plane 139th
       Testing
    3. 8 h 15–8 h 16
       1 plane 49th
       Testing
    4. 16 h 5
       2 planes 22nd
       New planes arriving

V. Miscellaneous

1. Lt Vaughn R. McCormick 22nd Sqdn. crashed on this field at 7:30 and was instantly killed. He was returning from a patrol during the course of which he had been in combat with an enemy plane.

2. Capt. Bridgman, 22nd Sqdn, was forced to land just beyond former German lines near Remenauville due to his motor being hit by a bullet from the ground. Capt. Bridgman was not injured and made a good landing with the plane.

3. Lt. Lindsey, 139th Sqdn. crashed in the vicinity of Belleville at 11:30. Pilot slightly injured. Plane total wreck. Cause unknown.

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Headquarters 2nd Pursuit Group
1st Pursuit Wing

Report of Operations #76A

From 17 h 00 to 19 h 00 Sept. 12, 1918

Weather: Clearing. Visibility good.

I. Patrols

1. Port-sur-Seille, Toul
   17 h 30–18 h 20
   6 planes 13th
   Nothing to report
2. Menil la Tour, Pont-a-Mousson, Thiaucourt, Toul, Flirey, Preney
   17 h 46–19 h 30
   6 planes 22nd
   (1 D.H. 20th) See pilot's report
3. Toul, Thiaucourt, Lachaussee, Toul
   18 h 10–18 h 50
   2 planes 139th
   Combat. See pilot's report
4. Pont-a-Mousson, Solgne, Thiaucourt
   18 h 05–19 h 20
   5 planes 49th
   (1 D.H. 20th) Nothing to report.

II. Protection
None

III. Alerts
None

IV. Trials
None

Lt. David E. Putnam (left) had 13 victories to his credit when he was shot down on 12 September 1918. Capt. Dudley L. Hill (right) had served with Putnam in the 139th before he assumed command of the 5th Pursuit Group.

V. Miscellaneous

1. Lt. Putman, 139th Sqdn. is missing after being in combat with 8 enemy planes. He was last seen by Lieut. Robertson, who was with him on the patrol, diving away from the enemy planes. The report has been received of an Allied plane after a combat in the region of Mamey. It is believed that this is Lt. Putman's plane.

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28th Aero Pursuit Squadron
Third Pursuit Group
Operations Office
Sept 12th, 1918

Daily Operations Report

1. Special Mission:

1. 12:30 to 14:30. 20 planes. 28th Squadron. Routes: Vaucouleurs, Thiaucourt, Ancy, Ars, Ancy, Pont-a-Mousson, Thiaucourt, Arnaville, Vaucouleurs. Altitude 100 to 500 meters. Mission successful. Patrol leaders: Lts. Cassady, Merrick, Turnure, Pilots: Lts. Carney, Jebb, Greenhalgh, Hardendorf, Stenseth, Hardy, Bell, Cline, Grimmer, Philbrick, Woods, Jacques, Allein, Smith, Liles, Buchanan, Moriarty. See reconnaissance report. Flying time 40:00.

Summary

Sorties	20
#No. Pilots available	21
Pilots missing	1
Total planes	25
Available planes	15
Planes not returned	3
Total flying hours	40:00
Total service hours	40:00
Special missions	1
Bombs dropped	28 (280 kilos)
#No. Pilots assigned	24

#Number not including Commanding Officer.

By order of Lt. Jones

A.B. Bill, 2nd Lt. A.S., U.S.A.
Operations Officer

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28th Aero Squadron[a]

Reconnaissance Report

Visibility Near Lines: Fair

Mission: To bomb and machine gun enemy troops and camions. (Thiaucourt, Arnaville, Vaucouleurs)

Route Actually Followed: Vaucouleurs, Thiaucourt, Arnaville, Ancy, Ars, Ancy, Pont-a-Mousson.

Names of Pilots on Patrol and Leaders: Patrol leaders: Lts. Turnure,

Cassady and Merrick. Pilots: Lts. Carney, Greenhalgh, Philbrick, Hardendorf, Liles, Stenseth, Jacques, Grimmer, Hardy, Allein, Buchanan, Moriarty, Smith, Bell, Jebb, Woods, Cline.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:30	14:30	100–500 mts.	28th	9/12/18[b]

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Patrol dropped 28 bombs on railroad yards at Arnaville. The towns of Arnaville, and Ancy. Patrol machine gunned camions on road between Arnaville and Waville moving towards the lines. Also machine gunned camions on road north of Thiaucourt, and on road between Arnaville and Marieulles.

Patrol bombed railroad in Corny and machine gunned trenches near Corny.

Lt. Hardendorf saw Spad on ground between Gironville and Troussey. Machine seemed unhurt.

Lt. Wood missing.

Lt. Liles landed en panne near Vaucouleurs.

Lt. Philbrick landed en panne at Rouy.

Lt. Jacques, Moriarty, Smith returned with motor trouble.

Lt. Allein broke propeller in taking off.

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28th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Fair

Mission: Bombing and machine gunning enemy troops and transports (Vaucouleurs)

Route Actually Followed: Vaucouleurs, St. Mihiel, Spada, Vigneulle, Chambley

Names of Pilots on Patrol and Leaders: Lt. Merrick. Pilots: Lts. Cassady, Hardendorf, Allein, Cline, Greenhalgh, Hardy, Grimmer, Jebb, Buchanan.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
17-40	19-15	800 meters	28th	9/12/18

Number of E.A. Seen: 1 Time: 18-30

Number of E.A. Encountered: Time:

Type: Rumpler. Bi-place. Altitude: 700 meters

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lt. Merrick became separated from patrol and at 18-30 saw one Rumpler bi-place. He could not attack as both guns jammed. Lts. Cassady, Hardendorf, Allein and Merrick dropped 8 bombs and fired 800 rounds on troops and transports on road north of Vigneulles. One bomb fell in the road and caused noticeable damage. Machine gun fire brought down a number of Boches and caused great confusion among enemy troops.

Fires were seen in Waville, Heudicourt and Thiaucourt. The town of Vigneulles was also burning.

Lts. Cline, Greenhalgh, Hardy, Jebb and Grimmer returned with motor trouble.

Clouds at 900 meters.

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93rd Aero Pursuit Squadron
Third Pursuit Group
Operations Office
September 12th, 1918

Daily Operations Report

I. Special Missions.

1. 9:50-10:50. 3 planes, 93rd Squadron. Route: Vaucouleurs—

Rembercourt—Euvezin—Charey—Dampvitoux—Vaucouleurs. Altitude: 500 meters. See Reconnaissance Report. Lieuts. Rummell, Cox, and D'Olive. Lt. Cox and D'Olive saw bi-plane near Euvezin, fired 30 rounds, confirmation requested. Lt. Rummell has not returned.

2. 12:20–13:30. 14 planes, 93rd Squadron. Route: Vaucouleurs—Rembercourt—Euvezin—Vaucouleurs. Altitude: 400 meters. See Reconnaissance report. Lieut. Wright, Patterson, Barry, Kelly, Ball, Nash, Case, Harding, Fuller, Carruthers, Evans, Cox, Hartman, and Merz. Lt. Hartman has not returned. Lt. Evans forced to land at Nancy. Lt. Fuller forced to land 80 kilometers southeast of Toul, at Glonville, Pilot unhurt.

II. Trial Flights.

1. 9:00–9:10 1 plane, Lt. Fuller, testing.
2. 12:05–12:20 1 plane, Lt. Long, testing.
3. 13:25–14:20 1 plane, Lt. Long, testing.
4. 15:25–15:40 1 plane, Lt. D'Olive, arrived from forced landing Toul.
5. 15:00–15:10 1 plane, Lt. Wright arrived from forced landing Toul.

III. Summary

Sorties	22	Available planes	15
Trials	5	Planes not returned	4
Combats	1	Total flying hours	15:30
*Pilots available	17	Total service hours	13:45
Enemy planes (unconfirmed)	1	Special Missions	2
Total planes	25	Pilots not returned	1

*Not including Commanding Officer.

By order of Major Huffer

Earl W. Martin
2nd Lt. A.S., U.S.A.
Operations Officer

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93rd Aero Squadron

Reconnaissance Report

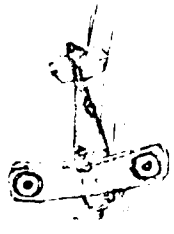
Visibility Near Lines: Poor

Mission: Special Mission

Route Actually Followed: Vaucouleurs—Rembercourt—Euvezin—Charey—Dampvitoux—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Rummell, Cox, and D'Olive.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
9:50	10:50	500 M	93rd	Sept. 12th-18.



Number of E.A. Seen: 1 — Time: 10:20

Number of E.A. Encountered: 1 — Time: 10:20

Type: Probably Fokker Monoplace — Altitude: 500 Meters

Region: Between Jaulny and Vieville-en-Haye — Combats: One

Number of Rounds Fired: 10 Lt. Cox 30 Lt. D'Olive — Confirmations Requested: One

	E.A.:	Allied:
Planes Seen to Have Gone Down in Flames.		
Planes Seen to Have Crashed on Ground.	E.A.: 1	Allied:
Planes Seen to Have Gone Down Out of Control.	E.A.:	Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation: Lieut. D'Olive

Detailed Report of Pilots and Other Observations:

Lieut. D'Olive states that at about 10:20 Sept. 12th, 1918, between Jaulny and Vieville-en-Haye (which is slightly east of Thiaucourt) and at about 500 meters. He in company with Lieut. Cox saw E.A. possibly a Fokker monoplace. Thinking that Lieut. Cox had not seen the Hun he dived and began shooting at about 350 or 400 meters. He saw tracers litter the cock-pit. He had only fired 25 or 30 rounds when he turned into a cloud. He turned away to come home and just glanced back towards the cloud and under it saw the machine going down in a steep spin or spiral at about 250 or 300 meters. One magneto quit then and he lost sight of the "Hun".

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Poor

Mission: Special Mission

Route Actually Followed: Vaucouleurs—Rembercourt—Euvezin—Charey—Dampvitoux—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Rummell, Cox and D'Olive.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
9:50	10:50	500 M	93rd	Sept. 12th-18.

Number of E.A. Seen: One Time: 10:30

Number of E.A. Encountered: One Time: 10:30

Type: Probably Fokker Monoplane Altitude: 500 Meters

Region: Vicinity of Thiaucourt Combats: One

Number of Rounds Fired: 50 Confirmations Requested: One

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: 1 Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation: Lieut. Rummell.

Detailed Report of Pilots and Other Observations:

Leaving the 3rd Pursuit Group aerodrome, flew north crossing lines near Flirey about 10:00 Sept. 12th, 1918. Climbed along a very low thin layer of clouds. Saw one E.A. and was forced to climb higher for fear of attack. At a point thought to be over Rembercourt they started through clouds but Lieut. Cox and D'Olive did not follow the leader on account of the clouds. When Lieut. Rummell came out of the clouds he was directly east of Lachaussee (west of Dampvitoux). He observed a long train on the railroad running northwest through Rembercourt. E.A. showed no signs of activity. Heavy barges were noted on the river to the east. Near Rembercourt saw plane about level, both started to climb. After circling around a cloud Lieut. Rummell found that he was above the enemy plane and dived on him from the side and rear. He fired fifty rounds from 75 yards at point blank range and saw tracers entering the fuselage at pilots seat. At that moment Lieut. Rummell dove towards cloud, looked back but

failed to see E.A. Flying by compass and not allowing for the drift to the east Lieut. Rummell finally crossed the lines near St. Die in the Vosges Mountains. His gas was about out and fearing to leave the only clear spot in sight he attempted to land on the side of a hill. The field was deeply gullied and he was unable to keep the ship from turning over; wings and propellor and landing were broken. Requested confirmation on plane (E.A.) which went down in the vicinity of Rembercourt. E.A. plane was probably a FOKKER, had peculiar yellow markings on the fuselage and yellow around the black cross on tail.

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93rd Aero Squadon

Reconnaissance Report

Visibility Near Lines: Poor

Mission: Bomb and attack with machine guns all troops on road between Eauville [?] and Chambley

Route Actually Followed: Vaucouleurs—Rembercourt—Euvezin—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Wright, Patterson, Barry, Kelly, Ball, Nash, Case, Harding, Fuller, Carruthers, Evans, Cox, Hartman, and Merz.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:20	13:30	400 M	93rd	Sept. 12th-18

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: 500 Confirmations Requested:

Planes Seen to Have Gone Down in Flames: E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Out of Control: E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lieuts. Patterson, Barry, Kelly, Ball, Case, and Cox, returned with motor trouble. Lieuts. Carruthers and Merz saw only a few trucks

standing on the road between Chambley and Eauville. No concentration of troops was observed as weather was very bad. Lieut. Nash was separated from the formation and joined another formation of the Second Pursuit Group and observed no troops. Lieuts. Wright, Harding, Fuller, Evans, Hartman, have not returned.

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Operations Office
103rd Aero Pursuit Squadron, S.C.
Third Pursuit Group
1st Pursuit Wing, 1st Army
September 12th, 1918

Daily Operations Report

I. Special Missions.
1. 9.40-10.55—3 planes, 103rd. Squadron, Route Vaucouleurs—St. Mihiel—Vigneulles—Haumont—Thiaucourt—Down Rupt de Mad—Domevre—Toul—Vaucouleurs. Altitude, 400 Meters. See Reconnaissance report. Lieutenants Hunter, Furlow, and Jones.
2. 14.45-16.05—14 planes, 103rd. Squadron, Route, Vaucouleurs—Xivrey—Pannes—Beney—Thiaucourt—Regnieville—Pannes—Beney—Dampvitoux—Chambley—Flirey—Vaucouleurs. Altitude 400 Meters. See reconnaissance report. Captain Rockwell, Lieutenants Larner, Tobin, Furlow, Monroe, Wardwell, Pyne, Ponder, Palmer, Cannon, Irving, Manchester, Faith, and Jones.

II. Trial Flights.
1. 12.50—1 plane arrived from forced landing at Toul. Lieut. Jones.
2. 15.20—1 plane arrived from forced landing at Ourches. Lieut. Rolph.

III. Summary

Sorties	19.
Trial	2.
Combats	1.
Pilots available	18.
Pilots missing	4.
Total planes	25.
Available planes	12.
Planes not returned	4.
Total Flying Hours	18.25

Total Service Hours 17.55
Special Missions . . . 2.
*Pilots assigned to Squadron 22.
Bombs dropped—
2 dropped by Lieut. Jones on Haumont.
2 dropped by Lieut. Jones on truck train Dampvitoux.
2 dropped by Lieut. Larner on Beney.
*Not including the Commanding Officer.

By order of Captin Rockwell.

H. V. Bell
1st Lieut. A.S. U.S.A.
Operations Officer

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103rd Aero Squadron

Reconnaissance Report

Visibility Near Lines:
Mission: Special Mission
Route Actually Followed: Vaucouleurs, Flirey, Essey, Pannes, Beney, Thiaucourt. Rupt de Mad to Euvezin. Richecourt. Vaucouleurs.
Names of Pilots on Patrol and Leaders: Lieutenants Hunter, Furlow, Jones.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
9:40	10:55	400 M	103rd Sqn.	Sept. 12, 1918

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lieut. Furlow reports having crossed the lines at Flirey and flew to Northeast of Thiaucourt. Then came down to 400 meters and circled over Thiaucourt and Beney There was considerable activity of troops in region of Beney and Thiaucourt. There was no movement on road from Fresnes—Regnieville or Beney—Essey or minor roads in the region. There were 3 camions on Fresnes road, region the Bois de Haudronvilles. Noticed enemy artillery flashes in Bois de Thiaucourt on eastern edge. Flew down over Rupt de Mad to Euvezin. I was shot at by several machine guns in region of Beney and Bouillonville. Our artillery was also heavily shelling the Bois de Thiaucourt and the open ground around Beney and south of Beney. Recrossed the lines at Richecourt.

Lieut. Hunter reports having encountered enemy biplace observation plane over Xivray at 10:05. Chased same back into enemy lines firing about . . .[?] rounds, no apparent result. At 10:15 saw considerable truck movement on road from Bois de Haudronvilles to Beney moving in direction of lines. Descended to 200 meters and used machine guns on this train. Also circled Beney, twice using machine guns on town, which was well filled with troops. Also considerable truck movement coming from the lines on road from Beney to Pannes, also machine gunned these. There is a Spad on ground at about St. Baussant right side up.

Lieut. Jones reports having seen 1 boche biplace at 10:15, over Haumont, altitude 800 meters. The boche went into a cloud and just then on of my magnetoes went dead so I dove below the clouds and dropped my two bombs on Haumont. Saw bombs explode on the edge of town. The town was full of troops and trucks. Did not see anything on roads. Had forced landing at Toul at 10:55.

Description of biplace. Orange wooden fuselage probably Albatros.

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103rd Aero Squadron

Reconnaissance Report

Visibility Near Lines:

Mission: Special Mission.

Route Actually Followed: Vaucouleurs—Xivray—Pannes—Beney—Regnieville—Pannes—Beney—Dampvitoux—Chambley—Flirey—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Captain Rockwell, Lieutenants Larner, Tobin, Furlow, Monroe, Wardwell, Pyne, Ponder, Palmer, Cannon, Irving, Manchester, Faith & Jones.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
14.45	16.05	400 M.	103rd	Sept. 12th

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames: E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control: E.A.: Allied:

Markings on E.A.:

In the opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Between Pannes and Beney, long lines of boche artillery going toward Beney. Lieut. Larner reports the following: I shot them up with my machine guns. I dropped two bombs on Beney demolishing two houses. The roads going north from Pannes and Thiaucourt were crowded with vehicles going to the north. American cavalry was just outside of Pannes and Thiaucourt. Vigneulles is in flames, as well as the railroad yards of Thiaucourt. Small villages to the north are all burning.

Lieut. Jones reports: Shot up road from Dampvitoux to Chambley. Dropped two bombs at Dampvitoux on a truck train on the road, destroying at least 4 trucks and one house. Shot up various towns from Chambley to Dampvitoux. Road from St. Baussant to Chambley full of trucks and troops traveling northeast. All the towns between Chambley and Arnaville have many troops in them. The flying field at Haumont has been deserted, the hangars being burned. The road from Beney to St. Benoit full of trucks and troops going north.

Lieut. Tobin reports: Shot up road from Chambley to Dampvitoux. Road was crowded with camions and troops. Also the road running north from Haumont to Lachaussee. The other pilots participating in shooting up the road between Chambley and Dampvitoux, and the road between Beney and Pannes.

Lieut. Wardwell reports the following: Shot up road Pannes—Beney, which was full of trucks and troops. Observed burst of Lieut. Larner's bomb in Beney. Noticed fires in many of the smaller towns and a large one at Thiaucourt, evidently was a railroad warehouse. South of Jaulny received bullet in motor fired from the ground and was forced to land at Toul.

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103rd Aero Squadron

Reconnaissance Report

Visibility Near Lines:

Mission: Special Mission.

Route Actually Followed: Vaucouleurs—Vigneulles—Chambley—Beney—Vigneulles.

Names of Pilots on Patrol and Leaders: Lieutenants Jones, Faith, Ponder, Irving, Kirtland and Pyne.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
17:55	19.30	800 M.	103rd	Sept. 12th, 1918

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots Are Entitled to Share in Confirmation.

Detailed Report of Pilots and Other Observations:

Mission of shooting up road between Vigneulles and Chambley, fulfilled. Lieut. Ponder reports as follows: All back country from St. Mihiel is deserted, trenches are empty. The streets of St. Mihiel are deserted, and the civilian population is fleeing north of Vigneulles. The smaller towns are on fire.

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Operations Office
103rd Aero Pursuit Squadron, S.C.
Third Pursuit Group
1st Pursuit Wing, 1st Army
September 12, 1918

Daily Operations Report 17.00 to 19.00 H.

I. Trial Flights.

1. 18.00—1 plane arrived from forced landing at Ourches, Lieut. Monroe.
2. 18.35—1 plane arrived from forced landing at Bicqueley, Lieut. Cannon.

II. Summary

Sorties	2.
Trials	2.
Pilots available	21.
Total planes	25.
Available planes	10.
Planes not returned	2.
Total Flying Hours	30.
Total Service Hours	none.
*Pilots assigned to Squadron	22.

*Not including the Commanding Officer.

By order of Captain Rockwell.

H.V. Bell
1st. Lieut. A.S. U.S.A.
Operations Officer

Deserted houses at St. Mihiel.

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Third Pursuit Group
Operations Office
213th Aero Pursuit Squadron
September 12th, 1918

Daily Operations Report

I. Special Mission
1. 12:20—14:15. 17 Planes. 213th Aero Squadron. Route: Vaucouleurs, Rembercourt, Waville, Vaucouleurs, Altitude 150M. 5 planes have not returned, one of which crashed south of Pont-a-Mousson, Pilot unhurt. See Reconnaissance report.

II. Summary

Sorties	17
*Pilots available	17
Pilots missing	4
Total planes	24
Available planes	11
Planes crashed	1
Planes not returned	4
Total flying hours	21.30
Total service hours	21.30
Special Missions	1
*Pilots assigned	22

*Not including Commanding Officer.

By order of Lt. Hambleton

E. Norman Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
213th Aero Squadron
September 12th, 1918

Daily Operations Reports

I. Special Mission
1. 16:35-18:10. 9 planes. 213th Aero Squadron. Route: Vaucouleurs, Commercy, Vigneulles, Dampvitoux, Vigneulles, Vaucouleurs. 150M. See Reconnaissance Report. Lts.

Hambleton, Weirick, Fish, Munn, Aiken, Gaillard, Richardson, Treadwell.

II. Summary

Sorties	9
*Pilots available	21
Total planes	24
Available planes	
Total flying hours	4:05
Total service hours	4:05
Special Missions	1
*Pilots assigned	22

*Not including Commanding Officer.

By order of Lt. Hambleton

E. Norman Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

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213th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: Special Mission

Route Actually Followed: Vaucouleurs, Waville, Rembercourt, Vaucouleurs

Names of Pilots on Patrol and Leaders: Lts. Phelan, Richardson, Ford, Loomis, Grey, McGehee, Matheson, Fish, Weirick, Mell, Lee, McClure, Munn.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:20	14:15		213th	Sept. 12, 1918

Number of E.A. Seen:	Time:		
Number of E.A. Encountered:	Time:		
Type:	Altitude:		
Region:	Combats:		
Number of Rounds Fired:	Confirmations Requested:		
Planes Seen to Have Gone Down in Flames.		E.A.:	Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lt. Gaillard saw large number of troops on road between Waville and Thiaucourt moving in the direction of Thiaucourt. Fired about 150 rounds into them causing confusion. Lt. Weirick attacked railroad station at Arnaville firing about 150 rounds. Lt. Grey reports shooting up road from Rembercourt to Waville. Reports seeing a German wagon train packing up in a field northeast of Thiaucourt. Train not moving as yet but all wagons pointing north. Fired into same causing confusion. Also saw U.S. Troops advancing in perfect formation north of Euvezin.

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213th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Poor
Mission: Special Mission
Route Actually Followed: Vaucouleurs, Commercy, Vigneulles, Dampvitoux, Vaucouleurs.
Names of Pilots on Patrol and Leaders: Lts. Hambleton, Munn, Aiken, Fish, Gaillard, Treadwell, Weirick.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:35	18:10	150 M	213th	Sept. 12, 1918

Number of E.A. Seen Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Marking on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lt. Hambleton reports seeing wagons and limbers scattered along the roads. On the road from Vigneulles to Dampvitoux the movement of troops is both ways, but the main movement of troops is on the roads through woods on either side of the main road, and this movement is entirely northward. Fired into one enemy convoy dispersing horses and men. Saw burning dumps at Vigneulles and in the vicinity. The rest of the patrol either through bad weather or motor trouble were unable to act within the enemy's lines.

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 12th, 1918

Operations Report Number 38

1. 9:40-10:55. 3 planes, 103rd Squadron. Route: St. Mihiel, Vigneulles, Haumont, Thiaucourt, down Rupt de Mad, Domevre, Toul, Altitude 400 meters. See Reconnaissance report.
2. 9:50-10:50. 3 planes. 93rd Squadron. Route: Rembercourt, Charney, Dampvitoux, Rembercourt. Altitude 400 meters. See Reconnaissance report.
3. 12:30-14:30. 20 planes. 28th Squadron. Route: Thiaucourt, Ancy, Ars, Ancy, Pont-a-Mousson, Thiaucourt, Arnaville. Altitude 100 to 500 meters. See Reconnaissance report.
4. 12:20-14:15. 17 planes. 213th Squadron. Route Rembercourt, Waville, Rembercourt, Altitude 150 meters. See Reconnaissance report.
5. 12:20-13:20. 14 planes. 93rd Squadron. Route: Rembercourt, Euvezin. Altitude 400 meters. See Reconnaissance report.
6. 14:45-16:06. 14 planes. 103rd Squadron. Route: Xivray, Pannes, Beney, Thiaucourt, Regnieville, Pannes, Beney, Dampvitoux, Chambley, Flirey. Altitude 400 meters. See Reconnaissance report.

W. Thaw
Major A.S., U.S.A.
Commanding

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 12th, 1918

Operations Report Number 38A (17:00–19:00)

Special Missions

1. 16:30–17:50. 9 planes. 93rd Squadron. Route: Toul, Flirey, Vigneulles, Chambley, St. Mihiel, Altitude 1000 meters. See Reconnaissance report.
2. 16:35–18:10. 9 planes. 213th Squadron. Route: Commercy, Vigneulles, Dampvitoux, Vigneulles, Altitude 150 meters. See Reconnaissance report.

W. Thaw
Major A.S., U.S.A.
Commanding

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 12th, 1918

Form Number I Pursuit

	28th	93rd	103rd	213th	Hdq.	Total
Sorties	20	22	19	26		87
Trials		5	2			7
Combats		1	1			2
Pilots Available	21	17	18	17		73
Pilots Killed						
Pilots Missing		1				1
Pilots Wounded						
Enemy planes confirmed						
Enemy planes unconfirmed		2				2
Total Planes	25	25	25	24	1	100
Available planes	15	15	12	11	1	54
Planes crashed				1		1
Planes lost in enemy lines						

Planes not returned					
Total Flying hours	40:00	21:05	23:25	47:10	131:40
Total Service hours	40:00	19:20	22:25	47:10	128:55
Exercises					
Target Practice					
Alerts					
Patrols	1	2	2	2	7
Protection Patrols					
Special Missions					
Bombing raids.					
Bombs dropped: (Kilos)	280		60		340

W. Thaw
Major, A.S., U.S.A.
Commanding

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20th Bombardment Squadron

Statement by 1st Lieutenant George M. Crawford

On September 12, 1918 I was a member of the 20th Aero Squadron on Detached Service with General Headquarters. I was flying a DeHaviland 4 with a Liberty motor and operating from the Maulan Airdrome.

At eleven o'clock on the above date, I was ordered to perform a reconnaissance in the vicinity of Dampvitoux, Southeast of Lake Lachaussee. On this day the clouds were low and thick, the weather inclement, with a very strong Southeast wind. I crossed the lines at Verdun, flying as high as the clouds would permit.

On completion of reconnaissance, my motor gradually heated up and slowed down so that I could make no headway against the wind. The gasoline line from the tank to the motor was also leaking badly. The motor finally cut out and I landed east of Pont-a-Mousson, seven kilometers from the lines. I nosed over and crashed on landing.

I landed beside a German camp and was almost immediately surrounded. No demonstration was made by the German soldiers. They allowed me to do what I could for my observer, Second Lieutenant M. O'Toole who had been shot through the leg with a machine gun bullet and thrown clear of the machine in the crash. I was uninjured except for minor cuts and bruises.

I was separated from my Observer, my flying clothes were taken away and I was confined in an old church. Lieutenant O'Toole was

taken to a hospital. I was in the church two hours when a German flying officer came in and invited me to his squadron to dinner. He had examined my plane and told me that the motor was badly shot up by ground fire. I went to the squadron under guard and there was examined by a German intelligence officer. I refused to answer all questions. I slept at this squadron that night and left the next morning (13th) for Strassburg.

I arrived there at ten o'clock that night, riding in third class carriages. A slight hostile demonstration of the populace there was instantly quelled by the guards. I was taken to an old fortress and placed in a cell with a R. A. F. pilot. We were allowed to exercise in the courtyard during the day. The food consisted of weak soup, cabbage and black bread, which was typical of all the following camps.

On or about the twenty-seventh of September, I was taken to Karlsruhe and confined in the Europasiche Hotel, in a room with seven R. A. F. pilots and one American. We discovered dictaphones hidden in the room. I was examined by an intelligence officer. He inquired the number of my squadron, telling me that he had no connection with the intelligence department but merely wanted to know so that he could put me with friends in a permanent camp. I refused to answer. My Sam Browne belt was taken from me there.

On or about the sixth of October, I was taken to Landshut in Bavaria (fourth class carriages) in company with thirteen other American flying officers. Here we were given a thorough physical examination and asked if we had any complaints. I had none, except the shortness of food. Here we were vaccinated once and inoculated five times.

On or about the sixteenth of October, I was taken to Villingen in Baden which was a permanent camp. Here we received some Red Cross food, clean Red Cross underwear, etc. After the Armistice, we formally protested against being detained and on the twenty-third of November we were allowed to walk about the city from the hours of 9-12 A.M. and 2-6 P.M. Many troops were passing through the town but no efforts were made to molest any of the prisoners.

On the twenty-seventh of November all the Americans imprisoned at Villingen were taken to Constance in first class carriages. Here we lived in a hospital and the food was much better than any hitherto.

On the thirtieth of November we were taken across Switzerland (first class carriages) via Zurich, Berne, Lausanne and Geneva and rejoined the American forces at Bellegarde.

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96th Aero Squadron

Raid Report

Visibility: Very poor

Objective: To bomb P. C. Buxerulles

Route Actually Followed: St. Mihiel, Buxerulles, Dampvitoux, Thiaucourt, Fey-en-Haye, Amanty.

Number of Teams Participating: 9 planes left and 8 reached the objective.

Names of Leaders: 1st Lts. D. H. Young and S. M. Lunt

Hour of Departure	Hour of Return	Altitude	Squadron	Date
13.30	15.30	800 M	96th	9/12/18

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: 4860 Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 248 Type: 115 m/m, 16 incendiary—Total weight 2588

Bursts were Observed at: South of Buxerulles

Remarks on Enemy-Aircraft Artillery: Inactive and inaccurate

Remarks on Enemy Airplanes: Chambley & Dampvitoux filled with trucks and troops going toward Chambley at 14.20

Other Observations:

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96th Aero Squadron

Raid Report

Visibility: Very poor and rainy

Objective: Vigneulles
Route Actually Followed: Bar-le-Duc, Dommartin, Vigneulles, Loupmont, Commercy.
Number of Teams Participating: 5
Names of Leaders: Capt. J. A. Summersett—2nd Lt. A. N. Hexter

Hour of Departure	Hour of Return	Altitude	Squadron	Date
18.30	20.30	800 M	96th	9/12/18

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Out of Control. E.A.: Allied:
Markings on E.A.:
In the Opinion of Those Who Took Part in the Combat, What Pilots

Number of Bombs Dropped: 110-90 m/m,
20-115 m/m short
Bursts were Observed at: No [On] road between Vigneulles and Hattonchatel
Remarks on Enemy-Aircraft Artillery: Slight
Remarks on Enemy Airplanes: None seen
Other Observations: Vigneulles burning. Total darkness. No observations.

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Day Bombardment Group
September 12th, 1918

Summary of Operations

First mission and special mission of one plane left airdrome at 10:45 A.M. to bomb Buxieres. 1st Lt. A. Gundelach pilot, and 2nd Lt. P.H. Way, observer, were found near Euville. Lt. Way was dead and Lt. Gundelach died in a few hours.

Second Mission, the following left airdrome at 1:30 P.M. to bomb troops and town of Buxerulles:

1st Lt. Andre H. Gundelach.

Pilots:	Plane:	Observers:
Flight leader, Lt. Young, D.H.	18	Lt. Lunt
Lt. Farnsworth	13	Lt. Thompson, R.E.
Lt. Beverly	15	Lt. Newberry
Lt. Codman	19	Lt. Evans
Lt. Bates	6	Lt. Pressler
Lt. Young, C.P.	20	Lt. Smith
Lt. Hopper	5	Lt. Kelley
Lt. Elliott	10	Lt. Ellis
Lt. Forshay	8	Lt. O'Donnell

9 planes reached and bombed Buxerulles dropping a line of bombs thru the town and on the road south of the town. They were unable to observe damages and results on account of weather conditions. One plane forced landing at Vaucouleurs on return to airdrome.

248–9 kilo and 16–20 kilo (2552 kilos) were dropped.

Itinerary was, St. Mihiel, Buxerulles, Dampvitoux, Thiaucourt, Fey-en-Haye and Amanty.

Anti-aircraft inactive and inaccurate. No enemy balloons were observed. Visibility was very poor.

One plane was seen in No Man's Land near Fey-en-Haye at 3:30 P.M. Thiaucourt and Xammes was seen burning at 2:50 P.M.

Third Mission, the following were ordered to leave on raid at 18:35 o'clock to bomb troops and town of Vigneulles:

Pilots:	Planes:	Observers:
Flight leader, Capt. Summerset	2	Lt. Hexter
Lt. Gaylord	14	Lt. Rath
Lt. Turnbull	17	Lt. Cawston
Lt. Taylor	12	Lt. Strawn
Lt. Hopkins	7	Lt. Williams
Lt. Cronin	16	Lt. Bleecker
Lt. Lakin	11	Lt. Douglas

Planes #12 and #14 did not leave airdrome; other 5 planes reached and bombed Vigneulles. 4 planes returned to airdrome. Plane #16 forced landing at Gondrecourt, pilot 1st Lt. Edward Cronin was killed, observer unhurt.

110–9 kilo and 20–8 kilo (1150 kilos) were dropped. Bursts hit northern part of Vigneulles and road to Hattonchatel. Nothing observed on account of darkness.

Itinerary was, Bar-le-Duc, Dommartin, Vigneulles and Amanty.

Enemy aircraft and anticraft were inactive and inaccurate. Vigneulles was seen burning at 19:40 o'clock.

Lts. Nelson, Patterson and Lts. Crawford, O'Toole are yet reported missing.

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Headquarters, First Pursuit Wing
Air Service, American E.F.
September 12th, 1918

Operations Report No 12

From: 19 h 00 Sept 11th to 17 h 00 Sept 12th.

1. Atmospheric conditions: Intermittent rain and high winds all day.

2. Enemy Air Service: Some activity was exhibited attacking our Army Corps Observation and Infantry Liaison Planes.

3. Activity of Our Pursuit Aviation: 4 patrols, 2 high and 2 low were maintained at all times over the sector of the wing. In addition 6 special missions were carried out by the Third Pursuit Group, reconnoitering and attacking with bombs and machine guns, concentrations of enemy troops retreating on the Vigneulles—Chambley road and the Thiaucourt—Waville—Arnaville road. Numerous direct hits were observed; at least 4 motors were destroyed by bombs and the retreat of the enemy was greatly harrassed. Lieutenant Cox, 3rd Pursuit Group and Captain Bridgman, 2nd Pursuit Group have each requested confirmation of an enemy plane destroyed.
Lieutenant McCormick of the 2nd Pursuit Group was killed upon returning to the Toul Airdrome after a combat.

4. Activity of Our Bombing Aviation: The enemy P. C. at Buxieres and the road Buxieres—Vigneulles were bombarded with about 6 tons of high explosives and incendiary projectiles being dropped. One of our planes has not returned: Pilot Lieut. Gundelach, Observer, Lieutenant Lunt.

The Liberty airplanes of the 11th and 20th Aero Squadrons cooperated with the Pursuit barrage patrols throughout the day.

Summary

	96th	2nd Pursuit Group	3rd Pursuit Group	G.C. 16	Pursuit Total
Sorties	10	80	78	18	166
Trials	0	4	7	0	11
Combats	0	3	2	0	5
Pilots on rolls	21	85	90	69	244
Pilots Avail.	19	81	73	69	233
Observers on rolls	24	—	—	—	—
Observers Avail.	22	—	—	—	—
Pilots killed	0	1	0	0	1
Pilots missing	1	0	2	0	2

Observers missing	1	—	—	—	—
Confirmations requested	0	1	1	0	2
Total Planes	20	99	100	77	276
Avail Planes	12	60	54	55	169
Planes Crashed	0	2	0	0	2
Planes not returned ...	0	0	5	2	7
Total Flying hours	15:20	106:41	83:45	27:40	218:06
Total Service Hours...	15:20	105:57	81:30	27:40	215:07
Patrols	0	16	21	5	42
Special Missions.....	0	0	6	0	6
Bombing raids	2	0	0	0	0

Bombs dropped—34-10 kilo bombs by Pursuit.
268-20 kilo bombs by the 96th Aero Squadron.

Note: The 11th and 20th Aero Squadrons which are working for and in conjunction with the Pursuit are not included in the above Summary.

By order of Lieut. Colonel Atkinson.

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

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Headquarters Ninth Aero Service Squadron

Operations Report for September 12th, 1918

Atmospheric Conditions.
Night—Rain and high winds.
Day—Rain and high winds.

1. Reconnaissance. Nil.
2. Miscellaneous.
   Planes 1 D.H. Liberty awaiting night equipment.
   2 Breguets awaiting night equipment.
   1 Breguet in reserve.
   5 Breguets awaiting minor repairs.
3. Observation. Reported by B.I.O.
4. Summary.
   Night sorties—Nil
   Day sorties—Nil
   Service Hours—Nil.

Total Hours—Nil.
20 planes on hand (19 Breguets, 1 D.H. Liberty), 11 available for duty.
10 pilots for duty.
7 Observers for duty.

Harold W. Merrill
1st Lt. 103/F.A.
Operations Officer

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Headquarters--24th Aero Squadron
First Army Observation Group

Operations Report for September 12th, 1918

Atmospheric conditions; Low clouds throughout day, with showers.

1. Reconnaissance. Cheminot—Metz—Chambley—Pagny—Cheminot. 5:45-7:45. Altitude 300 to 1500 meters. Visibility poor. Observer, Lt. Cousins. Pilot, Lt. Hill.
2. Photographic. Nil.
3. Miscellaneous. 8 planes (Salmson 2A2) being equipped and overhauled.
4. Summary.
   1 sortie.
   1 visual reconnaissance.
   Service time—2:00.
   Total hours—2:00.
   22 planes (Salmson 2A2) On hand—14 planes available.
   13 observers—13 available. 18 pilots—18 available.

John W. Cousins
1st Lieut. Inf
Operations Officer

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Headquarters 91st Aero Squadron

Operations Report for Sept. mber 12, 1918

Atmospheric conditions: Low clouds thruout the day accompanied by showers.

1. Reconnaissance.
   a. Cheminot—Metz—Chambley—Pagny—Cheminot. 5:45-7:45. Alt. 300 to 2500 m. Vis. Poor. Obs. Lt Cousins, Pilot Lt Hill (24th Sqdn).
   b. N of St. Mihiel to S.E. of Apremont. 9:30-10:55. Alt. 800 to 2500 m. Vis. poor. Obs. Lt Schricker, Pilot Lt Powell. See Sec. 5 "Observations".

c. Pont-a-Mousson—Arnaville. 9:30–10:55. Vis. Poor. Alt. 4000m. Obs. Lt Mangan, Pilot Lt Lambert. See Sec. 5 "Observations".

d. Apremont—St. Mihiel—Etain—Briey. 12:40–14:10. Vis. Poor. Alt. 1400 to 1800 m. Obs. Lt Snyder, Pilot Maj Reynolds. See Sec. 5 "Observations".

2. Photographic. Nil.
3. Adjustment of Artillery Fire. Nil.
4. Miscellaneous.
   1 reserve ship (Salmson 2A2) wing being repaired.
   Salmson 2A2 motor being overhauled.
5. Observations. Reported by B.I.O.
6. Summary.
   9 sorties.
   4 visual reconnaissance.
   3 att. visual reconnaissance.
   1 test flight.
   1 special mission: dropping message on dropping ground at First Army Headquarters.
   Service time: 7 Hrs. 20 min.
   Total time: 12 Hrs. 45 min.
   24 planes (Salmson 2A2) on hand: 22 available for duty.
   16 pilots: 16 available for duty.
   14 Observers: 14 available for duty.

John H. Snyder

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1st Aero Squadron
September 12, 1918

Summary of Operations

Reconnaissance.

Limey, Regnieville, 6:20–7:10. Altitude 600 meters. Visibility poor. Pilot Lieut. Erwin, Observer Lieut. Baucom. See intelligence report.

Reconnaissance.

Regnieville, Thiaucourt. 10:55–12:30. Altitude 22 meters. Visibility fair. Pilot Lieut. Coyle, Observer Lieut. Farnham. See intelligence report.

Photography.

Villers-sous-Preny, Norroy, Vilcey-sur-Trey. 9:35–10:50. Altitude 600 meters. Visibility fair. Pilot Lieut. DeCastro, Observer Lieut. Easterbrook. 10 Photos were taken, 9 of which were good. Mission not finished, driven back by four enemy planes.

Photography.

Villers-sous-Preny. 15:15–16:00. Altitude 1200 meters. Visibility poor. 5 photos taken. Mission not completed on account of rain.

Artillery Surveillance.

Limey, Thiaucourt. 7:00–9:10. Altitude 400 meters. Visibility good. Pilot Lieut. Michener, Observer Lieut. D'Amour. See Intelligence report. One enemy plane observed over Limey, 7:20.

Infantry Contact Patrol.

West and East of Limey, with 2nd Division. 6:10–9:25. Altitude 200 meters. Visibility good. Pilot Lieut. Erwin, Observer Lieut. Baucom. The Regiment and Battalion P.C.'s did not show their panels, otherwise mission was successful. See intelligence report.—Fired at enemy Officers on horseback at point. 366.2–239.8—Fired at wagons on road point 364.5–239.3—Chased one bi-place machine from Thiaucourt to Pont-a-Mousson and lost it in the clouds.

Infantry Contact Patrol.

East and West of Limey, with 2nd Division. 10:45–12:40. Altitude 600 meters. Visibility fair. Pilot Lieut. McKinney, Observer Lieut. Baird. No panels seen. See intelligence report.

Infantry Contact Patrol.

Lironville, Thiaucourt, with 2nd Division. 9:30–11:00. Altitude 400 meters. visibility fair. Pilot Lieut. Melvin, Observer Lieut. Duckstein. Mission partially successful, returned due to motor trouble. See intelligence report.

Infantry Contact Patrol.

Thiaucourt, Voulny, 14:20–17:10. Altitude 200 meters to 1000 meters. Visibility poor. Pilot Lieut. Groteclose, observer Lieut. Henry. Position of front line reported to Division P.C. (2nd Division). See intelligence report.

Reconnaissance.

Xammes, Pont-a-Mousson. 15:00–17:05. Altitude 700 meters. Visibility fair. Pilot Lieut. Richardson, Observer Lieut. Duckstein. See intelligence report. Two planes from First Aero Squadron, furnished protection. One plane did not return.

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12th Aero Squadron
September 12th, 1918

Summary of Operations

Artillery surveillance: Mission not completed due to motor trouble. Time 6:05–6:50.

Adjustment and Artillery Surveillance: Regnieville—Fey-en-Haye. 6:00–8:30. Alt. 250 M. Vis Poor. Pilot Lt. Gregory. Observer Lt. Hyman. Attacked by enemy aeroplanes at 7:30 Enemy machine which was a biplace was hit and crashed in the wood near Regnieville.

Adjustment of Artillery Fire: Pont-a-Mousson—Remenauville. 6:50–9:05. Alt. 500–1600 M Vis Poor. Pilot Lt. Smith. Observer Lt. Keeley.

Adjustment of Artillery Fire: Vieville-en-Haye to Vilcey-sur-Trey. 9:00–11:15. Alt. 300–700 M Vis Good. Pilot Lt. Thayer. Observer Lt. McClurg. Adjusted fugitive target battery of 2nd Bn 19th F A on point 670–412.

Adjustment of Artillery Fire: Remenauville—Pont-a-Mousson. 11:30–13:25. Alt. 400 M. Vis Poor. Pilot Lt. Carner. Observer Lt. Radcliffe. Failed to make adjustment due to rain.

Infantry Contact Patrol: Vieville-en-Haye—Bois du Four. 5:00–7:20. Ait. 300 M. Vis Fair. Pilot Lt. Paradise. Observer Lt. Wright. Troops failed to display panels when called for. Worked with 5th Division.

Infantry Contact Patrol: Regnieville—Vieville-en-Haye. 5th Division. 7:35–9:30. Alt. 200–500 M. Vis Poor. Pilot Lt. Schnur. Observer Lt. Bowman. Panels displayed and message dropped showing front lines.

Infantry Contact Patrol: Montauville—Vilcey-sur-Trey. 90th Division. 10:45–12:40. Alt. 100 M. Vis Good. Pilot Lt. Orr. Observer Lt. Henderson. Front lines failed to display panels.

Two planes from the 12th Aero Squadron—Pilot Lt. Arthur, Observer Lt. Fleeson; Pilot Major Brereton, Observer Captain Vallois —while on reconnaissance were attacked by enemy aeroplanes and brought down within our lines. Captain Vallois reported slightly wounded, other officers uninjured.

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50th Aero Squadron

Operations Report

September 12, 1918. 17:00 hr.-1700 hr.

Atmospheric Conditions—Visibility very poor. Low clouds and rain.

Reconnaissance.

1. Pont-a-Mousson—Montauville. 6:15–7:12: Alt. 500 M. Vis. Poor. Pilot Lt. Goettler, Observer Lt. Bleckley. See intelligence report.

2. Pont-a-Mousson—Pagny—Eply. 6:33–8:20. Alt. 900 M. Vis. Bad. Pilot Lt. Frayne, Observer Lt. French. See intelligence report.
3. Pont-a-Mousson—Eply. 8:32–9:41. Alt. 600 M. Vis. Poor. Pilot Lt. Phillips, Observer Lt. Brill. See intelligence report.
4. Pont-a-Mousson—Bois de Friere. 8:45–10:35. Alt. 500 M. Vis. Fair. Pilot Lt. Beebe, Observer Lt. Bellows. See intelligence report.
5. Pont-a-Mousson—Pagny—Thiaucourt. 10:50–12:40. Alt. 600 M. Vis Poor. Pilot Lt. Hardin, Observer Lt. Cole. See intelligence report.
6. Pont-a-Mousson—Champey—Eply. 13:20–14:45. Alt. 500 M. Vis. Fair. Pilot Lt. Roby, Observer Lt. Lockwood. See intelligence report.
7. DH4 No. 17 sent out on reconnaissance for 82nd Division, time 10:30. Pilot Lt. Stevens, Observer Lt. Gardiner. Plane did not return.
8. Vandieres—Preny—Villers-sous-Preny. 13:20–17:00. Alt. 1700 M. Vis. Bad. Pilot Lt. Bird, Observer Lt. George. See intelligence report.

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Office of the Chief of Air Service
Headquarters First Army Corps
American Expeditionary Forces
13 Sept. 1918

Summary of Operations for the day of 12 Sept. 1918. No. 3.

Atmospheric Conditions: Unfavorable—Low clouds and intermittent rain throughout the day.

A. Aviation.
I. Reconnaissances: 13 reconnaissances of Corps Sector carried out.
Observer Lt. Gardiner and Pilot Lt. Stevens, 50th Aero Squadron, who left on a reconnaissance mission at 10:50, failed to return.
Observer Captain Vallois and Pilot Major Brereton were attacked by four enemy planes and brought down within our lines at 10:00 A.M. Captain Vallois reported slightly wounded by machine gun bullet.
Observer Lt. Fleeson and Pilot Lt. Arthur were attacked by an enemy formation and brought down in the vicinity of Fey-en-Haye at 12:10. Neither pilot nor observer injured.
Observer Lt. Ker and Pilot Lt. Aldrich, who left on a reconnaissance mission at 14:00, failed to return. Lieut. Aldrich, who was later found in a hospital wounded and burned, reported that they had been lost in a rain storm. They were attacked by an enemy

formation and shot down within our lines, their plane catching fire upon hitting the ground. Lieut. Ker has not been located.

II. Infantry Contact Patrols: 8 Infantry Contact patrols were carried out.

For 2nd Division—3 successful—1 unsuccessful due to fact that panels were not displayed by the infantry.

For 5th Division—1 successful—1 unsuccessful due to the fact that panels were not displayed by the infantry.

For 90th Division—2 unsuccessful, panels were not displayed by the Infantry.

Observer Lt. Baucom and Pilot Lt. Erwin, 1st Aero Squadron, after completing a contact patrol for the 2nd Division harassed enemy elements with machine gun fire. A party of mounted officers leaving a battery position were fired upon from an altitude of 200 meters. One was seen to fall from his horse.

Observer Lt. Wright and Pilot Lt. Paradise, 12th Aero Squadron, were attacked by enemy planes while carrying out a contact patrol with the 5th Division. The wings and gas tank of their plane were pierced by machine gun bullets.

III. Photography: 2 missions. 13 exposures (vertical) taken over the enemy lines—14 of which were good [!].

IV. Artillery Adjustment: 1 attempted adjustment—not completed due to rain. 12 artillery surveillance missions carried out. Battery of 2/19 F. A. adjusted on fugitive target at 670-412.

Observer Lt. Hyman and Pilot Lt. Gregory, 12th Aero Squadron, were attacked by an enemy plane (biplace) over Regnieville at 7:30. Enemy plane was shot down and reported to have crashed in woods near Regnieville. Confirmation requested.

V. Miscellaneous: 1 flight for testing purposes (208)

VI. Summary:

1st Aero Squadron:

8 Sorties:
- 3 reconnaissances;
- 2 photography missions;
- 3 infantry contact patrols.

24 Salmsons on hand—19 available for duty

19 Pilots carried on rolls—19 available for duty

15 Observers carried on rolls—14 available for duty.

Total time 10 hrs. 40 min. Service time 10 hrs. 40 min.

12th Aero Squadron:

10 Sorties:
- 2 reconnaissances;
- 5 artillery surveillances;
- 3 infantry contact patrols.

20 Salmsons on hand—13 available for duty

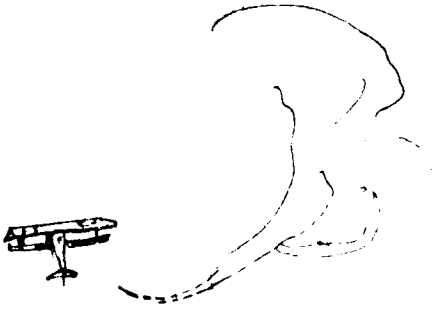
20 Pilots carried on rolls—18 available for duty

16 Observers carried on rolls—15 available for duty.
Total time 15 hrs. 45 min. Service time 15 hrs. 45 min.

50th Aero Squadron:
9 Sorties:
8 reconnaissances;
1 contact patrol.
16 D.H. on hand—13 available for duty
17 Pilots carried on rolls—15 available for duty
10 Observers carried on rolls—8 available for duty.
Total time 9 hrs. 8 min. Service time 9 hrs. 8 min.

208th Aero Squadron:
4 Sorties:
3 artillery surveillances;
1 test flight.
10 Breguets on hand—6 available for duty
10 Pilots carried on rolls—7 available for duty
8 Observers carried on rolls—7 available for duty.
Total time 6 hrs. 0 min. Service time 6 hrs. 0 min.

214th Aero Squadron:
4 Sorties:
4 artillery surveillances.
10 Breguets on hand—6 available for duty
10 Pilots carried on rolls—9 available for duty
8 Observers carried on rolls—6 available for duty
Total time 5 hrs. 5 min. Service time 5 hrs. 5 min.



B. Aerostation.
4 Ascensions:
1st Balloon Co.—5:50-9:22—3 hrs. 32 min.
2nd Balloon Co.—18:55-19:22—0 hrs. 27 min.
5th Balloon Co.—4:40-8:25—3 hrs. 45 min.
42nd Balloon Co.—9:50-10:08—0 hrs. 17 min.
Total time in air—8 hrs. 2 min.
Artillery Adjustment—Nil.

By order of Major M. A. Hall, C. A. S., 1st A. C.

Paul D. Meyers
2nd Lieut. C.A.C.
Operations Officer

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8th Aero Squadron

Statement by 1st Lieutenant Horace W. Mitchell

Left Aerodrome at Ourches at 1:30 P.M. on Sept. 12th., on a counter battery mission. Lt. J.W. Hartz [Artz] was my observer.

Ours was the only plane on the expedition. The sky was full of Allied planes, so we needed no protectors. Our machine was a D.H. 4. It was a very windy, rainy day.

At 2:30 we had finished our missions and we started from near Thiaucourt on our way to Beaumont where we had messages. The wind was blowing from the Southwest and was so strong that in a few minutes we were blown across the Moselle, where we were heavily "Archied." To get away from the Archies it was necessary to fly with the wind, and after getting away I turned a half north to recross the Moselle and come back over the battlefield to Beaumont. We were attacked by three German planes, two Fokkers and a Rumpler. In the fight that followed my front guns and motor were disabled and the observer slightly wounded. As we were only at an altitude of 2000 feet and were flying behind the lines it was impossible to get back with the motor disabled. Therefore I landed. We were taken prisoners by German soldiers.

We were taken to a village and searched and asked a few questions and then taken to an Artillery Headquarters, where more questions were asked us. At 8 o'clock we were taken to a railroad station and carried to St. Avold, where we were again questioned by another German Intelligence Officer. This Intelligence Officer gave the first inkling that the war might soon be over when he admitted to me that since America's entry into the war Germany could not win, but he said that Germany could withdraw to the Rhine and hold out forever. We were then taken to a Soldier's Barracks and given a room.

Next morning we made our first acquaintance with German food, also with more German Intelligence Officers. They seemed very interested in wanting to know what was the object of the St. Mihiel attack. They seemed to think it was the Capture of Metz. On the Sunday following my capture a German Aviator came over and questioned me. He was very interested, and tried to find out something about the Liberty Motor.

After four days at St. Avold we were sent to Strassburg, traveling in fourth class coach and heavily guarded. At Strassburg we were kept in an old fort, where the quarters were very damp and ill-smelling; seven of us sleeping in a very small room. The food here was very bad, consisting of black bread and soup.

After five days at Strassburg we were sent to Karlsruhe. At Karlsruhe we were kept locked up in rooms in a hotel, which the English say is well fitted up with dictaphones. Here we were interviewed by another Intelligence Officer. We were kept seven days in this hotel, and then sent on to Landshut, always in fourth class coaches, without heat or food.

In Landshut we were given a physical examination and inoculated for cholera, typhus, and vaccinated for smallpox. Outside of that they did not do anything for us. The food at Landshut was very good, but the quantity was so small that everyone was starving.

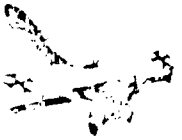
At these different camps we were given copies of the paper, "America in Europe," a German Propaganda Sheet, published for circulation in the American Prison Camps. It was so crude, and we made so much fun of it that they refused to give us any more.

After ten days in Landshut we were sent to Villingen, a permanent camp for American Officers. We were on the train two days, and to prevent our escaping from the train they made us remove our shoes and would only give them back to us when changing stations. The night of the journey was spent in the civil jail at Uln. This really was the best bed I had during my stay in Germany. In Villigen we received our first Red Cross food, also our first change of clothes. Food here was plentiful of its kind, but one could not live upon it alone, but with the Red Cross food we were able to get along all right. We were paid 60 marks per month by the German Government and we were charged 54 marks per month for food. We were not subjected to any ill-treatment. We had two roll-calls per day. Outside of that the Germans left us pretty much to ourselves.

For ten days after the Armistice was signed conditions remained the same as before. We were still heavily guarded and had roll-calls the same as usual. The last three days of our stay we were allowed the freedom of town. We left on the 25th of November. We thought we were going straight through to France. At Constance we were taken off the train and told we would be there three days. We received our best treatment in Constance. The food was better there than in Germany and we were allowed the freedom of the town on one side of the line.

Our treatment by the Germans was better than I expected when I was taken prisoner, but I was captured after the Germans began to lose, and from American and British Officers with whom I have talked with while in prison I learned that the Germans when they were winning were very cruel, and from the English enlisted men whom I have seen I know that they must have been so. I saw one American soldier who had been [in] a Reprisal Camp for attempting to escape, and he was certainly a living skeleton. He said he had nothing but bread and water for two weeks, and had hard work every day.

We left Constance Friday, November 29th, and came through Switzerland, arriving in Bellegarde at 2 A.M. November 30th.



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8th Aero Squadron

Statement by Second Lieutenant John W. Artz.

Lieutenant Artz submitted the following:

In the afternoon of September 12th, 1918 while flying over the enemy's lines east of St. Mihiel, in the performance of my duty as an Aerial Observer, our airplane (D.H.4-Liberty) was attacked by several German airplanes. During the engagement, our engine was disabled, forcing us to land about twelve kilometers inside the German lines, near a village. The enemy continued firing until our plane had stopped moving on the ground and we were out of it. I received a flesh wound, during the attack. The pilot and I were immediately taken prisoners, searched, examined, my wound field-dressed, and later in the afternoon we were taken to St. Avold.

On September 14th, I was removed to a hospital in the same town, where I stayed until September 19th. Medical treatment was poor—my wound did not get properly cleaned or dressed. The doctor in charge seemed inefficient; purposely neglectful in his attention to it. The nurses I had were kind and seemed glad to grant little favors. Food was sufficient, but fair only in quality—consisted of black bread, soup, coffee and meat once or twice a day.

I was removed to another hospital on September 19th at Morchingen, the French name being Morhange, staying there until November 12th, when I came to France in an English motor-lorry. The medical treatment here was good. The nurses did a great deal to make me more comfortable and satisfied. The food given me was poor and insufficient in amount. Clean clothes for both myself and bed was given me about every two weeks preceding the armistice.

I received twenty marks a month, a total of forty marks, payment made on or about October 10th and November 5th.

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135th Aero Squadron

The following is the account given to the Information Section. Air Service by 1st Lieutenant Thomas J D Fuller, Jr., pilot, (Washington) and 2nd Lieutenant Virgil Brookhart, Observer, (Wyconda, Missouri), both of the 135th Aero Squadron.

On the morning of September 12th, which marked the beginning of the St. Mihiel Drive, they set out from their aerodrome near Toul on a

mission for reglage of artillery fire in the vicinity of Montsec. The weather was quite unfavorable owing to low hanging fog, and the southwest wind. At a height of 1500 feet they encountered thick clouds, and after five minutes progress in a West to East direction they became temporarily swallowed up in the clouds. By chasing holes in the clouds they managed to catch glimpses of the various towns over which they were passing. Although this presented some difficulties since it was their first flight together over the lines, they identified Nancy, and then found themselves over Thiaucourt (West). They were having such difficulties that they decided to abandon their mission and started southwest with the Ourches airdrome as a goal.

Climbing to 10,000 feet, they proceeded for about half an hour in what they believed to be a southwesterly direction. When they came down they found they were over a range of mountains, and later discovered they had been near Mulhausen. They could see trenches as they neared the ground, and therefore ascended again, proceeded for some time toward the southwest, as they believed, and again came down to find themselves over front line trenches. It became apparent to them that a fairly strong wind was blowing them off their intended course. The wind at that time was west, and since they had been heading southwest, they concluded that the wind had been forcing them in a southerly direction and at the same time sweeping them constantly with an eastward inclination toward the Swiss border.

Finally they flew below the clouds again, and finding that they had left the trenches behind them they landed. Peasants and soldiers appeared from all directions, and as the country looked strange, they took off again with the intention of rising, but the motor died, and they were forced to stop and land a second time. People crowded about them. They were not sure just what the trouble was with the motor, but as they had started to rise after the first landing, the Swiss soldiers had fired upon them, and they believed that a bullet had torn the jacket of the motor and thus rendered it useless.

Inquiry showed that they were only 600 meters from the border in one of the projections of Switzerland into French territory; and they believed that had they been able to proceed a few moments further they would have landed in French territory.

The Swiss authorities took charge of the two men and sent them to Berne, and thence to Lucerne. They were there informed of their rights, that is, i.e., that they could either go free on parole, or not desiring parole, would go to prison. It appears from the statements of both men that they were much chagrined over their internment, and realizing that they could not escape while on parole owing to the responsibility of the United States Government to surrender them if they broke leave of honor, they preferred to take their chances of escape. Lieutenant Fuller in particular, stated to the writer that he did

did not fancy the prospect of being interned in Switzerland for the period of the War, and therefore decided to take his chances in prison, with the prospect of escape.

It was agreed therefore, that Lieutenant Brookhart would go to the Hotel at Lucerne on parole, while Lieutenant Fuller would enter the Military Prison at Andermatt near the St. Gotthard Tunnel, and Lieutenant Fuller would reconnoiter the prison, study the chances of escape, and communicate his plans by code in letters to his comrade. It was planned that ultimately Brookhart would also come to the prison and they would escape together.

It happened however, that by the time Lieutenant Fuller was able to make any substantial plans for escape the prospect of the signing of the Armistice was at hand. Having received no word from his comrade, Lieutenant Fuller decided to make his own escape single handed. He was on the fourth floor of the prison. Near his cell was a toilet, from which opened a window overlooking the ground below. To this toilet he was ordinarily accompanied by a guard. He made it his habit to stay in the toilet room a longer and longer time each day, so that his delay on the night of the escape would not excite suspicion of the guard.

The night which he chose in early November, was dark and foggy. He cut his bed sheet into 7 strips, which he tied together. These he tucked about this waist, beneath his pajamas. Immediately upon entering the toilet he fastened one end of the bed sheet rope to the window sill and the other to his waist. Just as he commenced to let himself down the guard knocked on the door. At the third floor the improvised rope broke and he fell a distance of 30 feet, plunging onto his head and arms. He was severely cut about the face and rendered temporarily unconscious. He recovered consciousness, however, before anyone discovered him, and although lame and sore, he attempted to follow the course of escape which he had mapped out in advance. By careful work he managed to evade the two sentinels at the mouth of the tunnel, but in making his way along, lost his candle and matches, on which he had depended to guide himself through the thick fog. As he was coming out of the tunnel he was caught between two sentries, who halted him took charge of him and turned him over to the authorities. For more than a week he was confined to bed, recovering from the injuries sustained in his fall. Later he was released upon the signing of the Armistice.

Lieutenants Fuller and Brookhart told substantially the same story of their experiences up to the point where they separated. From that point on Lieutenant Brookhart remained on parole at Lucerne, and of this period had little to say.

Written from notes taken by 2nd Lieutenant L H Thayer

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Of the three American squadrons assigned to V Corps for the Battle of St. Mihiel, only the 99th was ready for operations at the beginning of the battle. The 88th, which previously had been assigned to III Corps and had been at Ferme-de-Greves, near Chateau-Thierry, was not alerted for transfer to the V Corps base at Souilly until noon on 11 September. The 88th changed station on the morning of 12 September and was ready for operations with V Corps that same afternoon (Doc. 517). The 104th Squadron had begun to move from Luxeuil-les-Bains, in the Vosges sector, on 7 September but because of bad weather had not been able to fly its airplanes to Souilly before the battle began. The 104th, however, had some good observers at Souilly, and these men flew with pilots to the 88th and 99th Aero Squadrons on the first day of the battle (Dec. 151).

99th Aero Squadron
September 12, 1918

Missions Carried Out

Pilot	Observer	Missions	Time Out	Time In	Total Time	Visibility
Markham	Powell	Command Plane	10:00 AM	11:15 AM	75	Rain
Blumenthal	MacLachlan	Reconnaissance	12:00 AM	12:05 PM	05	Rain
Eaton	Gilchrist	Fugitive Target	1:45 PM	4:00 PM	150	Rain
Kahle	Hill	Surveillance	2:30 PM	4:15 PM	105	Rain
Clark	Neel	Reconnaissance	5:35 PM	7:15 PM	100	Rain
			TOTAL		7:15	

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104th Aero Squadron
September 12, 1918

Summary of Reports

First Echelon: Lieut. McCann, Observer, performed a special courier mission with Lieut. Hileburn, Pilot, of the 99th Aero Squadron. Lieut. Null, Observer, and Capt. Littauer, 88th Squadron, made reconnaissance of Corps sector and reported considerable movement of enemy troops and burning villages. Lieut. Nichols, Observer, and

Lieut. Doran, Pilot, 99th Aero Squadron, performed Infantry Mission beyond Rupt; nothing particular to report. Lieut. Beard, Observer, flying with Lieut. Cadbury, Pilot, 99th Squadron, made a reconnaissance east of Rupt. Nothing particular to report. Lieut. Polley, Observer, Lieut. Edwards, Pilot, 99th Squadron, made an artillery reconnaissance, but were unable to get response from batteries. Lieut. Gilchrist, Observer, and Lieut. Eaton, Pilot, 99th Squadron, made a reconnaissance of Rupt, Mouilly, St. Remy, Dommartin, reporting several villages on fire.

Second Echelon: Made two attempts to get from Luxeuil to Souilly. Lieuts. Coffin, Jacobi, Hall, Houck, Davis, Wallace, and Johnson left Luxeuil in formation with 99th Squadron pilots leading. Due to weather conditions, only Lieuts. Coffin, Jacobi, arrived at Souilly. Lieut. Ball landing at Amanty, crashed his plane and two Breguets of the 1st Day Bombardment Group. Lieuts. Davis, Wallace, and Houck also landed at Amanty and all broke props in the mud. Lieut. Johnson lost. On account of a severe rainstorm the remainder of the Squadron did not leave Luxeuil until afternoon. Lieut. Reynolds, leading a formation of eight planes with Lieuts. Arthur, Johnson, Clark, Ellis, Morris, Roberts, and Weeks, pilots, arrived at Souilly at 18:30 o'clock after all had been obliged to land at Ourches airdrome on account of thunder clouds.

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Headquarters Air Service
Fifth Army Corps, American E.F.

Operations Report
Number 37
19:00 Sept. 11 to 19:00 Sept. 12, 1918

1. Atmospheric Conditions: Low Clouds. Rain. High Wind.
2. Points of Interest: Wireless communication very satisfactory.

By order of Major Christie

Fraser Hale
1st Lt. FA USA

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Headquarters Commander Army Balloons
First Army

Daily Report of Operations for September 11th–12th

Balloon Wing, First Army Corps, Noon to Noon

Ascensions:

1st Co. 5:50–9:22. Observer Lt Barton. Altitude 300 M. Visibility 8–9 Kilos.

2nd Co. No ascension. Moved to forward position.

5th Co. 4:40–8:25. Observers Lts Smith and Fox. Altitude 700 M. Visibility 8 Kilos. Wind 20 meters.

42nd Co. 9:51–10:08. Test flight. Altitude 300 Meters.

Observations:

1. Enemy Infantry. Nil.
2. Enemy Artillery. Nil.
3. Enemy Aeronautical Service:

6:35–8:45. Goin Balloon in ascension (B–5).
7:27–8:45. Preny Balloon in ascension (B–5).
11:00–11:05. Preny Balloon in ascension (B–5).
7:31–8:45. Grange-en-Haye in ascension (B–5).
8:09. Marieulles Balloon burned at 81.2–46.0 by Plane 21 1st Pursuit (B–5).
7:00–9:00. Two planes seen in north over enemy territory (B-1).
7:00. Plane apparently descended in wood N. of Montauville (B–5).

4. Circulation, Roads, Railroads. Nil.
5. Destruction Explosions, Fires:

6:51. Large calibre shells in trenches 200 M east of Norroy (B–5).
7:07. Much smoke apparently from heavy shelling at 70.0–37.5 (B–5).
7:12. Large calibre shells in Cheminot (B–5).
7:20. Bengal flare at 75:45–38.80 (B–5).

6. Trench Work, Shelters Etc. Nil.

Adjustments of Artillery. Nil.

A close-up of a Caquot balloon basket on ground.

Balloon Wing, Fifth Army Corps, 19:00 to 19:00

Ascensions:

6th Co. 6:50–8:22. Observer Lt Nixon. Altitude 350–200. Visibility very poor.

7th Co. 6:41–7:49. Observer Lts Burt and Smith. Altitude 200. Tension 550. Visibility very poor, low clouds.

7th Co. 18:55–19:10. Lts Moore and Smith. Altitude 545–400. Tension 400. Visibility very poor.

8th Co. No ascensions.

12th Co. 7:06–7:26. Observers Lts Hinman and Tait. Altitude 450–350. Tension 600. Visibility very poor. At 7:18 ordered to haul down. At 7:26 balloon broke cable at winch, ascended very rapidly, nose in air, headed towards enemy lines. Observers stayed in basket.

93rd Co. 6:25–7:00. Observers Marechal de Logis Bolge. Altitude 350. Visibility very poor.

Observations: Nothing to report.

No report received from Fourth Army Corps.

John A. Paegelow
Major, A.S., U.S.A.
Commander Army Balloons, First Army

Report of Balloon operations of September 12, 1918.

1. 6:25 A.M. Fourth Corps.
   43rd Balloon near Ansauville. Up all night.
   43rd, 9th, and 3rd, balloons up at 6:10 A.M.
2. 6:35 A.M. First Corps. 1st and 5th balloons up at 6:15 A.M.
3. 7:30 A.M. First Corps. Report St. Baussant and Maizerais taken. Everything progressing.
4. 7:30 A.M. Army Balloon. B-41 300 Meters. No visibility to the line. No action on our rear lines.
5. 7:50 A.M. Fourth Corps, Fifth Corps. Nothing to report.
6. 8:00 A.M. 2nd Col Corps. Observer reports reaction of the enemy very feeble. Balloon brought to ground account of high winds. Observer reports "Have not seen any bombardments in our rear lines".
7. 9:45 A.M. Army Balloon (Jouy-sous-les-Cotes). Balloon 41. Our balloons are in intermediary position (Tanchee de Moulin, Detachment in Essey).
8. 10:15 A.M. 2nd Col Corps. 52 Balloon Co. (French). Line extends to H.8:X.1—Y.O; X.1. Reports not confirmed. Troops at H.O-R.5 on road Montsec to Richecourt.

9. 10:15 A.M. 2nd Col Corps. Balloon 52. Reports received at 9:15 A.M. from liaison officer at D.I. 39. Observatory at Liouville reports combat in direction of Pannes. Essey and Maizerais have been taken by the Americans.

10. 11:27 A.M. Fourth Army Corps. 10th Balloon Co. (Ansauville) Lt Boyd fell from basket. Leg broken and back sprained. All our balloons and Boche balloons down on account of high winds.

11. 11:40 A.M. Fifth Army Corps. Balloon Wing B. Cable of 12th balloon broke at 7:15 A.M. Last seen approximately 10,000 feet. Balloon going east. Lts Hinman and Tait in the Basket. Neither jumped. Les Esparges taken at 8:30. Little visibility. Balloons down on account of high winds.

12. 12.25 P.M. 2nd Colonial Corps. 52nd Balloon Company (French). Our advanced elements are in Bois de Madine. Friendly Bengal fire lighted in direction hill 237.8 (Road Montsec—Richecourt). 9:30 A.M. Pannes taken. Bois-de-Madine unoccupied. 9:39 A.M. Americans in Bois-de-Burly apparently waiting for prearranged objective. Headquarters on the left report Hill 322 taken.

13. 14.00 P.M. Balloon 41. (Jouy-sous-les-Cotes) (Communicated by Artillery) Line passed by Nonsard, Montsec and Loupmont.

14. 15.15 P.M. Fourth Corps. 10th Balloon Company. Report of accident to Lieut Boyd coming in. Owing to high wind balloon blown against tree and punctured. New balloon inflated and ready for ascent. Tubes sent to Station for refilling.

15. 15.30 P.M. First Corps. Balloon Wing A. Balloons not able to function on account of high winds. Nothing new. Changes in line of balloon will come thru message center.

16. 19.25 P.M. Fourth Corps. Balloon Wing C:

B-3 is leaving present position for a point at St. Baussant

B-9 moved to Richecourt. B-69 has moved to Bois-du-Jury

B-43 has moved to North of Flirey.

B-10 has not moved as yet.

B-3 and B-10 tore a hole in fabric losing gas. Caused by the heavy wind while being brought down.

17. 20.15 P.M. Fourth Corps. Balloon Wing C:

B-3 operating tonight at new position.

B-10 will move to-night to the Bois-de-la Hazelle.

18. 21:01 P.M. 2nd Colonial Corps. Balloon 41 move from (Jouy to Gironville). Ascension from 4:30 to 8:00. Lt Flin observer. At 7:00 o'clock intense bombardment east of Montsec and from Apremont to St. Mihiel. At 7:30 Balloon seen drifting South East (This no doubt was the 12th. Balloon) At 7:45 a Spad monoplane[monoplace] coming from the West fires incendiary bullets towards the balloon and disappeared in the north. At 8:00 Balloon brought down.

19. 20:40 P.M. Fifth Army Corps.

Tonight 6th Balloon Co. moved to position west of Mouilly, rest of companies will stand pat.

26th Division captured over 1000 prisoners and at four o'clock were beyond Vaux and St. Remy and still going. Weather conditions look favorable for tomorrow.

20. Fifth Army Corps. The 8th Balloon Company has moved from its station 2 kilometres north east of Dieue to a position 1 Kilometre south of Sommedieue.

21. 22:25 P.M. 2nd Col Corps.

B-20 (French). Moves north of Thillombois to Troyon-sur-Meuse.

B-52 (French). Moves north to Petite Mandres.

22. 22:25 P.M. 1st Army Corps. B-2. Moves to Mamey.

23. 21:30 P.M. 1st Army Corps. Balloon Wing Hdqrs. Reports Jaulyn Balloon burned sometime late this evening.

24. 21:20 P.M. 1st Army Corps. Balloon 5. Carrying out night observation at a point 1 kilometre due north from Dieulouard.

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12th Balloon Company

Report of Balloon Officers Who Were Prisoners of War in Germany

Lt. Tait's Report

1st Lieutenants G. W. Hinman, A. S. and R. S. Tait, A. S. ascended at 6:40 A.M. on September 12th, 1918 in the 12th Balloon near Sommedieue. As observation was impossible owing to a high wind and low flying clouds, the balloon was ordered hauled down about 7 A.M. by Major J. H. Jouett, A.S., commanding the wing of which the 12th Co. was operating the Corps balloon. In hauling down judgment was not used at the winch in that the men operating it brought the balloon to the ground much too rapidly considering the velocity of the wind prevailing at the time. Further, the location and position of the winch itself were both bad. It was located in a narrow ravine wooded on both sides which prevented any intelligent manoeuvering and facing the wind. During the descent the balloon began to weave from right to left, in the manner common to all such type balloons. These oscillations became more and more violent as the basket neared the ground and finally, as there was no modification in the rapidity with which the winch was hauling down, the bag nose dived from a height Lieut. Tait would say to be 100 feet.

Just what happened as the bag struck the ground Lieut. Tait cannot say as both Lieutenants were crouching down in the basket at the time to prevent being thrown out. However, as soon as the basket was jerked from the ground Lieut. Tait, who was in the front of the basket, rose and noted that the balloon was free. Both right and left bridles were hanging perpendicular so it would appear that the connecting ring had broken. As both of the Lieutenants parachutes had been damaged in the crash, so as to render them useless, preparations were begun to effect a landing. Maps and photographs being gotten rid of first and on our own side of the lines.

During the flight which lasted about 45 minutes, the balloon handled very nicely, nosing up of course but never so much as to interfere in any way with the operation of the valve or ripping cords. Upon nearing the ground Lt. Tait ripped the bag completely while the basket was about 30 feet from the ground. The gas however was not liberated as rapidly as anticipated which resulted in the process of "bouncing." After either three or four of these bounces both Lieutenants were pitched out of the basket but both stayed with the balloon—Lieut. Tait by virtue of his parachute rope, which he failed to free himself of, and Lieut. Hinman by hanging to the fabric of the tail of the balloon. In this manner both Lieutenants were dragged for some distance but as the bag in its ripped condition was rapidly losing gas, the Lieutenants were soon released from their embarrassing predicament.

Considering the bulky nature of the ballast used on the trip—glasses, telephone apparatus and general basket equipment—Lieut. Tait indorses the type R. Cacquot balloon as a good free balloon type but would suggest a larger ripping panel.

The maximum altitude reached and the point at which the balloon was first valved was twelve thousand feet.

R. S. Tait
1st Lieut., A.S.

Lt. Hinman's Report

At 6:30 a.m. on Thursday, September 12th, 1918, a trial flight was made with the 12th Balloon. The company was then stationed about 2 Km. South of Sommedieue and about 3 Km. East of Rattentout (South of Verdun). There was a very high wind, with low clouds—some of the clouds barely clearing the tree tops. At 500 meters the Balloon was out of sight with the tension reading 600 kilograms. The winch position was very poor, it being placed in a valley between two hills and facing in the direction of the wind.

1st Lieut. R. S. Tait and 1st Lieut. G. W. Hinman, Air Service, went up at 6:40. They reported no visibility and Major J. H. Jouett, Air Service, ordered the balloon down after fifteen minutes. The balloon swung about fiercely and Lieut. Tait was very sick.

The balloon swung in wide circles while being hauled down, barely missing the hills. The winch operator hauled the balloon down altogether too fast and made no effort to play the cable. The balloon swung out broadside to the wind, then suddenly shifted tail into the wind. This, combined with the hauling down by the winch caused a nose dive of 50 or 75 meters and the balloon hit the ground, the cable laying over the winch. Some of the Balloon Crew ran for the rope. One man of the Basket Detail rushed at the basket, stepped on Lieut. Hinman's parachute rope, pulled the parachute out of the container and received a tumble when the balloon rose.

Lieut. Hinman's parachute, opened by the upward rush of the balloon, was hanging below. Lieut. Tait's parachute container was wedged between the basket suspension above the suspension bar with the cap pulled off and the parachute partly out. Lieut. Hinman was pulled head and shoulders to the edge of the basket and was unable to move, the chest strap on his parachute harness slipped upward to this throat and the pull strangled him.

Lieut. Tait, after cutting himself free from entangling telephone cords, tried to relieve Lieut. Hinman but could not budge the parachute. Lieut. Tait then valved sufficiently to check the rising of the balloon. This caused Lieut. Hinman's parachute to cease dragging and it was pulled into the basket.

The balloon, which was a Goodyear Type "R," rode perfectly normal most of the time broadside to the wind. Lieut. Tait's parachute caused the basket to be tilted at an angle until some ropes were cut. The height of the balloon when starting to descend was not known—the Altimeter could not be found.

Suddenly shells began to whiz about and flashes from guns were seen on the ground. This was the 7 o'clock barrage from the light artillery.

It was impossible to land in such shell fire. Nearly everything of weight was thrown out in order to get out of that area. Maps and photographs were thrown out at this time. Four pair of glasses, one

thermos bottle of coffee, one large round loaf of bread, one can of beans, one can of corned beef, the telephone, and swinging seat were thrown out. Then the balloon rose to a height of approximately 4000 meters. The Altimeter was found in a pocket of the basket with the ring pulled out. At this height the bag was tight, the sun was shining brightly and was reflected by the great sea of clouds below.

No Aeroplanes were sighted anywhere. Lieut. Tait feared anti-aircraft fire and believed the balloon was fired at when a break in the clouds was reached. For this reason he wished to land as soon as possible.

Lieut. Tait then valved the balloon and a rapid descent was made. The remainder of the articles in the basket, two pair of glasses, lunch basket, etc., were thrown out when near the ground, to check the flight.

Lieut. Tait ripped the balloon half open when about 50 meters from the ground. He lost the rip-cord when striking the ground. The basket crashed hard, but hitting on one edge, absorbed the shock. Both Lieutenants were thrown to the bottom of the basket. At this time the nose of the balloon was straight up and the flabby tail hung over the basket. The balloon bounced about 15 meters. The rip-cord swung into the basket and both Lieutenants grabbed it and ripped the balloon wide open. The second crash, harder than the first, came and then a third. The fourth crash tipped the basket over and both Lieutenants rolled out.

Lieut. Tait neglected to cut his parachute rope and was dragged. Lieut. Hinman had his left leg caught in the rigging and he, too, was dragged. The gas in the nose of the balloon above the rip-panel seemed just enough to cause it to keep bouncing. Very luckily the valve cord swung near Lieut. Hinman, who was looking for something to grab hold of and he was able to let most of the gas out of the nose of the balloon.

A great pocket was formed by the wind just under the nose of the balloon and the Lieutenants were dragged over the ground in a lively fashion for 75 to 100 meters. Lieut. Tait was dragged on his stomach, and Lieut. Hinman, hanging to the valve cord, rode on the trailing tail of the balloon.

Due to the low clouds no effort could be made to select a landing place, but luckily the landing was made in a clearing surrounded on three sides by woods.

Several Russian prisoners were working under German guards in the fields and they ran toward the balloon and followed its course on the ground and by the time the Lieutenants were clear of the balloon they were surrounded by soldiers and children. Lieut. Hinman tried to examine the cable but was unable to do so because of a German. He could see only the ring on the metallic "V" and believes that the eye splice gave way.

Both Lieutenants were bruised and well shaken up but neither were injured in any way. No attempt could be made to burn the balloon. When last seen the balloon was tossing in the wind, the nose being held up by the remaining gas.

The balloon passed over Conflans and landed on the German border near the village of Habonville, 12 kilometers east of Conflans. The balloon travelled a distance of 42 kilometers and landed 45 minutes after breaking away.

The two Lieutenants were made prisoners and taken to some German Officers' quarters in Habonville and immediately some English-speaking Intelligence officers were phoned for.

The two questioning officers wanted to know about the St. Mihiel offensive, if the attack was a large one, what the objectives were, and what units were involved. They seemed much concerned about tanks and wanted to know where the Americans got them. "How many Americans are in France?" and "When do you think the war will end?" are two very common questions asked of prisoners in Germany.

Lieut. Hinman was asked if he had seen any submarines when crossing the Atlantic and how many ships he thought had been sunk. One questioning officer asked if it was true that the Americans would try to end the war by Christmas. Upon the reply of not knowing, the German stated that it was impossible for the Allies to win. It is not necessary to answer questions asked by the German Intelligence officers and when answers are given they are regarded as lies. The Germans themselves seem to lie so much that they expect to be lied to. Lieut. Hinman was asked many times about the gun that was firing on Conflans. Finally, when no information was given, the questioning officers said "I will have to take you to Conflans and you will be under shell fire of your own artillery." Both Lieutenants were taken to Conflans in an automobile with the two Germans officers. This was the only motor car that Lieut. Hinman saw in Germany having rubber tires.

In Conflans the two Lieutenants were first searched for papers, maps, compasses, and weapons. They then were taken to a small room in a building near the center of town. The 400 millimeter guns under Capt. Small, with the railroad yards of Conflans as their objective, seemed to be on their target in very good shape.

Capt. Small had asked the 12th Balloon for a rough adjustment on Conflans just before the balloon broke loose. The runaway balloon travelled most all the way near the trajectory of these guns and the Lieutenants could hear the projectiles whistle past them every little while.

In the early afternoon the shells were falling North and a little short of the railroad yards. That night it was decided to evacuate all civilians from Conflans and the American Lieutenants were taken to the station in charge of two guards. This was at 4:30 p.m. and a shell burst in the neighborhood of the station just before the Lieutenants reached

there. After the Lieutenants were seated in a second-class coach, just 15 minutes after the previous burst, there came a terrific explosion which shook the car. Another one of Capt. Small's shells had burst in the rear of the train. There was much confusion and many were hurt by shell fragments and railroad iron. A large piece of iron crashed thru the compartment forward of the Lieutenants. Civilians and soldiers were running about in confusion, many with bleeding wounds. The train pulled out for Metz before another shell came.

In Metz the Lieutenants were housed in an uncompleted canteen and were sleeping on tables when the siren for an air raid was sounded at 2 a.m. The Lieutenants were taken to the underground passage in the station, where many people were gathered, and remained there the remainder of the night.

The next morning they boarded a train for Montmedy, arriving there the night of September 13th. There they were put in a prison camp with one other prisoner, a German dressed as a French aviator. He was an ugly, sleepy-looking chap and asked no questions. If he expected to overhear any conversation he was disappointed as both Lieutenants were so tired that they hardly exchanged a word and slept all the time they were there. The following day they were taken to a de-lousing station, which was entirely unnecessary at that time.

The train arrived in Metz at 5 a.m. the next morning, and after changing trains, the Lieutenants were taken to Karlsruhe. There they spent a week in a vermin-infested hotel, with dirty beds and blankets, locked in a small room with only four white walls and a ceiling to look at, the windows being locked and painted. The food was very poor, consisting of black bread made of potato flour and soup with many sticks and leaves in it. The sole amusement consisted of examining the soup at each meal to see what new could be found in it.

At the end of this time the Lieutenants were questioned by some intelligence officers, who would liked to have learned something about American Balloon Service, but did not know enough themselves to ask very many questions. Such questions as "How large is a balloon?", "What is it made of?", and "How much gas does it contain?" were asked.

This hotel was near the station. From the hotel the two Lieutenants, together with some English and French officers were taken to the main camp at Karlsruhe, which was located near a munitions factory. Before they were admitted to this camp they were searched, their flying clothes were taken away and civilian money was exchanged for "prison" money. The exchange of 75 marks for 100 francs was given and later, when the prisoners were released from Germany, an exchange of 75 francs for 100 marks was given for the "prison" money.

At this camp the Lieutenants received their first American Red Cross supplies, which consisted of a change of underwear, toilet articles, and some real food. After five days at this camp the two

Lieutenants, with thirteen American aviators, were taken to Landshut, Bavaria. Here they were kept within the grounds of an old castle, with a very small area in which to walk, surrounded by a high wall and a moat.

At this place they were supposed to receive three inoculations for typhus, two for cholera, and a smallpox vaccination. The Lieutenants, however, received only two inoculations for typhus, one for cholera, and the vaccination.

At this place the food was insufficient and contained very little nourishment, altho the variety was better than that received in other camps. After two weeks of being penned up in this small area where they were neither allowed their caps nor at night their footwear, they were taken to Villingen, in Baden. That was the American Officer Prisoners Camp, where the two Lieutenants were served cabbage and carrots nearly every day until they were released. Thanks to the great work of the American Red Cross, their existence was not dependent upon the German food, and the officers in messes of four or six, did their own cooking on small stoves in the barracks.

This camp was the best that the Lieutenants saw in Germany. It was previously occupied by French and Russians, and was said to be a reprisal camp because the Russians had sent German prisoners to Siberia.

The weather was very wet and cold there. Snow which fell the early part of November was still on the ground when the Americans left.

German newspapers were allowed at this camp so the American officers kept themselves informed as to how the line was running and about the peace proposals. News of the armistice was published and altho the prisoners realized that the terms were very severe they were confident that Germany would accept them, and learned of the signing the 12th of November.

The camp was visited by the Soldiers and Sailors Committee during the revolution and the Commandant, a Major, was relieved of his position and his rank taken from him. The former Adjutant, a Lieutenant and Socialist, was put in command, but a private in the Camp Guard wearing the Red Ribbon had the authority to veto or pass anything the new Commandant did or proposed.

The barracks at this camp were made of wood, divided into rooms accommodating twenty officers. All tables, stools, bedding, and towels were marked "K.G." (Prisoner of War) "1913." The camp was surrounded by two barbed-wire fences and a high wooden fence topped with wire, with guards continually walking post inside and out. Several high candlepower lights illuminated the inclosure.

Volley ball and indoor baseball were two prominent sports provided for by the Y.M.C.A. A library of two or three hundred books was brought from the Y.M.C.A. Thru a local moving picture firm in Villingen, the prisoners had a show of three films nearly every Friday night. A stringed orchestra was formed, the instruments being

bought in the town and from the Y.M.C.A. The officers were not asked to work, but formed for roll call at 9 a.m. and 7 p.m. daily.

The food consisted of mostly cabbage and carrots. Occasionally a small piece of meat would be found, also a few potatoes. Once a week jam was served, which was made from apples, first used for making cider, and grapes after being pressed for wine, also sugar beets, combined with chemical flavoring which proved very poor for the teeth, turning them black and undermining fillings.

The Americans were promised an early release after the armistice but promise after promise was broken and November 26th, 1918, early in the morning, they boarded a train of 2nd-class coaches and were taken to the Swiss border to the town of Constance. Here they were kept in another prison camp and were released thru Switzerland November 29th, 1918.

Two days before the release from Villingen the Americans, by giving their parole, were allowed to walk about the town at will between the hours of 9 and 12 a.m. and 2 and 6 p.m. Civilians in this village were much pleased with the close of the war. Flags were flying and words of welcome to home-coming troops were posted everywhere. The civilians greeted the Americans courteously and seemed glad to have them buy anything they wished in the stores. The civilian population looked very poorly fed and children were small and pale. The home-coming troops were very jubilant. All soldiers, horses, and wagons were decorated with red flags and ribbons. Lieut. Hinman saw several American rifles which some soldiers were bringing home for souvenirs and each one had a red flag stuck in its muzzle. The soldiers always received much better food than the civilians and the civilians in Bavaria seemed to live better than those in Baden.

The Socialist Commandant of the Villingen camp, in his farewell speech, wished the Americans a speedy and safe return to their homes and asked them to bear no grievance against Germany and to influence their people to regard Germany not as she had previously been judged, perhaps justly, but as she was at the present time.

During the prisoners' captivity he was paid 60 marks a month by the Germans, of which 54 marks 25 phennigs was retained for food. Many prisoners received money from home thru the Y.M.C.A. and American Red Cross and ran accounts with the Y.M.C.A. and American Red Cross.

Little sickness was experienced among the Americans, altho several had attacks of la grippe. One American Lieutenant died from pneumonia and by paying the German officials the American officers obtained a very decent burial by a Protestant minister.

George W. Hinman
1st Lieut., Air Service

Tours, Dec. 19, 1918

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Information Section[a]
Air Service, First Army
September 12, 1918

Reports Received

Telephone from 2nd Army, 12th September 8:45.

8:45, 10 planes, 1st Pursuit reconnaissance. Great camion activity both ways St. Mihiel-north. Trucks attacked by 1st Pursuit.

2nd Army Reconnaissance. 6:00, Richefort taken, report by 2nd C.A.C. 7:55, St. Baussant's mill taken. 7:55, U.S. troops to Maizerais.

2nd C.A.C. planes reconnaissance. 7:15 to 8:15 St. Mihiel—Varvinay—Lamorville. Little activity in trenches. No circulation on routes. Few men in town of St. Mihiel. One A.A.A. at K 95-57. 300 to 800 meters altitude.

Report from 1st Pursuit, 12th September 8:55. Pilot reported Vigneville [Lavigneville?] on fire. Great ground activity in the vicinity of Spada; not so active of the left flank in the region of Chatillon. Enemy aviation is reported very light; only two planes having been seen up to the time of this report. A transport convoy approximately one kilometer in length was seen moving northeast from St. Mihiel to Savonieres. A balloon south of Montsec and one northeast of St. Mihiel were attacked but were pulled down before material damage could be done. No enemy balloons are in ascension at the time of this report on the west side of the St. Mihiel salient.

Report from French Army Artillery Aviation, 9:00.

At eight o'clock line extended Bois Leirre [?] (1500 meters) east Montsec, Baussant, Lixieres, south Maizerais, Promenade des Moines, Remenauville, without artillery reaction.

Reconnaissance 7:15–8:15 over St. Mihiel, Bois Chanot, Lamorville, at an altitude of 300–800 meters. No enemy artillery reaction. One anti-aircraft battery seen in 57–94. The enemy trenches are deserted, particularly W. of Camp des Romains. French trenches are full of people. A few vehicles seen in St. Mihiel.

Report from 8th Army, 12th September 9:30. Two reconnaissance left sector 8th Army. First at daybreak altitude 300 meters. Nothing seen but smoke at following places—Foret Bezange, Foret Gramecey, Hanitout [?]. Second Rec. made at 6 A.M. 1200 m. altitude. Smoke was gone. No infantry or artillery activity seen. Circulation normal. Four trains seen at Chateau Salins without locomotives. Twelve trucks seen leaving Burthecourt.

From 1st Corps, Time 9:22. Troops progressing rapidly and approaching 1st day's objective. (Note: 1st phase probably meant) Above not yet confirmed by airplane.

Report from G-3, Time 8:00. 155th Regiment is progressing according to schedule. The 156th regiment is meeting machine gun resistance between Redoubt Bois Brule and Apremont—St. Mihiel road.

Report from G-2, Time 10:10, 12th September. From 91st Squadron received at G-2 at 8:35 A.M. Mission just returned. No movements from E to W crossing bridges of Moselle. No troops from Arnaville to Thiaucourt. Town of Pagny shows effects of destructive artillery fire and there is also a big fire there.

Report from Capt. Marshing, 2nd Colonial Corps, Time 8:55. Our troops entering Quart de Reserve at eastern tip of woods. Fighting betwen Essey and Muserais. Troops have reached eastern edge of Bois Rate.

Report from observation post at Franville [?], Time 9:15 A.M. Active circulation on roads from Dampvitoux to Dommartin and from Champs to Dampvitoux. Wagons & troops.

From 2nd Colonial Corps, Time 8:45 A.M. Our infantry has an advance of 1½ Km. Boche are retreating on broad front. First prisoners will arrive soon. No gas shells used. Pagny and Haye balloons blown up. Boche shelling Bois de Four, on right of Promenade des Moines. Allied light artillery went into action and are moving forward.

Report from airdrome at Maulan, 12th September 10:30. Lt. Cooper, Lt. Leonard (Observer), Lt Crawford, Lt. O'Toole (Observer) arrived at this field for duty in connection with airplane liaison.

Report from 2nd CAC, Time 9:00. One reconnaissance at 7:15 to 8:15 over St. Mihiel—Bois Chanot—Lamorville at altitude of from 300 to 800 meters reported no enemy activity, 1 A.A.A. battery was seen at K 57:95. Enemy trenches seem to be deserted opposite which position on the lines seem to be full of troops.

Report from 12th Aero Squadron, Time 9:15. An infantry liaison patrol from 5:50 to 7:30 called for panels from the 5th Division but observed only one panel, which was put out northwest of the Bois de Four. He thinks that belonged to the Division on the left. He saw a barrage fall on the north edge of the Bois de Four. He also observed our troops at the South end of the Bois Saulx. He was attacked by enemy bi-place and received two bullets in his engine.

From 2nd Colonial (Through G-3), Time 8:45. Our infantry had made an advance of 1½ Km. Boche are retreating on a broad front. New gas shell used. Boche shelling Bois de Four. Balloon at Preny up at 7:39 down at 7:44. Balloon Haye now up. On the right of Promenade des Moines, allied light artillery went into action. A number of allied planes over enemy lines. Allied artillery moving forward. Boche are shelling Limey with 150's. Boche are leaving their OP's on extreme right of Promenade des Moines. Boche shrapnel falling on ground Bois Marie. We have a general movement forward. We are doing

more firing on our left. Balloon Marieulles shot down by our battery of the 16th Marines.

From Under Two[b] (Thru G-3), Time 9:10 A.M. Under Two Aeroplane reports fire in railroad yards at Pagny at 7:45. Small body of troops going south of Cheminot at 7:50. All other roads appear empty.

Report from 2nd Colonial Corps, Time 9:50. An aeroplane reconnaissance reports there are very few men in the German trenches in region of St. Mihiel. West of Chauvoncourt the trenches entirely deserted. Another aeroplane reconnaissance being made. No report.

Report from 2nd Colonial Corps (Capt Marching), Time 9:50. French aviation report low circulation and few men in St. Mihiel salient. The 39th Div. of Inf. and 2nd CAC a [?] battalions of the 153rd Regiment have reached the Montsec—Richecourt road at a point 700 meters south from Bois de Lieue. The 156th Regiment is stopped in the Bois Brule redoubt by machine guns. 26th Div. Inf. attack by the Jason Bataillon of the 121st Regiment on the Mari [?] Hill has started at 9 o'clock.

From 8th Army Air Service, Time 11:15. Reconnaissance sent out at dawn and one between 8 and 9 a.m. altitude 1200 M. region Nomeny—Metz—Chateau Saline—Dieuse. No signs of activity on railroad or road. Four trains at Chateau Salins. Considerable smoke from bivouaces in the Nezange Forest and at Gremecey. General outlook calm. No aerial activity whatever.

Report from Fourth Corps Air Service, 12th September, Time 10:45.

The line was 562-348, 568-350, 571-352, 579-355, 582-355, 588-355, 591-354. Trench Moulin was held by enemy. Our troops were lying flat on their stomachs in front of this trench under heavy machine gun fire. A number of tanks were behind them. In other places they seemed to be marching without opposition. A few enemy troops in St. Baussant. 60 enemy prisoners marching into Bois de Sonnard; a column of 50 enemy troops retreating at double time on Essey—Pannes road at 7:00.

Trench de Moulin not occupied by enemy. Between this trench and Pannes—Nonsard Road except for enemy troops and these were occupying scattered shell holes. The bridge over the Rupt de Mad were still good at 7:30. One Salmson down at Seicheprey, one D. H. down at Ansauville. Causes unknown in both cases.

Report from G-2, 12 September 10:47. [Repeat of report at 10:10]

. . . . . .

Report from French Aerial Division, Time 10:50, 12 September 10:55. Reconnaissance patrol probably ending at 10 A.M. General impression of a rapid advance toward Thiaucourt. No enemy planes. French Squadron #13 is bombing objectives on the battle field Thiau-

court area with small isolated bombardment units. At 10:50 A.M. the entire Escadre #12 has just started to bomb Thiaucourt, Beney, St. Benoit.

Report from Balloon 52, 12th September 10:50. Reports received at 9:15 A.M. from liaison officer at D. I. 39. Observatory at Liouville reports combat in direction of Pannes. Essey and Maizerais have been taken by the Americans.

Report from 10th Balloon Co. (Ansauville), 12th September 11:00. All our Balloons and Boche balloons down on account of high winds.

Report from 2nd Balloon Co. (French), 2nd Colonial Corps, Time 10:15 A.M. Line extends to H.8: X.1—Y.0: X.1, Key 325. Reports not confirmed. Troops at H. O. R. 5 on road Montsec to Richecourt.

Report received by G-2 from First Corps, 12 September 11:10. Five enemy Avions patrolling our sector east to west over Fey-en-Haye firing machine guns at our troops.

Telephone Report from G-2, 12th September 11:36. 2nd C.A.C. reported at ten o'clock that Hill 322 North of St. Mihiel has been taken. Patrols entered St. Mihiel and Chauvoncourt.

Report from Fourth Corps, 12th September 11:38. 1st Division P. C. reported at seven hour thirty three minutes two hundred and fifty prisoners and captures outpost line of resistance to point W of St. Baussant. At seven hours forty minutes 1st Division PC reported capture line Hill 230 six and two two naught, nine and further reported at seven hours fifth [?] minutes that sixteenth infantry was entering Quart de Reserve. 1st Division PC further reported at eight hours twenty-two minutes 18th Inf. has entered Joli Bois. 42nd Div. PC reports eight hours seven minutes that its left has crossed the Rupt de Mad east of Maizerais. Also reports one hundred seventy five prisoners confirming order of battle. We are moving 3rd Div. PC forward in Sector of 42d Div.

From Fourth Corps, Time 11:38. Following is report of avion. "I do not believe there is any enemy in Nonsard or Pannes" message incomplete.

From 2nd French Col. Corps, Time 8:04 A.M. Up to now no reaction by hostile artillery on the front of the army corps. The two attacks of 39th Inf. Div. started at H. directed. On the left the 166th Regim. is progressing toward la Ponce. Circulation in the ravine of Marsoupe about 100 persons and vehicles leaving St. Mihiel.

From Groupement Reine, Time 11:15. Apremont taken by 2nd CAC. All of the first day's objectives have been taken by the 2nd CAC. Our line now goes thru Etange de Bailly, N of Xivray, Essey inclusive; N. Euvesin, N. Vieville. The 1st Corps has passed all its first phase objectives; is now just S. of Thiaucourt and have orders to proceed with the rest of the phase objectives.

Report from 91st Squadron, Time 11:10. One of our planes reports that at 9:50 A.M. a number of fires were seen at Thiaucourt all over the town and especially in the southeastern portion. Another plane

Fires at Thiaucourt.

reports several small towns and villages on fire in the same general section. Visibility very bad and hard to get desired information.

From Fifth Corps, Balloon Wing Company B, 12th September 11:40. Cable of Army Balloon #12 broke at 7:15 A.M. Last seen approximately 10,000 feet. Balloon going east. Lieutenants Hinman and Tait in basket, neither one jumped. Les Eparges taken at 8:30. Little visibility. Balloons down on account of high winds.

Report from Cdte. Menard, 12th September 11:50. At 9:50 American troops were at southern edge of Bouillonville and on the plateau south of Thiaucourt. American tanks in woods east of Euvezin being fired at by battery located in the forest of Vencheres. Menard's patrol fired at by machine guns from village of Chauvoncourt on the west flank of the Meuse west of St. Mihiel.

Report from 2nd French Colonial Corps, 12th September 12:25. Report received at 12:25, from 52nd Balloon Company (Boncourt) 9:06. Our advanced elements are in Bois de Madine. Friendly fire lighted in direction Hill 237.8 (Road Montsec—Richecourt). 9:30 Pannes taken. Bois de Madine unoccupied, 9:39. Americans in Bois de Burly apparently waiting for prearranged objective. Headquarters on the left report Hill 322 taken.

Report from First Corps, 12th September 12:29. 92nd Division [should probably be 90th] reports at 9 A.M. Enemy surrendering. Map shows our line about 200 yds south of 1st phase line. Also attack

progressing as per time schedule. Number prisoners coming from Bois du Four. Remarkably few wounded going back. 5th Division reports that they took immediate objective at 6:35 A.M.

Report from Fourth Corps. CG 4th Corps has given [orders] to division to move forward and not stop at H. plus 6 hours. C of S, 1st Corps has been advised.

Report by telephone from 2nd CAC, 12th September 13:00, Les Eparges and Combres have been taken. Breslau trench probably taken. On the right the line is going from southeast of St. Remy to Dommartin.

Report from Observation Wing Headquarters, 12th September 13:10.

9:50 A.M. 500 men going N. between Trench d'Eperon and Trench d'Euvezin. Crossed trench and turned E along trench in two columns. Many prisoners, 626-370 and 100 prisoners were seen at 9:18. Thiaucourt on fire 9:18. Report of reconnaissance N of Thiaucourt of movements to the north. One battery northwest of Beney fired on by observer. One battery going northeast from cars each, one going north at X-8—L-9, and one Northeast P-2—V-9 at 9:20. Infantry liaisons 7:35 and 9:30 pilot Lt. Schnur, Observer Lt. Bowman, Alt. 200 to 500, area Regnieville to Vieville-en-Haye. Troops gave panels as follows, 05, P7, 05, P5, 03, H0, P2, H2, P2, HP, 3P/,H6, P6, H8, P1, H9, P8, Y0, P8, X2, P8, X4, P8. A few allied shells falling in Bois Berard. 5 or 6 large and small tanks stopped around Remenauville. Large number of prisoners seen passing to rear. No enemy planes or balloons seen. No anti-aircraft.

Surveillance 7:00 to 9:10 A.M. 2nd Div. Sect. of Thiaucourt to Limey. Pilot Meissner, Observer Demaur, altitude 400 meters. 8:30 A.M. fire at H5—P2, probably ammunition dump. 8:15 A.M. fire at Thiaucourt. 7:25 A.M. shells falling along line W9, S9, 205, B8. 7:45 explosion W8, P2, 8:00 A.M. shells falling west of Thiaucourt. Infantry lines as noted on map at 8:20, W7, B0 to L9, B6. At 8:10 W9, B6 (One point only noted). At 8:20 the line was seen at W8, P0. barrage line (Not known whether enemy or American). 7:25 W9, S9, to O6, B8. Enemy biplace Halberstadt over Limey. 7:20 American Spad down between Remenauville and Regnieville. Infantry liaison 6:10 to 9:25, 2nd Division Sector, pilot Erwin, Observer Baucom. Enemy surrendered by companies, one company at trenches 365.3-238.5 another company at trenches 364.0-238.3. Third company surrendered at trenches 393.9-239.5. Surrendering noted between 7:30 and 9:00 o'clock.

Two gun battery left behind by enemy at 366.2-239.8. Obs. and pilot fired on officers leaving the battery on horseback, also fired on wagons on the road at 364.5-239.3. One horse had been hit by shell.

Our troops had reached the first phase at 9:10, and there was only

Spad down northwest of Remenauville. Was intact, had red color, and was #24. Observer used 150 rounds of ammunition and pilot 200. Regimental PC and Battalion PC did not show their panels as they should have, however, the advance was very rapid. Dropped four messages at the Division PC and sent one radio message to PC 2nd Div. One enemy plane, type Halberstadt, going over Thiaucourt and towards Pont-a-Mousson. Chased him, but lost him in clouds.

Information received by Observation Wing, A.S. from G-2, 1st Corps, Time 11:10. One thousand Boche moving into Bois woods de Beauville. Two thousand to three thousand Boche entering Dampvitoux. Four railroad trains between Chambley and Dommartin. 45 wagons on Dampvitoux—Chambley Road. Heavy smoke, fires, explosions and shelling in Thiaucourt. Camion trucks north of Marouche [?]. Prisoner said the line to be held was south of Pannes, and if this could not be held, then the Hindenburg line will be held. The 42nd Division is well over the hills north of Maizerais. The Germans have all roads blocked north of Pannes and artillery is on the roads.

Report from 2nd CAC, 12th September 13:30. A plane (infantry liaison) has observed at 10:30 friendly troops passing over the road from Vaux les Palameix to St. Remy. At 12:05 red Bengal lights at 2014. As regards the southern attack the barrage has been pushed forward beyond the ravine of Haye at twelve. Report from Aerial Division, French, rec'd 13:35. At 12:00 uninterrupted circulation of cars going to Vigneulles and coming from Mouilly and from Spada. No fires. Southeast of Lavigneville, some enemy infantry are within quarries. Impression: the enemy seems to prepare its retreat and seems to evacuate its material.

Report from Aerial Division, 12th September 13:50. Interrupted circulation of vehicles going toward Vigneulles and coming from Mouilly and Spada. No fires. To the southeast of Lavigneville enemy infantry seen in the quarries. Impression: It appears that the enemy is preparing to withdraw and evacuate his material.

Report from Balloon Section, 12th September 14:30. Balloon 41 (Jouy-sous-les-Cotes) (Communicated by artillery). Line passed by Nonsard, Montsec, Loupmont.

Report from Fourth Corps, 12th September 13:10. Corps Op reports between two and three thousand enemy troops on Chambley—Dampvitoux road entering Dampvitoux. Brought up in Camions. Four trains of box cars on R.R. between Chambley and Dommartin. One thousand enemy troops moving from Bois Vencheres (369-239) Bois Beauvallon.

Report from First Pursuit Wing, 12th September. Bouillonville and Thiaucourt not occupied in force, no masses of troops. Hindenburg line between Lachaussee and Charey not occupied in force, no masses of troops. Four machines on this reconnaissance, one machine not returned. Altitude 400 meters.

Report from Aerial Division, 12th September 14:50. From 2nd C.A.C. American troops south of Beney at 11:00. Three planes dropped bombs on Conflans, Altitude 400 meters. The station is obstructed with wagons. The planes have shot at trucks in Boncourt, Jeandelize, Olley and along horse-convoy between Mars-la-Tour and Moulotte. Pursuit Spads put a balloon on fire south of Marville Woods. Two planes dropped bombs and shot at convoys and barracks at Vieville, Hattonchatel, St Maurice-sous-les-Cotes.

Report from 2nd CAC, time 15:30. Northern attack: On the Chasseurs a pied Division; we are on the Cote des Boeufs. Southern attack: The attack to the objective of Seuzey has just begun. A message says everything is going all right. 26th D.I. We hold strongly the first line of hill Ste. Marie. West of Paroches the bridges show that the first French lines have gone further than these points. Apremont has been taken by us. On the southern side the line passes through . . . [?] —Tranchee du Bosphore—Tranchee de Madine. Panels have been seen as far as the Battery position 3446. On the right all the objectives have been reached. Strong resistance near Apremont. Our guns arriving at les Eparges.

Report from French Aerial Division, 12th September 14:55. Reports of G.B.9 Escadre 12. Reconnaissance 11:30 to 11:45. The woods included in the square Vigneulles, Heudicourt, Pannes, Beney, are full of enemy troops.

Report from First Pursuit Wing, Time 12:20. Bouillonville and Thiaucourt not occupied, no masses of troops. Hindenburg line between Lachaussee and Charey not occupied in force. No masses of troops. Four machines on this reconnaissance, one machine not returned. Altitude 400 meters.

Report from French GS-2, Time 12:55. A bombing mission this morning at ten has bombed Fresnes-en-Woevre. Maizeray, Pareid (altitude 600 meters). No ground activity—impression of emptiness of Vigneulles and Combres. The planes were shot at by machine gun fire over Vigneulles but no anti-aircraft guns. A German plane was making a reglage in the area. The main road Vigneulles, Hattonchatel, is absolutely empty.

Report from U.S. Army Observation Squadron, 12th September 15:30.

Reconnaissance from St. Mihiel—Etain—Briey—Doncourt—Gorze—Pagny—Pont-a-Mousson at an altitude of 1000 meters, time 12:15 to 14:15 P.M.

One train of general service wagons 2 km long west of Fleville (west of Briey) going west at 13:20. One general service train 2 km long on north side of road east of Bayonville at 13:38, standing, but indicating that they were going west. New material and intense activity at dumps south of Gondrecourt at 13:20. Great activity at large dump south of Valleroy, engines running around quite a number of cars in the

yards. A lot of material being removed from the cars to the north side of the railroad track. On air drome west of Briey (Lantefontaine) there were several large planes of dark steel blue color, probably bombers. In the valley of the Moselle there was no movement, on the bridges of the Moselle there was nothing. 100 wagons, part to north side of Fleville at 13:30. 30 large motor trucks going west to Mouaville at 13:25 from Fleville. 35 general service wagons going north from Gorze at 13:35. 20 large general service wagons, part west of Gorze at 13:37. Two general service wagons in Pagny from the west at 13:40. Some activity reported at Chatrieze [?]. Practically no train movement seen. Were unable to observe on the east side of the Moselle. Very slight anti-aircraft activity.

Report from French Aerial Division, 12th September 17:00. At 14:10 bombing of Vigneulles and Chaillon, at height of 300 meters. Great activity in Chaillon. At 14:20 convoy from Heudicourt to Vigneulles and convoy from Vigneulles to Fresnes.

Report from Independent Force, R.A.F., 12th September 17:25. Bomb raid this morning report considerable movement of all kinds towards SE along road leading SE from Metz. Train movement only three trains seen. One moving NW from Sanry SE Courcelles and two moving NW from Han-sur-Neid SE of Remilly.

Report from Chief of Staff, First Army, 12th September 17:20.

The Army Commander desired me to inform you that he has authorized the 4th American Corps to push its attack this date to the First Phase, second day line, with the proviso that the line of the First Day Objective will be held for defence. This order will carry the left of the 4th Corps through the woods of Belle Oziere and through the Bois de Gargantua.

The Army Commander therefore directs that the 39th Division conform to the attack of the 4th Corps and that the 39th Division carry its right forward to the line of the First Phase, Second day, as indicated in the Field Orders of these Headquarters. Please inform me if this order is not clear.

12th September 18:55. The French have taken Bois de Boulogne. Heaby [?] advance toward Fouquets. Great destruction of Champagne.

Report from First Corps, 12th September 19:10. Five enemy avions patrolling our sector east to west over Fey-en-Haye firing machine guns at our troops.

Report from First Pursuit Group, 12th September. First Pursuit Group reports at 18:36 o'clock that road Vigneulles to Chambley has been filled since 14:00 with transportation moving northeast.

Report from Independent Force, R.A.F., 12th September. Following summary of Bombing Operations. Night of Sept. 11th and 12th. No work was possible. Day. Sept. 12th. One reconnaissance machine descended to 1500 feet over Metz and flew along towards St. Mihiel. He observed what appeared to be our shells bursting on approximate line: Chambley, Vilcey, south of Thiaucourt to Apremont. A big fire

was seen in Thiaucourt. The time was about 10:15 A.M. Several attempts were made to bomb the railways at Metz and Courcelles, but the majority of pilots failed to reach their objectives, owing to clouds and strong wind. Two machines succeeded in reaching Courcelles, and dropped 4 bombs, obtaining two direct hits on the railway track. Considerable road movement southeast, along roads leading SE from Metz. Train movements very slight. In the afternoon, bombs were dropped from 2000 feet on Verny which was full of Germans. One direct hit on village. One direct hit on railway track, west of the village. Total flying time for the day: 55 hours, 50 minutes. Total machines wrecked: 3.

Report from 2nd CAC, 13 [12] September 18:00. St. Mihiel and Vigneulles are in flames, nearly all the villages beyond Fresnes and Thiaucourt are in flames. Beginning of fire in the direction of Conflans. The station of Conflans is very much lit up and seems to be very active. Impossible to observe the circulation on the roads on account of the fog.

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Headquarters, Air Service, First Army
American Expeditionary Forces

Operations Report 12, 17:00 Sept. 11th. 17:00 Sept 12th. 1918.

1. Atmospheric Conditions. Low clouds with intermittent rain and heavy wind storms throughout the day.

2. Enemy Aerial Activity. A number of patrols of Fokker bi-planes were encountered during the course of the day, but in practically every case, enemy anti-aircraft was working in close proximity to the front lines.

A few enemy balloons were in ascension during the early hours of the morning, but weather conditions were unfavorable in the afternoon for balloon observation.

3. Activity of Our Own Aviation.

(a) Pursuit. In spite of adverse weather conditions Pursuit Aviation played a very large part in the attack, carrying out a considerable number of visual reconnaissance missions.

The First Pursuit Group carried out an important mission over the line from Montsec to St. Mihiel, reporting considerable transport movement north-east from St. Mihiel. This mission also attacked two enemy balloons without apparent results.

A late evening reconnaissance by the First Pursuit Group reported a very heavy concentration of enemy artillery moving north-east on the road from Creue to Vigneulles. Pilot descended to an altitude of 10 meters, firing a considerable number of rounds into the enemy columns, causing great confusion.

Lieutenants Cox and Doolidge [D'Olive] of the Third Pursuit Group attacked a Fokker mono-plane in the region of Euvezin, forcing the enemy plane down to 300 meters, apparently out of control. Combat was broken off at this point on account of enemy machine gun fire from the ground.

A patrol from the Second Pursuit Group fired 100 rounds at an enemy Rumpler plane in the region of Pont-a-Mousson after which the enemy plane fell, apparently out of control.

Another patrol by the Third Pursuit Group bombed and machine-gunned enemy troops retreating from Vigneulles and Chambley. A number of direct hits were observed, and 4 camions were destroyed by bombs dropped from these Pursuit planes. Many explosions were also observed.

The French Aerial Division reported a total of 36 patrols in the course of the day over the territory Conflans, Vigneulles, St. Remy, Dommartin, Pannes, Beney. A number of machine gun attacks were made on convoys of troops at Doncourt, Jaulny and Olley, and one balloon to the east of Camerville was burned.

In addition to the above, a total of 13120 Kgs. of Bombs were dropped on dumps, railroads, troop concentrations, etc., during the course of the day.

(b) Observation. A great number of valuable visual reconnaissance missions were made by all units during the course of the day, and information of the progress of the attack, and the location of the front lines was reported in spite of very low flying clouds, and extremely adverse weather conditions.

A reconnaissance by planes of the Second Colonial Corps from 7:15 to 8:15, reported activity extremely light in the territory adjacent to St. Mihiel.

Later reconnaissance missions by the 1st and 4th Corps indicated the progress of the attack, reporting in minute detail, the location of the front lines.

During the course of one of these missions, a convoy of artillery was sighted after which the plane dropped a message on Artillery P.C. which succeeded in registering on the convoy, and inflicted material damage.

During the course of the afternoon, the attack was again followed by planes which reported the progress of the attack, and the most vulnerable spots for bombardment.

A special mission over the line Lironville, Limey, Bouillonville, Thiaucourt was made at 9:30 by Major Brereton, Corps Observation Wing Commander, with Captain Valois, liaison officer as observer. Many observations were made in the region of Thiaucourt concerning the progress of the attack. While circling over Thiaucourt, this plane was attacked by four Fokker bi-planes. The jamming of the machine gun of the observer forced the plane to land at which time it was wrecked by

striking barbed-wire entanglements. The observer was found to be shot in the face, but neither the pilot or the observer were injured in the crash.

(c) Bombardment. In addition to the bombs dropped by the French Aerial Division, the American Day Bombardment Group carried out two successful missions, dropping a total of 7 tons of bombs on enemy troop concentrations, and railroad stations.

The Independent Force, R.A.F., made seven attempts to bomb Metz and Courcelles. Most of them were unsuccessful on account of unfavorable weather conditions. Two machines however were able to reach the railroad station at Courcelles, and four bombs were dropped, each registering direct hits. Bombs were also dropped on St. Very and Woinville at which places considerable concentrations of enemy troops had been observed.

Miscellaneous. The enemy balloon at Marieulles was reported burned at 7:45.

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Headquarters, Air Service, First Army
American Expeditionary Forces

Operations Report Number 13, 19:00 September 11th-19:00 Sept. 12th. 1918

1. Atmospheric Conditions. Low clouds with strong winds and heavy rainstorms rendering flying conditions extremely difficult and causing broken propellers due to the rain and accidents to shifts [?] due to very muddy aviation fields. These conditions continued throughout the day.

2. Enemy Aerial Aviation. The enemy deployed all of his available aviation which was not able to make any impression against our aerial forces. His pursuit squadrons maneuvered in large patrols in close proximity to his A.A.A. It was difficult to destroy them completely due to the very low clouds and rain-storms. A.A.A. was very active. Our low flying airplanes which attacked enemy troops throughout the day were fired upon repeatedly by the enemy's ground defenses. A few balloons were in ascension during the early hours of the morning but were quickly attacked and driven down.

Activity of our Own Aviation.

(a) Pursuit. In spite of the adverse weather conditions pursuit aviation played a very large part in the general attacking of everything in

the air and troops and convoys on the roads. These were attacked by machine guns and bombs.

The 1st Pursuit Group reported a heavy concentration of enemy artillery moving N.E. on the road from Creue to Vigneulles; pilots descended to an alt. of 10 m. firing a large number of rounds into the enemy columns causing considerable damage and great confusion.

A patrol of the 3rd Pursuit Group equipped with small bombs, machine gunned and bombed enemy troops retreating from Vigneulles to Chambley. Considerable material damage reported result of this operation.

The Day Bombing Group carried out successful missions dropping several tons of bombs on enemy troop concentrations and railroad stations with excellent results.

French Aerial Division. Carried out successful patrols over the territory—Conflans—Vigneulles—St. Remy—Dommartin—Pannes—Beney, obtaining valuable information. The two brigades of this division patrolling along the axes of their sectors were in perfect liaison throughout the day. Attacks were made on convoys and troops at Doncourt, Jaulny and Olley. These missions were carried out under great difficulties it being necessary to fly through the barrage to accomplish them. One enemy balloon was shot down in flames.

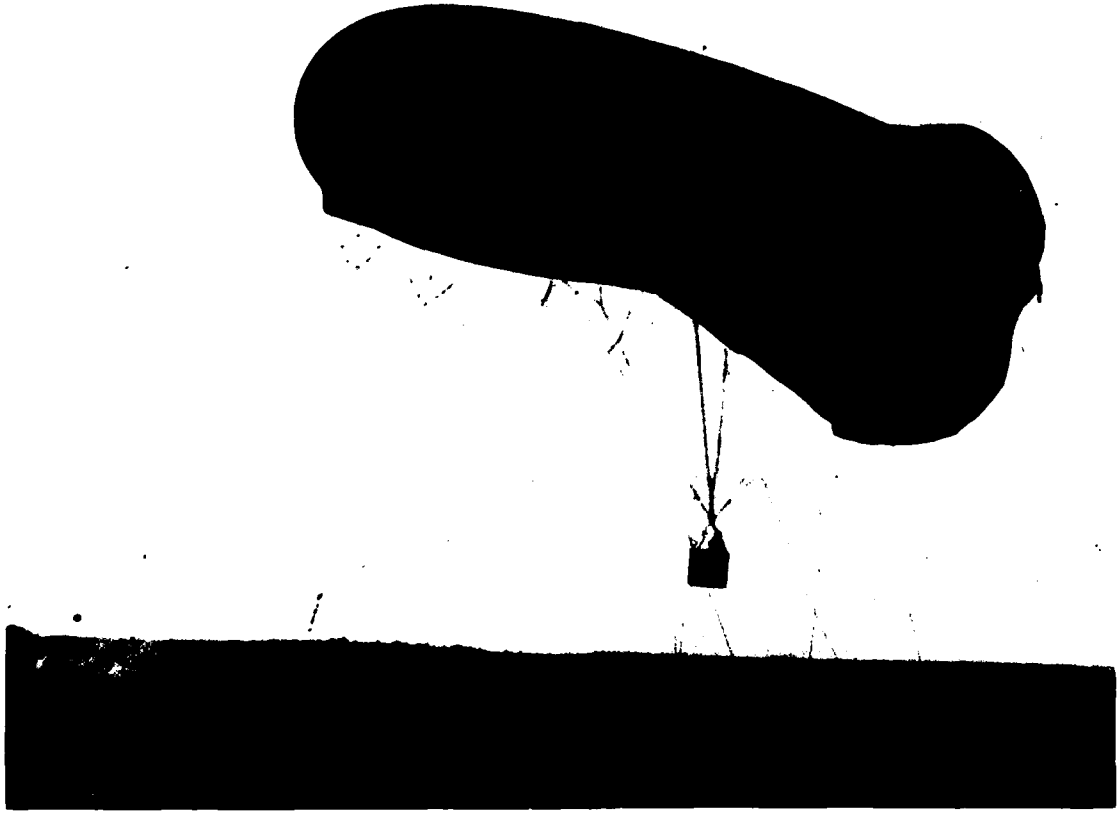
The Day Bombardment Division of this Division dropped 13,120 Kgs. of bombs on dumps, railroads and troop concentrations during the course of the day, and fired 19,025 rounds of ammunition at convoys, etc.

(b) Observation. Many successful visual reconnaissances were carried out during the course of the day. Information of the progress of the attack was reported regularly in spite of the adverse weather conditions which necessitated low liaison through the barrage. Accurate location of the front line was obtained. Reconnaissances of the 1st and 4th Corps located large convoys of enemy artillery and regulated fire of our artillery which inflicted material damage. A special mission in the region of Limey—Bouillonville—Thiaucourt was made by the Corps Observation Wing Commander (Major Brereton) with Captain Valois (Liaison Officer) as observer. Many observations of the progress of the attack were made. The information gained enabled the Wing Commander to employ his Wing very successfully in later reconnaissances. While maneuvering over Thiaucourt they were attacked by four Fokker E.A.'s. The jamming of the observer's gun forced them to land. The machine was crashed by striking wire entanglements.

The Heavy Artillery Observation made twelve sorties for the adjustment of fire in the East Moselle Grouping. There were combats and two pilots and two observers are missing. The adjustments were not carried out.

The Independent force R.A.F. made bombing raids on Metz and Courcelles. Bombs were dropped on the railroad station at Courcelles. Four direct hits were made.

(c) Balloons. In spite of the terrible weather conditions 12 ascensions and one successful adjustment were made.



Balloon ascension.

Operations Report No. 13 (Cont'd)

Airplanes		Fr Aerial Div.	1st Pursuit Group	1st Pursuit Wing	Day Bombing Group	Fr. Night Bombing Group	Army Obs. Group	Heavy Art. Obs. Group	Army Observation Group			
									1st	4th	5th	2nd Fr. C.A.C.
Sorties		235	48	177	10		13	8	31	82	21	17
Trials				11			1				5	
Combats			2	5					4			
Pilots	On Roll	628	80	244	21		34	44	69	51	57	41
	Available	485	76	223	19	28	34	40	58	50	28	35
	Missing	9	2	5	1					3		
	Wounded											
	Killed											
Observers	On Roll	322			24		28	23	57	42	46	27
	Available	229			22	36	27	20	46	32	43	21
	Missing	6			1					3		
	Wounded											
	Killed											
Enemy Planes	Con.											
	Uncon.			2								
Planes	Total	513	96	276	55		46	42	70	73	70	37
	Available	333	64	170	32	33	35	34	54	64	38	30
	Crashed											
Total Hours	Flying		50:33	254:44	15:20		12:45		36:30	65:00	18:10	
	Service		50:33	240:30	15:20		7:20		36:30	65:00	11:00	34:00
Exercises												
Target Practice												
Alerts										6		
Patrols		36	13	21								
Protections									1			
Voluntary Patrol			1									
Recon-naissances	Visual						7		18	3	6	6
	Photo								2	1		
	Night											

Plates	Suc.															
Taken	Unsuc															
Adjustments											8		1			
Rounds	Fired															
	Observed															
Cartridges Fired																
Infantry Liaison													6	19	6	7
Special Missions				6											4	
Ferry Flights																
Bombing Raids						2										
	50 Kg.															
	20 Kg.	656				308										
	10 Kg.			34												
Bombs Dropped	Kilos															
	Cartridges fired															

7150

Balloons		American	French
Ascensions		12	0
Hours of Flight		15:18	
Adjustments		1	
Rounds	Fired	17	
	Observed	14	

William Mitchell
Colonel, A.S., U.S.A.
Chief of Air Service, First Army

By Thomas S. Bowen
Major, A.S., U.S.A.
Operations Officer.

Plane Situation, First Army
Sept 12, 1918

Location	Group	Squadron	On hand yesterday	Lost	Received	On hand to-day	Due on Order	Available for duty	Type	Spad 13	Salmson 4	DH 4s B	DH 4s Ob.	Breg. B	Breg. Ob.
Toul	2nd Pursuit Group	13	25	0	0	25	0		Spad	25					
		22	24	0	0	24	1			24					
		49	25	0	0	25	0			25					
		139	25	0	0	25	0			25					
	1st Corps Observation	1	23	0	0	23	1		Salmson		23				
		12	22	0	0	22	2		Salmson		22				
Gondreville	Army Observation Group	24	24	0	0	24	0				24				
		91	24	0	0	24	2				24				
Vaucouleurs Field No. 1	3rd Pursuit Group	28	25	0	0	25	0		Spad	25					
		93	25	0	0	25	0			25					
		103	25	0	0	25	0			25					
		213	25	0	0	25	0			25					
Ourches	4th Corps Observation Group	8	24	0	0	24	0		DH 4				24		
		90	24	0	0	24	0		Salmson		24				
		135	24	0	0	24	0		DH 4				24		
Amanty	Night Recon. Day Bombing	9	18	0	0	18	7		Breg						18
		96	19	0	0	19	0							19	
Bicqueley	1st Corps Observation Group French														
Souilly	5th Corps Observation Group	50	20	4	0	16	8		DH 4's				16		
		99	24	0	0	24	0		Salmson		24				
		104	24	0	0	24	0				24				

Rembercourt	1st Pursuit (216th Park) (Flight C, 648 Supply)	27	25	0	0	25	0	20	Spad	25					
		94	25	0	0	25	0	20		25					
		95	25	0	0	25	0	21		25					
		147	25	0	0	25	0	17		25					
		11	21	0	0	21	0		DH 4's			21			
		20	23	0	0	23	2					23			
			613	4	0	609	23			299	165	44	64	19	18

Airplane Gas and Oil Report
Air Service First Army
Date Sept 12, 1918

Report from Equipment Department.

Station	Kind	Gallons on Hand yesterday	Gallons Delivered	Gallons Received	Gallons on hand today
First Air Depot	Fighting Spirits	471		3,679	4,150
	Gasoline	58,723	6,133	5,334	57,924
	Castor Oil	24,781			24,781
	BB Oil	18,353	1	2,000	20,352
Rembercourt	Fighting Spirits	3,721			3,721
	Gasoline	50,402			50,402
	Castor Oil	7,733			7,733
	BB Oil	36			36
Souilly	Gasoline	6,000			6,000
	Castor Oil	9,000			9,000
Toul	Gasoline	11,627	346	2,030	13,310
	Castor Oil	30			30
	Fighting Spirits	747			747
Mobile Park No. 1	Fighting Spirits	5,386			5,386
	Gasoline	16,905			16,905
	Castor Oil	4,550			4,550

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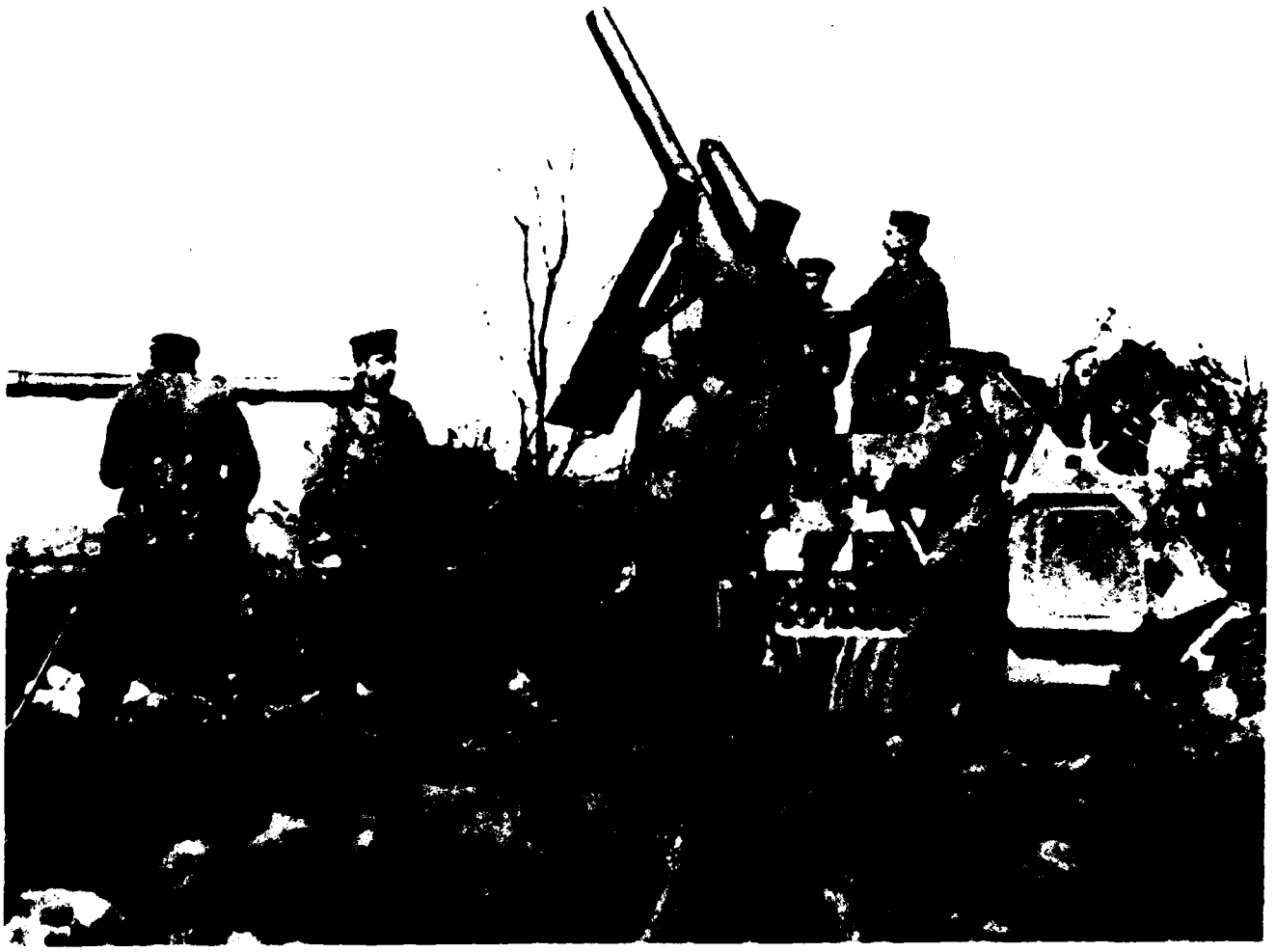
Air Service
First Army

Hostile Movements, Changes and Conduct

September 12th—The enemy employed all of his available aviation, which was not able to make any impression against our aerial forces. His pursuit squadrons maneuvered in large patrols in close proximity to his anti-aircraft artillery, which was very active. Our low flying airplanes attacked enemy troops throughout the day and were fired upon repeatedly by enemy ground defenses. A few enemy balloons were in ascension during the early hours of the morning, but were quickly attacked and driven down.



German anti-aircraft battery used against Allied balloons.

13 September 1918

Learning late on the afternoon of 12 September that roads leading out of the salient were filled with enemy troops in retreat, Pershing ordered the 1st and 26th Divisions to push forward and close the gap between them. The 26th reached Vigneulles in the middle of the night, and the 1st arrived early in the morning, sealing off the lower part of the salient. During the day, American and French forces continued to advance, and by evening the line was, for the most part, along the final objectives for the offensive—north of Pont-a-Mousson, through Thiaucourt and Vigneulles, to les Eparges. Pershing felt that if he had immediately continued the advance, his forces no doubt could have gone well beyond the Hindenburg Line and perhaps even as far as Metz. But that would have delayed the next offensive, the Meuse-Argonne Campaign, to which he was committed.

Orders

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First Army, A.E.F.
Ligny-en-Barrois, September 12, 1918

Field Orders
No. 10

1. The First Army, A.E.F., has defeated the enemy, causing him heavy losses in men, material and morale. All of our divisions have reached their assigned objectives today and several have progressed a considerable distance beyond these objectives. The IV and V Corps are moving this night to gain contact with each other in the vicinity of Vigneulles.

2. The attack will continue tomorrow, with a view to completing the hostile defeat and gathering the booty.

. . . . . .

4. The air service will continue its reconnaissance and bombing plan as approved by these headquarters and announced in Field Orders No. 9, these headquarters.

. . . . . .

By command of General Pershing:

H. A. Drum
Chief of Staff

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Headquarters Air Service, First Army
American Expeditionary Forces
September 12th, 1918

Battle Orders No. 2.

1. To-day's operations of the 1st Army have been entirely successful. The enemy has lost very heavily in artillery material and personnel. It is reported that 7,000 prisoners have been taken. His aviation has been completely dominated by ours, which has destroyed, or driven him back wherever found, and it has attacked his troops on the ground with machine guns and bombs along all his lines of retreat.

2. The Army will continue the attack of the enemy along the whole front. The front of our army extends along the line Fey-en-Haye—Jaulny—Thiaucourt—Beney—Nonsard—Richecourt—Apremont—St. Mihiel—Spada—Dommartin—St. Remy—Combres.

3. Our air service will take the offensive at all points with the object of destroying the enemy's air service, attack his troops on the ground and protect our own air and ground troops.

4. (a) The missions of the corps air services will be the same as in "a", Battle Orders No. 1.

(b) The missions of the Army Observations Group (Reynolds) will be the same as in "b", Battle Orders No. 1.

(c) The missions of the Army Artillery Group (Bloch) will be the same as in "c", Battle Orders No. 1.

(d) The 1st Pursuit Wing (Atkinson) will cover the front to a depth of 5 kilometers from the right of the 1st Army to the line St. Mihiel—Vigneulles—Lachaussee. The general mission will be the same as prescribed in "d", Battle Orders No. 1. After 9:00 A.M. one pursuit group loaded with bombs will be held in reserve to be used for the attack of hostile troops or convoys on the ground. It must be ready to leave the ground 15 minutes after the receipt of the order.

The First Bombardment Group (Dunsworth) will be held in reserve to attack hostile formations along the road Vigneulles—Haumont—Lachaussee. Thei. time of departure will be given on the morning of the 13th.

The right flank of the 1st Pursuit Wing will be protected by the 1st brigade (French Aerial Division) and the aerial defense of the 8th French Army.

Close liaison will be maintained by the 1st Pursuit Wing (Atkinson) with both of these and with the Army Corps so as to keep close track of the advance of the troops.

(e) The 1st Pursuit Group (Hartney) will cover the same front and have the same missions as prescribed in Battle Orders No. 1.

The 2nd Brigade (Aerial Division) will detail one pursuit group to act with the 2nd French Army and protect the left flank of the 1st Army, in addition to its other duties. Close liaison will be kept with the 2nd French Army and with the Corps air services so as to keep track of the advance of the troops.

(f) The Army Night Bombing and Reconnaissance Wing (Villome) will execute the night reconnaissance as directed in the schedule provided for. Up to 11:00 o'clock P.M., Vigneulles will be bombarded, after that Dampvitoux and Lachaussee.

(g) The French Air Division (Vaulgrenant) will fulfill the same general missions as prescribed in "g", Battle Orders No. 1. The two Brigades will operate along the same axes on each side of the salient. Bombardment Aviation will concentrate its efforts along the lines Dampvitoux—Chambley—Mars-la-Tour—Jonville, and from this angle north to Conflans, east to Rezonville and the Moselle River. Attacks will be made against the enemy's ground troops wherever the opportunity offers.

Provision will be made for the guarding of the 1st Army's right flank and one pursuit group will be placed at the disposition of the French 2nd Army. Close liaison will be maintained by radio and courier airplanes with the Corps Air Services so as to insure the air Divisions close co-operation in the attack of the ground troops.

5. The Equipment Section will hold itself ready to insure the supply and movement of any units required.

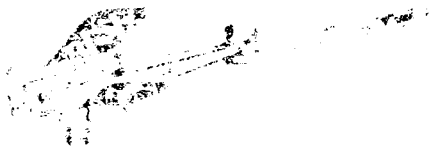
6. The Army dropping ground for messages and the Army Landing Ground remain the same as in paragraph 6, Battle Orders No. 1. The 1st Day Bombardment Group will provide a Detail of four command airplanes to take station at Maulan beginning at 7.00 A.M., September 13th.

7. Reports will reach the Chief of Air Service at Headquarters, Air Service, First Army, Ligny-en-Barrois.

A liaison officer from each Corps Air Service, each wing or independent group of the Army Air Service and the French Aerial Division, will report at the Headquarters, C.A.S. 1st Army at 21.00 H. each day to receive orders.

A liaison officer for the Night Bombardment Wing (Villome) will report at the Headquarters, C.A.S., 1st Corps, at 14.00 H. each day to receive orders.

Wm. Mitchell



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Headquarters Air Service
First Army
September 13, 1918

(Not to be taken on Flights)

Army Dropping Point for Messages via Airplane

1. A dropping ground for important messages delivered by airplane for the 2nd French Army has been established about 1 km. Northwest of the village of Laheycourt. The village of Laheycourt lies 21 km. Northwest of Bar-le-Duc.
2. This dropping ground is marked with a large WHITE ARROW. The field on which the arrow is placed is not suitable for landing, except in emergency.
3. The nearest landing field is the airdrome at Sommeilles, which is located 5 km. West of Laheycourt on the Sommeilles—Laheycourt Highway.
4. An American aviation liaison officer is on duty in the aviation office at Laheycourt.

By order of Colonel Mitchell:

T. DeW. Milling
Colonel, A.S. U.S.A.
Chief of Staff

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First Pursuit Group
Operations Office
Sept. 12th, 1918

Operations Order
Number 122

1. The following schedule of hours is announced as tentative for tomorrow, Sept. 13, 1918.

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to St. Mihiel
95th	6 h 15 to 7 h 45, 11 h 15 to 12 h 45, 15 h 00 to 16 h 30
147th	7 h 30 to 9 h 00, 12 h 30 to 14 h 00, 16 h 15 to 17 h 30
27th	8 h 45 to 10 h 15, 13 h 45 to 15 h 15, 17 h 15 to 18 h 30
94th	10 h 00 to 11 h 30.

2. Squadrons will have orders issued about midnight this date which may change the mission for tomorrow, but the order of duty of the Squadrons as mentioned above will undoubtedly hold good.
3. Rain or shine pilots must be immediately available at hours named above unless relieving orders to the contrary are issued.

By order of Major Hartney

Romer Shawhan
1st Lt. A.S.S.C.
Group Operations Officer

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First Pursuit Group
Operations Office
Sept. 12th, 1918

Operations Order
Number 123.

1. The following schedule of operations is announced as effective for tomorrow Sept. 13th, 1918, cancelling Operations Order #122.

2. The 1st Army will aim at their new objectives throughout the day, and the Air Service will be on the offensive along the entire line of the sector which will be Chatillon-sous-les-Cotes to St. Mihiel, both included. The object being to destroy all enemy air service, to attack his troops on the ground where ordered, and to protect our planes and ground troops.

3. This Group will maintain a barrage against hostile aviation: observation aviation will be protected and hostile balloons will be attacked opposite the front of the 5th Corps.

4. The following patrols will be maintained throughout the day.

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to St. Mihiel.
95th	6 h 15 to 7 h 45, 11 h 15 to 12 h 45, 15 h 00 to 16 h 30
147th	7 h 30 to 9 h 00, 12 h 30 to 14 h 00, 16 h 15 to 17 h 30
27th	8 h 45 to 10 h 15, 13 h 45 to 15 h 15, 17 h 15 to 18 h 30
94th	10 h 00 to 11 h 30.

5. Each patrol will consist of two echelons of four (4) planes each, the Patrols of the lower echelon will operate from an altitude of 2500 to 3500 meters, and the patrol of the upper echelon from an altitude of 3500 to 5500 meters.

6. In addition to the above a mobile reserve of one flight will be maintained throughout the day commencing at 9 h 00. The 94th Squadron will hold its flight on alert while the 27th is on patrol and vice versa, and the 95th Squadron will hold its flight on alert while the 147th is on patrol and vice verse.

7. These orders may be cancelled and new ones issued after 10 h 00 according to the exigencies of the moment.

8. Squadrons will report for liaison duty at this office at 10 h 00 and will receive instructions as to localities to assume. At least one officer and transportation will be furnished by the Squadrons, and upon completion of their mission a written report will be rendered to the Group Operations.

9. Hereafter before schedule patrols leave this airdrome the designated patrol leaders will visit the Group Operations to receive information and instructions that may be of assistance to the intelligent execution of the patrol.

10. Pilots must do their utmost to observe all activity on the ground reporting any interesting items immediately upon returning to the field for transmittal to the intelligence, C.A.S., 1st Army.

11. Attention is called to operations order #110 Paragraph 4.

Romer Shawhan
1st Lt. A.S.S.C.
Group Operations Officer

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First Pursuit Group
Air Service
American E.F.
Sept. 13, 1918

Operations Order
Number 124

1. With the improved weather conditions, squadrons will abandon low flying and straffing and will resume patrol of two echelons. The lowest from 2500 to 3500 and the highest from 3500 to 5500.
2. The primary object now will be protection of our own observation machines, a defensive barrage against the enemy machines, and the offensive destruction of enemy machines, and observation of infantry and artillery activities.

By order of Major Hartney

Romer Shawhan
1st Lt. A.S.S.C.
Group Operations Officer

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Headquarters
27th Aero Squadron
Operations Office
Sept. 12, 1918

Operations Order
Number 123.

1. The following schedule of hours is announced as tentative for tomorrow Sept. 13, 1918, for this squadron

MISSION	REGION	FLIGHT
Patrol	Chatillon-sous-les-Cotes to St. Mihiel	
Time	8 h 45 to 10 h 15. 13 h 45 to 15 h 15. 17 h 15 to 18 h 30.	

2. All pilots will report in the Operations Office at 7 h 40. Those who will go on the first patrol will be selected at that time, regardless of weather conditions.

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95th Aero Squadron
September 13, 1918

Operations Order
Number 100.

MISSION	REGION	
Patrol	Chatillon-sous-les-Cotes to St. Mihiel	
	6 h 15 to 7 h 45	Third Flight.
	11 h 15 to 12 h 45	Second Flight.
	15 h 00 to 16 h 30	First Flight.

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95th Aero Squadron
September 13, 1918

Operations Order
Number 101.

The following schedule of operations cancells Operations Order No. 100.

Alerts.	
12 h 30 to 14 h 00	Third flight
16 h 15 to 17 h 30	Second flight

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Headquarters, First Pursuit Wing
Air Service, American E.F.
September 13th, 1918

Operations Order
Number 13.

1. Information of the enemy:

(A) At 18 h 00 September 12th our infantry gained the following positions along the sector of the wing: St. Mihiel, Apremont, le Mont, Montsec, Lamarche, Beney, Jaulny, Norroy. East of the Moselle River, no substantial change.

(B) The enemy pursuit air service succeeded in attacking many of our Corps Observation and Infantry Liaison missions between the line, Remenauville--Jaulny and the Moselle River.

2. Plan of Operations: The Army will continue the attack along the entire front. A double tier of pursuit patrols will be maintained

continuously over both the eastern and western sectors of the Wing throughout the day. The purpose of this barrage is to create an area, 5 kilometers in front of our advancing lines in which it will be safe for our Army Corps Observation Aviation to work. The lower tier of the barrage will be between 2500 and 3500 meters and the upper tier will be above 3500 meters. Enemy balloons will be attacked. The Day Bombardment aviation will attack enemy elements on the ground.

3. The First Pursuit Wing

(A) The sector of the Wing is between the line St. Mihiel—Lachaussee and the line Nancy—Solgne.

(B) The western sector of the wing is between the line St. Mihiel, Lachaussee, to the line, Flirey, Arnaville.

(C) The eastern sector of the wing is from the line, Flirey—Arnaville, to the line, Nancy—Solgne

1. The Second Pursuit Group will maintain a double tier barrage over the eastern sector of the wing from day-break to dark.

The 11th and 20th Aero Squadrons, First Day Bombardment Group, less 4 planes, will be subject to the orders of the Group Commander, 2nd Pursuit Group for cooperation in the barrage patrols of the sector assigned to that Group.

2. The Second Pursuit Group: will provide such protection as the Army Observation Group may require.

The Second Pursuit Group: will attack every enemy balloon appearing in ascension and in the sector assigned to the group.

3. The Third Pursuit Group: The entire 3rd Pursuit Group will be on alert from 9 h 00, to be used for the attack of hostile troops or convoys on the ground. It must be ready to leave the ground 15 minutes after receipt of the order.

G. C. 16: will maintain a double tier barrage of the western sector in the wing from day-break until dark.

G. C. 16: will attack every enemy balloon appearing in ascension in the sector assigned to that group.

4. First Day Bombardment Group: The 96th Aero Squadron will be held in reserve after 8 h 00 to attack hostile formations along the road, Vigneulles—Haumont—Lachaussee

The 11th and 26th Aero Squadrons, less 4 planes to be used in accordance with Paragraph 6, Battle Orders No. 2, cs, Headquarters, Air Service, 1st Army, will be placed subject to the orders of the Group Commander, 2nd Pursuit Group for cooperation in the barrage patrols of the sector assigned to that Group.

By order of Lieutenant Colonel Atkinson,

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

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Headquarters
2nd Pursuit Group 1st Pursuit Wing
Operations Office
September 13, 1918

Operations Order
No. 54

1. The sector of the 2nd Pursuit Group is from the line Fleury—Arnaville to the line Nancy—Solgne.

2. At 18 H September 12th our Infantry gained the following positions along the sector of the wing St. Mihiel, Apremont, le Mont, Montsec, Lamarche, Beney, Jaulny, Norroy. East of the Moselle River, no substantial patrol leaves to ascertain if there has been any change in the line of battle.

3. Mission.

a) To attack or force to the ground every enemy balloon in the Sector assigned.

b) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our army corps observation aviation to work.

c) To prevent all enemy reconnaissance either visual or photographs.

4. All patrols 2500-3500 meters will be made along the line five to seven kilometers in advance of the line of battle. All patrols of 3500-5500 will be made along the line six or nine kilometers in advance of the line of battle.

All patrols at 2500-3500 meters will be responsible for the execution of *mission "A"*.

5. Whenever possible two D-H planes from the 11th Squadron or 20th squadron will be a part of the patrols.

6. The following schedule will be in effect September 13th, 1918.

13th Squadron

5:30- 7:15	Patrol 5 planes along sector alt. 2500-3500
8:30-10:15	Patrol 5 planes along sector altitude 3500-5500
11:30-13:15	Patrol 5 planes along sector altitude 2500-3500
14:45-16:30	Patrol 5 planes along sector altitude 3500-5500
17:45-19:30	Patrol 5 planes along sector altitude 2500-3500

22nd Squadron

One protection patrol. (If required) Time and details of mission to be furnished later.

7:00- 8:45	Patrol 5 planes along sector alt. 3500-5500
10:00-11:45	Patrol 5 planes along sector alt. 2500-3500
13:15-15:00	Patrol 5 planes along sector alt. 3500-5500
16:15-18:00	Patrol 5 planes along sector alt. 2500-3500

49th Squadron

One protection patrol. (If required) Time and details of mission to be furnished later.

6:45- 8:30	Patrol 5 planes along sector alt. 2500-3500
9:55-11:40	Patrol 5 planes along sector alt. 3500-5500
13:00-14:45	Patrol 5 planes along sector alt. 3500-5500
16:10-17:55	Patrol 5 planes along sector alt. 3500-5500

139th Squadron

5:30- 7:15	Patrol 5 planes along sector alt. 3500-5500
8:15-10:00	Patrol 5 planes along sector alt. 2500-3500
11:45-13:30	Patrol 5 planes along sector alt. 3500-5500
14:30-16:15	Patrol 5 planes along sector alt. 2500-3500
17:40-19:25	Patrol 5 planes along sector alt. 3500-5500

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

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Headquarters
2nd Pursuit Group 1st Pursuit Wing
Operations Office

September 13, 1918

Operations Order
No. 55.

1. The rendezvous points for all patrols which become separated shall be as follows, for those in which the separation takes place west of a line north and south through Thiaucourt, Montsec is the rendezvous point: for those in which the separation takes place east of that line Pont-a-Mousson is the rendezvous point. High patrols will be at 4000 meters, low patrols at 2000 M.

2. Any parts of previous orders or memorandum which conflict with the above are hereby revoked.

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

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Operations Office
13th Aero Squadron
Sept. 13th, 1918

Flying Order
No. 43

1. Sector of the 2nd Pursuit Group is from the line Flirey—Arnville to the line Nancy—Solgne.
2. At 18 H. September 12th our infantry gained the following positions along the sector of the wing. St. Mihiel, Apremont, le Mont, Montsec, Lemarche, Beney, Jaulny, Norroy. East of the Moselle River, no substantial change. Squadron Operations Officer will call up at the Group Operations Office before each patrol leaves to ascertain if there has been any change in the line of battle.
3. Mission
   a.) To attack or force to the ground or destroy every enemy balloon in the sector assigned.
   b.) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our Army Corps Observation Aviation to work.
   c.) To prevent all enemy reconnaissance either visual or photographic.
4. All patrols 2500–3500 meters will be made along the line five to seven kilometers in advance of the line of battle. All patrols at 3500–5500 meters will be made along the line six to nine kilometers in advance of the line of battle.
   All patrols at 2500–3500 meters will be responsible for the execution of mission "a."
5. Whenever possible two D–H planes from the 11th Squadron or 20th Squadron will be a part of the patrols.
6. The following schedule will be in effect September 13th, 1918.
   5:30 to 17:15 Patrol 5 planes along sector alt. 2500–3500 M.
   8:30 to 10:15 Patrol 5 planes along sector alt. 2500–3500 M.
   11:30 to 13:15 Patrol 5 planes along sector alt. 2500–3500 M.
   14:45 to 16:15 Patrol 5 planes along sector alt. 3500–5500 M.
   17:45 to 19:30 Patrol 5 planes along sector alt. 2500–3500 M.

By order of Captain Biddle

Sydney Gross
1st Lieut. A.S. SIG. R.C.
Operations Officer

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Operations Office
22nd Aero Squadron
2nd Pursuit Group
September 12, 1918

Operations Orders
No. 22.

1. The following schedule will be in effect for Sept. 13th, 1918.
One protection patrol (if required). Time and details of mission to be furnished later.
7:00-8:45 Patrol 5 planes along sector. Alt. 3500-5500 Meters.
10:00-11:45 Patrol 5 planes along sector. Alt. 2500-3500 Meters.
13:15-15:00 Patrol along sector of 5 planes. Alt. 3500-5500 Meters.
16:15-18:00 Patrol 5 planes along sector. Alt. 2500-3500 Meters.

By order of Capt. Bridgman

George B. Gillson
2nd Lt. A.S. U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 13th, 1918

Operations Order
Number 41.

1. The 28th, 93rd, 103rd, and 213th Squadrons will send all available machines to bomb and attack with machine gun fire the airdrome at Mars-la-Tour and all concentrations of troops on the road between Mars-la-Tour and Chambley, and the road between Chambley and Arnaville.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 13th, 1918

Operations Order
No. 41-a.

1. Flying orders for today remain the same as given in Operations Order Number 33.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 13th, 1918

Operations Order
No. 43.

1. Patrols this afternoon will have for their special mission bombing and attacking with machine gun fire the following roads and concentration of troops in the immediate vicinity:
   Mars-la-Tour—Chambley
   Mars-la-Tour—Les Baraques.
   Waville—Arnaville.
2. Great importance is attached to observations regarding direction and density of traffic.
3. The 93rd and 213th Squadrons will cover the Mars-la-Tour—Les Baraques road; the 28th Squadron the Arnaville—Waville road.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 13th, 1918

Operations Memorandum
Number 53.

1. According to latest available information the line of battle is approximately: Combres—Herbeuville—All roads leading to Creue—2½ kilometers north of Vigneulles—Xammes—Jaulny—Norroy—Lesmenils—Port-sur-Seille.

11:00 o'clock.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 13th, 1918

Operations Memorandum
Number 54.

1. Operations Officers will inform all pilots that the railroad between Jarny and Mars-la-Tour is heavily congested but the heavier congestion is on the road Mars-la-Tour to Buxieres (5 kilometers east of Chambley).

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 13th, 1918

Operations Memorandum
Number 55.

1. According to latest available information the line of battle now includes the villages of Billy-sous-les-Cotes, Hattonville, Vigneulles, St. Benoit. Our troops are advancing and meeting with little resistance.

14:15 o'clock.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

—181—

103d Aero Squadron

Flying Orders for September 13th, 1918.

All available planes, including those with bomb racks installed, will be held on alert from 8.00 o'clock, ready to leave within 10 minutes after receiving orders. They will be prepared to carry out missions of bombardment and to attack designated targets on the ground.

The sector of the Group is between the lines St. Mihiel—Lachaussee and Nancy—Solgne.

Flying Orders for September 13th, 1918. (Special Mission)

This squadron, together with the other squadrons of the group, will send all available machines to bomb and attack with machine gun fire the airdrome at Mars-la-Tour and all concentrations of troops on the road between Mars-la-Tour and Chambley and the road from Chambley to Arnaville.

Flying Orders for September 13th, 1918. (Road Strafing)

The patrol for this afternoon will have for its special mission bombing and attacking with machine gun fire the Mars-la-Tour—les Baraques road.

—182—

Operations Office
213th Aero Pursuit Squadron
September 13th, 1918

Operations Order
Number 14.

1. The 213th (and 28th, 93rd, and 103rd) Squadron will send all available planes to bomb and attack with machine gun fire the airdrome Mars-la-Tour and all concentrations of troops on the road between Mars-la-Tour and Chambley and the road from Chambley to Arnaville.

By order of Lieut. Hambleton

E. N. Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

—183—

Operations Office
213th Aero Pursuit Squadron
September 13th, 1918

Operations Order
Number 15.

1. Patrols this afternoon will have for their special mission bombing and attacking with machine gun fire the following road and concentrations of troops in the immediate vicinity. Mars-la-Tours-Chambley.
2. Great importance is attached to observations regarding direction and density of all traffic.

By order of Lieut. Hambleton

E. N. Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

—184—

Operations Office
96th Aero Squadron
Sept. 13, 1918

Operations Order
No. 59

"A" Flight and "B" Flight will stand by at 5:00 A.M. for bombing mission at 5:15 A.M.

"C" Flight and "D" Flight will stand by at 8:00 A.M.

"A" Flight

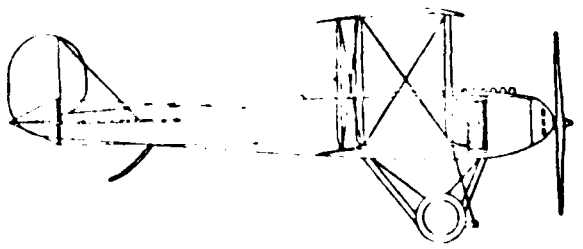
Position	Pilots	Observers	Plane No.
	Flight leader		
1.	1st Lt Gaylord	2nd Lt Rath	14
2.	1st Lt Farnsworth	2nd Lt R E Thompson	18
3.	1st Lt Taylor	1st Lt Stuart	19
4.	1st Lt Rogers	2nd Lt Straun	6
5.	1st Lt Anderson	Lt McDowell	18

"B" Flight

	Flight leader		
1.	1st Lt D H Young	1st Lt Lunt	12
2.	1st Lt Hopper	2nd Lt Kelly	5
3.	1st Lt Bates	1st Lt Pressler	15
4.	2nd Lt Elliott	1st Lt Ellis	4

"C" Flight

	Flight leader	
1.	1st Lt Codman	1st Lt Evans
2.	1st Lt C P Young	2nd Lt Anspach
3.	2nd Lt TenEyck	2nd Lt Smith
4.	2nd Lt Forshay	2nd Lt O'Donnell



"D" Flight

	Flight leader	
1.	1st Lt Beverly	1st Lt Newberry
2.	Capt Summersett	2nd Lt Hexter
3.	1st Lt Turnbull	1st Lt Cawston
4.	2nd Lt Lakin	2nd Lt Douglas

Planes for "C" Flight and "D" Flight will be assigned at time of flight.

E. E. Evans Operations Officer
1st Lt A S U S A

—185—

Headquarters 91st Aero Service Squadron
Missions for Sept. 13, 1918

1. Reconnaissance.

At 4:30

Lt. Badham	Lt. Kenney	5

At 7:30

Lt. Hammond	Lt. Diekema	3
Lt. Sieper	Lt. Chamberlin	6

By order of Major John N. Reynolds.

John H. Snyder, 2nd Lt. A.S.
Operations Officer

—186—

Headquarters
90th Aero Squadron
Observation Group—Fourth Army Corps
Sept. [13], 1918

Command Planes

Observers	Pilots	Plane No.	Time
Lt. Francis, W.L.	Lt. Cowle, H.H.	3	
Lt. Lake	Lt. Conover, Harvey	4	

Reserve Plane B.

Observers and pilots will leave by automobile by 4:00 A.M. for Menil-la-Tour.

Counter Attack Planes

Lt. Walden, D.M.	Lt. Lee, M.G.	15	5:15
Lt. Parr, A.E.	Lt. Pike, G.M.	17	8:15

Reserve plane (a) and (d).

Infantry Contact Planes

Lt. Burger	Lt. Rohrer	16	5:15
Lt. Lowe, W.O.	Lt. Ellis, H.R.	9	6:15
Lt. Hayden, V.B.	Lt. Pierson, N.E.	14	8:15
Lt. Shuss, P.B.	Lt. Livingston, J.W.	2	10:15
Lt. Sullivan, A.P.	Lt. Bovard, J.M.	11	12:15

All pilots will be on the field at Red Cross tent or their hangar unless excused by officer in charge of the field. Lt. Broomfield.

All observers will be at Group Headquarters, and go to the field one half hour prior to time for departure.

Equip the planes as follows:

1. Each of contact planes with one streamer on each wing.
2. Two large and 3 V.P. message tubes in each plane.
3. The prescribed assignment of Very Pistols and ammunition.
4. Wave length, 1. Nos. 13 and 19—[195 M(?)]. Nos. 15, 17, 14, 2 and 11 [270 M(?)].

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer

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Headquarters 90th Aero Squadron
Observation Group Fourth Army Corps, Z. of A., A.E.F.
France, September 13th, 1918

Memorandum to: Observers.

If visibility is too bad to adjust the artillery, drop messages on the batteries giving data on targets.

Division and Corps Headquarters have not changed.

Advance line is probably in Bois de Thiaucourt, north of Lamarche, Beney, and Xammes.

Use your wireless to report all data, and drop messages also.

A copy of the "T" code which is in use is on the officers mess bulletin board.

Morton B. Adams
1st Lt., F.A.
Chief Observer

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Headquarters
90th Aero Squadron
Observation Group—Fourth Army Corps
Sept. 13, 1918

Additional Schedules

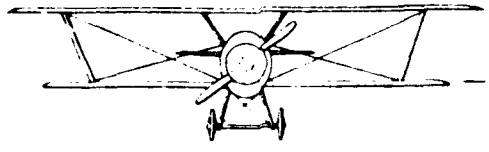
Observer	Pilot	Plane No.	Time
Lt. Hayden, V.B.	Lt. Pierson, N.E.	14	7:40
Lt. Shuss, P.B.	Lt. Livingston, J.W.	2	8:40
Lt. Lindstrom, G.T.	Lt. Carver, Leland	12	9:40
Lt. Bogle, H.C.	Lt. Young, J.S.	19	11:40
Lt. Sullivan, A.P.	Lt. Bovard, J.M.	11	12:40
Lt. Sherrick, J.C.	Lt. White, M.O.	1	1:40

Equip the planes.

1. One streamer on each wing.
2. Prescribed assignment of V Pistols and ammunition.
3. Wave lengths Nos. 12, 19, 11, 195 M. Nos. 2, 1, 270 M.

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer



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Headquarters
90th Aero Squadron
Observation Group — Fourth Army Corps
Sept. 13, 1918

Noon Schedule

	Counter Attack		
Lt. Parr, A.E.	Lt. Pike, G.M.	17	3:00 P.M.
	Infantry Contact		
Lt. Lowe, W.O.	Lt. Kinsley, W.E.	10	4:00 P.M.
	Counter Attack		
Lt. Bogle, H.C.	Lt. Young, J.S.	19	5:00 P.M.

	Infantry Contact		
Lt. Shuss, P.B.	Lt. Livingston, J.W.	2	5:00 P.M.
	Counter Attack		
Lt. Vinson, F.L.	Lt. Rohrer, L.E.	16	6:00 P.M.
	Infantry Contact		
Lt. Tillman, F.A.	Lt. Greist, E.H.	7	6:00 P.M.
	Photographic Mission		
Lt. Lindstrom, G.T.	Lt. Carver, Leland	12	
Protection:			
Lt. Burger,	Lt. Neidecker, B.C.	8	
Lt. Grier	Lt. Ellis, H.R.	9	
	Corps Artillery Planes		
Lt. Walden, D.M.	Lt. Lee, M.G.	15	
Lt. Hayden, V.B.	Lt. Pierson, N.E.	18	

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer

Reports

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Headquarters, 27th Aero Squadron, A.S.[a]
Operations Office, 1st Pursuit Group
September 13th, 1918

Atmospheric conditions—cloudy.
From 16 h Sept. 12 to 16 h Sept. 13th, 1918

Note: Lt. Luke who did not return from patrol 7 h 20 Sept. 12th. returned at 7 h 20 Sept. 13th. Lt Luke had forced landing at Dieulouard. For results see reconnaissance report.

Note: The three planes which went on Alert at 15 h 10 Sept. 12th returned at 16 h 30 Sept. 12th. Alt 300 meters. Nothing to report.

1)—1 Patrol. 8 h 53 to 10 h 05, 4 planes. Lts. Vasconcells, Wilson, Lyman and Clapp. Alt. 150 meters. For results see reconnaissance report of Lt. Vasconcells.

2)—1 Patrol. 13 h 55 to ____[b], 6 planes. Lts. Stout, Wilson, Roberts, Dawson, Donaldson and Nicolson. Alt. 300 meters. For results see reconnaissance report of Lt. Roberts, Wilson, Dawson and Nicolson.

Summary

a)	Sorties	13
c)	Combats	1
d)	Pilots available	19
e)	Pilots total	19
h)	Enemy planes confirmed	1
j)	Total planes	25
k)	Available planes	15
l)	Total flying hours	18'18"
m)	Total service hours	18'18"
n)	Alerts	1
o)	Patrols	2
t)	Planes received	2

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Headquarters 27th Aero Squadron, A.S.
Operations Office, 1st Pursuit Group
September 13th, 1918

Supplementary Report, completing days operations.

The Patrol that left at 13 h 55 returned at 16 h 20.

1)—1 Voluntary Patrol. 15 h 30 to 16 h 23, 2 planes. Major Hartney and Lt. Grant. Alt 300 meters.

1)—1 Patrol. 17 h 20 to 18 h 55, 6 planes. Lt. Vasconcells, Lennon, Hudson, Hewitt, Luke and Lyman. Alt. 600 meters. Nothing to report.

1)—1 Voluntary Patrol. 18 h 30 to 19 h 25, 1 plane. Lt. Wehner. Nothing to report.

Summary

a)	Sorties	2
d)	Pilots available	19
e)	Pilots total	19
j)	Total planes	25
k)	Available planes	15
l)	Total flying hours	1'46"
m)	Total service hours	1'46"
q)	Voluntary patrols	2

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27th Aero Squadron
September 13, 1918

Combat and Reconnaissance Reports

Lt. Leo H. Dawson reports: At 15 h 00 the American troops were standing in the streets of the towns of Hattonchatel, St. Maurice and Thillot-sous-les-Cotes. I saw a Spad right side up on the ground near an allied balloon at St. Remy, but could not distinguish the markings. There seemed to be very little activity. No gun flashes observed and no troops could be seen on the road from St. Benoit to Doncourt. No E.A. sighted.

Lt. H. W. Nicolson reports: Flew at 200 to 500 meters just under the clouds from St. Mihiel to Vigneulles to Hannonville to Fresnes. Very few U.S. troops seen, observed no activity. Went in all around the three fingered lake and could see no troops either Allied or enemy. No gun flashes. All the towns in that region seemed to be on fire.

Lt. F. Q. Wilson reports: Patrolled from St. Mihiel to Watronville and working east to Fresnes and Thiaucourt Road. Saw no E.A. nor enemy troops. Numerous allied aircraft over sector. Our troops in Fresnes and Vigneulles. Many small towns just under ridge burning. Very little activity over entire sector and remarkable absence of visible troops.

Lt. J. F. Wehner reports: Patrolled from St. Mihiel to Conflans. Roads towards Conflans crowded with American troops, trains and guns going forward. Noticed considerable Hun artillery fire in the woods in the vicinity of Abbeville. Flew mostly at an altitude of 50 meters. Fired 300 rounds at several Hun batteries, near Abbeville. No E.A. or enemy balloons.

Lt. Ivan A. Roberts reports: Patrolled from Watronville, Vigneulles and East. Flew North East from St. Mihiel at 300 meters, searching woods for evidence of our troops. I noticed U.S. artillery moving east on the road at Hattonchatel. The whole ridge and woods were practically deserted. There were small troop trains moving east on cross roads of the Vigneulles—Fresnes road. Very little artillery action in the region east of the ridge. The line of advance at 3 P.M. seemed to run from Fresnes east to Chambley. There was very little evidence of any violent fighting at any point along this line. All the villages at the base of the ridge were burning, with the exception of Vigneulles. No E.A. sighted.

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94th Aero Squadron, Operations Office
September 13th., 1918

To-Day's Schedule of Operations.

1. Voluntary Patrol. Jaulny—Haumont—N.E. Woel—Harville—Maiseray—Riaville. (1) plane. Lieut. Rickenbacker. 15 h 17 to 16 h 40. See Reconnaissance R.
2. Voluntary Patrol. Moranville—Fresnes. (2) Planes. Lieuts. Kaye, and Chambers have not as yet returned.
3. Voluntary Patrol. Moranville—Fresnes. (2) Planes. Lieuts. Cates and Snow, 16 h 22 to 17 h 35. Altitude reached 2000 meters. Visibility poor at Lines. Witnessed Artillery activity.
4. Trial Flights. Lt. Crocker 16 h 35 to 17 h 22.
Lt. Scroggie 16 h 35 to 16 h 49.
Lt. Hopkins 16 h 57 to 17 h 22.
Lt. Scroggie 17 h 44 to 18 h 06.

(a)	Sorties	18
(b)	Trials	4
(c)	Combats	0
(d)	Pilots Available	18
(e)	Pilots Total	20
(f)	Pilots missing	2
(g)	Pilots Wounded	0
(h)	Enemy Planes Confirmed	0
(i)	Enemy planes unconfirmed	0
(j)	Total Planes	24
(k)	Available planes	17
(l)	Total Flying Hours	15 h 04
(m)	Total Service Hours	13 h 16
(n)	Alerts	0
(o)	Patrols	1
(p)	Protection Patrols	0
(q)	Voluntary Patrols	4
(r)	Special Missions	0
(s)	Planes Dropped	1
(t)	Planes Received	1

J. Bayard H. Smith
1st Lieut. A.S. U.S.A.

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94th Aero Squadron
9/13/18

Reconnaissance Report

Time out: 9 h 50
Time in: 11 h 09
Max. Altitude: 300 m.
Mission: Vol. Patrol.
Weather: Poor.
Pilot: Lieut. Rickenbacker, P.L., Chambers.

Lt. Rickenbacker Reports: Went up the lines from Vigneulles to Fresnes. Found American and French advance troops at Wadonville, Avillers and St. Benoit. I noticed French and American camions at the crest of the hills along the main road. I noticed about 500 Boche prisoners being marched back on the road from Hattonchatel by American soldiers. No new towns on fire in this section.

Lt. Chambers Reports: Same as observed by Lt. Rickenbacker.

J. Bayard H. Smith
1st Lt. A.S. U.S.A.
Acting Operations Officer

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94th Aero Squadron
9/13/18

Reconnaissance Report

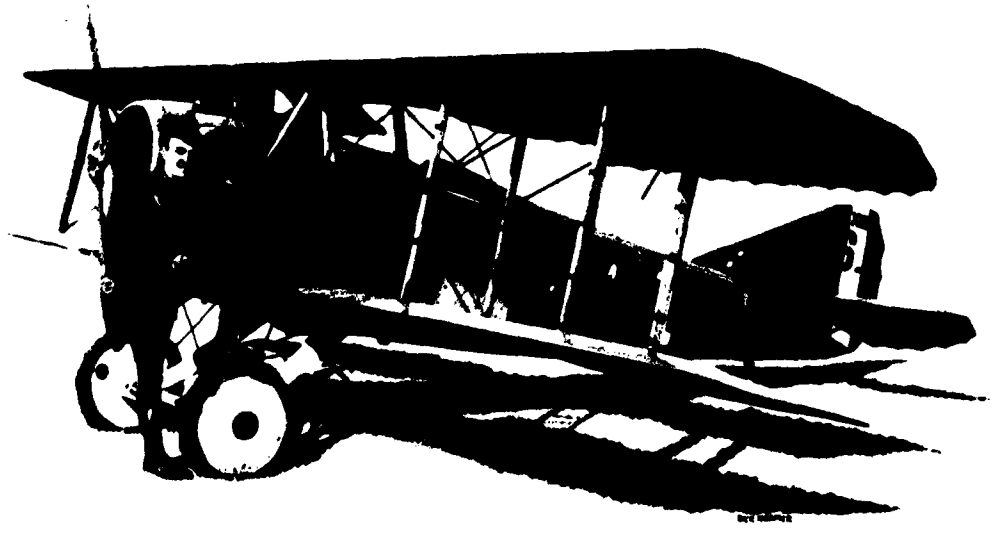
Time out: 12 h 26
Time in: 13 h 54
Max. Altitude: 2000
Mission: Voluntary Patrol.
Pilot: Lt. Rickenbacker, Chambers.

Lt. Rickenbacker Reports: Went up the lines to Verdun and St. Mihiel about 2000 meters. Circled around Verdun. Visibility was very good. Saw no activity on the ground or German planes in the air. Returned down about three kilometers in the lines west of Vigneulles. Saw eight pieces of German artillery, with six horses attached to each piece, apparently retreating northeast. Looked like it might be 155's

or its equivalent. Circled over it at 150 meters, after which the artillerymen dismounted and ran into the nearby field. Made two more complete circles at 150 meters before being convinced that it was German artillery. On the third time around, fired probably 20 or 25 shots, when my gun jammed, the other having jammed before beyond repair. Saw several fires, apparently munition dumps, in the Bois de Thiaucourt. Baled hay was on fire about three kilometers east of Creue. Noticed most of our barrage shells landing in the crest of hills just west of St. Maurice and Hattonchatel. No enemy airplanes in sight. On the return to the lines found one of the 95th Squadron planes; No. 22, had panned just south of Lamorville, with French guard.

Lt. Chambers Reports: Observed the same activities as Lt. Rickenbacker.

J. Bayard H. Smith
1st Lt., A.S. U.S.A.
Acting Operations Officer



1st Lt. "Eddie" Rickenbacker, ace of aces credited with 26 victories in World War I. (Painted by Dick Kramer)

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94th Aero Squadron
9/13/18

Reconnaissance Report

Time out: 15 h 17
Time in: 16 h 40
Max. Altitude: 150 m.
Mission: Voluntary patrol.
Pilot: Lt. Rickenbacker.

Lt. Rickenbacker Reports: I started in over Jaulny, flying about 150 meters. Found Haumont in flames and apparently set on fire recently. Found a farm three kilometers northeast of Woel on fire. Flew to Harville and Maizeray. Was fired on by machine guns from town of Riaville, and Pintheville. I fired about 150 rounds into Riaville. Saw French infantry advancing single file from Fresnes toward Marcheville. Then I returned back over the same route. Saw no signs of the enemy on the roads or in the trenches, outside of two villages mentioned above. Saw one allied plane, either a Salmson or Brequet crashed two kilometers south of Spada, very badly wrecked. No enemy aircraft or balloons seen.

J. Bayard H. Smith
1st Lt., A.S. U.S.A.
Acting Operations Officer

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94th Aero Squadron[a]
9/13/18

Reconnaissance Report

Time out: 15 h 45
Time in: 19 h 10[b]
Max. Altitude: 300 m.
Mission: Voluntary Patrol.
Weather: Poor
Pilot: Lt. Chambers, P.L., Lt. Kaye

Lt. Chambers Reports: From Fresnes to Beney our troops have dug in on west side of road in fairly large numbers. A few American patrols east of road in small numbers, evidently in close proximity to enemy, as

they were crawling along the ground. One or two fires northwest of Chambley. No enemy aircraft encountered. Jonville—Hadonville-les-Lachaussee [road] is evidently in hands of enemy, as we were fired at from the ground.

Note: According to information received from a pilot from Toul, Lieut. Putman was shot down last night by twelve Boche, who had black and green stripes on their fuselage.

J. Bayard H. Smith
1st Lieut. A.S. U.S.A.
Acting Operations Officer

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Headquarters 95th Aero Squadron
Operations Office
Sept. 13, 1918

Report of Operations from 16 h 00 Sept. 12 to 16 h 00 Sept. 13.

Sept. 12

Note: Lt. Holden returned from his forced landing in the morning patrol at 17 h 45.

1) Voluntary patrol 17 h 35 to 19 h 00; 4 planes; altitude 50 meters; Chatillon and St. Mihiel; Lts. Taylor, Sewall, Mitchell, and Knowles; Lt. Taylor returned immediately with a broken propellor; Lt. Knowles attacked German train of wagons causing several wrecks and blocking the road; see reconnaissance report; nothing else to report.

Sept. 13

2) Voluntary patrol 10 h 45 to 11 h 35; 2 planes; altitude 150 meters; Chatillon to St. Mihiel; Lts. Curtis and Knowles; Lt. Curtis down at St. Remy; Lt. Knowles reports troop positions; see reconnaissance report.

1) Patrol 6 h 20 to 7 h 25; 6 planes; altitude 50 meters; Chatillon to St. Mihiel; Lts. Buckley, Weatherhead, Hall, Bailey, Butz, and Holden; Lt. Hall returned immediately with leak in water tank; Lt. Bailey landed near Dugny out of gas on his return, and has not returned to field. Lt. Butz had forced landing on return near Rampont, and smashed his plane, pilot unhurt; Lt. Holden attacked German troop train (wagons) with good results, see report; he landed at Souilly on return and returned to field at 9 h 40; nothing else to report.

2) Patrol 11 h 15 to 12 h 55; 6 planes; altitude 300 meters; line—Chatillon and St. Mihiel; Lts. McLanahan, Mitchell, Sewall, Avery, Proudfit, and Taylor; Lt. Avery shot down two German infantrymen, see report; Lt. Sewall reports troop positions; Lts. Taylor and Mitchell had forced landings; Lt. Proudfit is still missing.

Summary

a)	Sorties	19
b)	Trials	1
d)	Pilots available	17
e)	Total pilots	18
f)	Pilots missing	1
j)	Total planes	23
k)	Available planes	14
l)	Total flying hours	10 h 56
m)	Total service hours	10 h 56
o)	Patrols	2
q)	Voluntary patrols	2
s)	Planes dropped	1

Supplementary

1) Patrol 14 h 55 to 16 h 30; 5 planes; altitude 800 meters; Chatillon to St. Mihiel; Lts. McLanahan, Gravatt, Sewall, Knowles, and Woodard, nothing to report.

Edward Butts Jr.
1st Lt. A.S. U.S.A.
Operations Officer

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Operations Office
147th Aero Squadron
Amer. E.F.

Daily Report No. 97: 9/12 to 9/13—16 h.00 to 16 h.00

1. Patrol (Sept. 12th), 5 planes, Lieuts. Raible (leader) Brotherton, Love, Abernathy and Muther, Altitude 1000 meters. Visibility poor. Mission patrol lines between Chatillon-sous-les-Cotes and St. Mihiel. Time 18 h. 55 to 19 h. 45.

Lieut. Raible reports our artillery active. Not much Hun artillery activity. No E.A. observed. Around and in vicinity of Vigneulles-les-Hattonchatel big fire observed, probably ammunition dump.

Lieut. Muther reports woods and villages on fire from Fresnes-en-Woevre South to St. Mihiel. 4 E.A. observed around Fresnes-en-Woevre at about 4500 meters at 19 h.30.

Lieut. Brotherton reports much artillery activity on our side of the lines and several fires near Montsec and North.

2. Patrol (Sept. 13th), 1 plane, Lieut. Brotherton. Altitude 200 meters. Poor visibility. Mission patrol lines between Chatillon-sous-les-Cotes and St. Mihiel. Time 7 h.40 to 8 h.30. Lieut. Brotherton reports clouds low at 100 meters. No E.A. observed. Very little artillery fire noted. In vicinity of Essey and Pannes ammunition dumps and towns on fire. All barracks and what looked like a prison camp are burned. All towns are in ruins. Near Pannes a few American trucks and soldiers are to be seen. Not much truck or troop movement noted in that vicinity.

3. Patrol (Sept. 13th), 2 planes, Lieuts. Jones (leader) and O'Neill. Altitude 100 meters. Poor visibility. Mission patrol lines between Chatillon-sous-les-Cotes and St. Mihiel. Time 8 h.45 to 9 h.15. Nothing to report.

4. Patrol (Sept. 13th), 6 planes, Lieuts. White (leader), Brotherton, Simon, Abernathy, Love and Ennis. Altitude 800 meters. Visibility good at 400 meters. Mission patrol lines between Chatillon-sous-les-Cotes and St. Mihiel. Time 12 h.30 to 13 h.20.

Lieut. White reports Allied infantry moving up along roads leading to Fresnes-en-Woevre. Allied truck activity on road between Herbeuville and Creue. Allied troops seem to be entrenched immediately West of Fresnes-en-Woevre and Thiaucourt road. Artillery activity on ridge just North of Lachaussee (on Hattonchatel and Fresnes-en-Woevre). A few fires just North of Lachaussee (on finger lake). Many fires in territory just taken by the Allies. Owing to the frequent storms had to fly low and return early.

Summary

a)	Sorties	14
b)	Trials	0
c)	Combats	0
d)	Pilots available	20
e)	Total pilots	22
f)	Pilots missing	0
g)	Pilots wounded	0
h)	Enemy planes confirmed	0
i)	Enemy planes unconfirmed	0
j)	Total planes	25
k)	Available planes	21
l)	Total flying hours	10 h.05
m)	Total service hours	10 h.05
n)	Alerts	0
o)	Patrols	4

p)	Protection patrols	0
q)	Voluntary	0
r)	Special missions	0
s)	Planes dropped	0
t)	Planes received	0

By order of Lieut. James A. Meissner

Frank S. Ennis
2nd Lt. Air Service, U.S.A.
Acting Operations Officer

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Operations Office
147th Aero Squadron
Amer. E.F.
September 13th, 1918

Supplementary Report

To Daily Report No. 97: From 1600 h.00 to 18 h.30

To: Operations Officer, First Pursuit Group

1. Patrol, 5 planes, Lieuts. Raible (leader), Muther, O'Neill, Love and Dowd. Altitude 500 to 3500 meters. Visibility below 500 to 1000 meters. Mission patrol lines between Chatillon-sous-les-Cotes and St. Mihiel. Time 16 h. 15 to 18 h.00.

Lieut. O'Neill reports observing one plane shot down in flames at 17 h.17 in the vicinity of Corny, north of Pont-a-Mousson. Not known whether Allied or enemy plane. Aerial fight took place at about 3,500 meters. No E.A.

Lieut. Muther reports observing one plane shot down in flames in the vicinity of Pagny, North of Pont-a-Mousson at about 17 h.17. Fight at about 3,500 meters. No E.A. observed. Many Allied planes observed.

Lieut. Dowd has not as yet returned.

Summary

a)	Sorties	5
b)	Trials	0
c)	Combats	0
d)	Pilots available	19
e)	Total pilots	22
f)	Pilots missing	1
g)	Pilots wounded	0

h)	Enemy planes confirmed	0
i)	Enemy planes unconfirmed	0
j)	Total planes	25
k)	Available planes	20
l)	Total flying hours	4 h.00
m)	Total service hours	4 h.00
n)	Alerts	0
o)	Patrols	1
p)	Protection patrols	0
q)	Voluntary patrols	0
r)	Special missions	0
s)	Planes dropped	0
t)	Planes received	0

By order of Lieut. James A. Meissner

Frank S. Ennis
2nd Lt. A.S. U.S.A.
Acting Operations Officer

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147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Poor
Mission: Patrol lines btw. Chatillon-sous-les-Cotes and St. Mihiel
Route Actually Followed: Chatillon-sous-les-Cotes and St. Mihiel
Names of Pilots on Patrol and Leaders: Lt. Brotherton

Hour of Departure	Hour of Return	Altitude	Squadron	Date
7 h.40	8 h.30	200 meters	147th	Sept. 13

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:
Clouds low at 100 meters. Poor visibility. No enemy anti-aircraft sighted. Very little artillery fire noted. In vicinity of Essey and Pannes ammunition dumps and towns on fire. All barracks and what looks like a prison camp are burned. All towns are in ruin. Near Pannes a few American trucks and soldiers were to be seen. Not much truck or troop movement noted in that vicinity.

W. E. Brotherton
2nd Lt. Air Service, U.S.A.

S. M. Purcell
2nd Lt. Air Service, U.S.A.
Squadron Operations Officer

—201—

147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good at 400 meters.
Mission: Patrol along lines btw. Chatillon-sous-les-Cotes and St. Mihiel
Route Actually Followed: St. Mihiel, Vigneulles-les-Hattonchatel and Fresnes-en-Woevre
Names of Pilots on Patrol and Leaders: Lts. White (leader), Brotherton, Simon, Abernathy, Love and Ennis

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12 h.30	13 h.20	800 meters	147th	Sept. 13

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A : Allied:
Planes Seen to Have Gone Down out of Control. E.A.: Allied
Markings of E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Allied Infantry moving up along roads leading to Fresnes-en-Woevre. Allied truck activity between Herbeuville and Creue. Allied troops seem to be entrenched immediately west of Fresnes-en-Woevre and Thiaucourt road. Artillery active on range between Vigneulles-les-Hattonchatel and Fresnes-en-Woevre. A few fires just north of Lachaussee (on Finger Lake). Many fires in territory just taken by Allies. Owing to the frequent storms had to fly low and return early.

Wilbert W. White
2nd Lt. Air Service, U.S.A.

Frank S. Ennis
2nd Lt. Air Service, U.S.A.

—202—

147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good below 500 to 1000 M.
Mission: Patrol between Chatillon-sous-les-Cotes to St. Mihiel to Corny
Route Actually Followed: Chatillon-sous-les-Cotes—St. Mihiel—Corny (and return)
Names of Pilots on Patrol and Leaders: Lts. Raible (leader), O'Neill, Muther, Love and Dowd

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16 h.15	18 h.00	500 - 3500 meters	147th	Sept. 13

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames: E.A.: 1 Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings of E.A.:

In the Opinion of Those Who Took Part in the Combat. What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Observed one plane shot down in flames at 17 h.17 in vicinity of Corny, north of Pont-a-Mousson. Not known whether Allied or enemy plane. Aerial fight at about 3500 meters. No enemy planes sighted.

Ralph A. O'Neill
2nd Lt. Air Service, U.S.A.

One plane shot down in flames in vicinity of Pagny, north of Pont-a-Mousson, at about 17 h.17. Fight at about 3500 meters. No enemy planes sighted. Many planes observed.

Walter P. Muther
1st Lt. Air Service, U.S.A.

Stuart M. Purcell
2nd Lt. Air Service, U.S.A.
Squadron Operations O.

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First Pursuit Group
Operations Office

Operations Report, 17:00, Sept. 12th. 17:00, Sept. 13th, 1918.

1. Atmospheric conditions. Very cloudy all day, but clearing occasionally.
2. Enemy Aerial Activity.
a. Airplanes. Allied activity very strong over the entire sector. Our planes were able to carry on a continuous patrol of visual reconnaissance which kept us advised throughout the day of our advancing troops. A few E.A. were seen in the vicinity of the Etang-de-Lachaussee but flew back immediately into Germany.
b. Balloons. Nothing to report.
c. Anti-aircraft. An active battery mounted on a track was reported first at St. Benoit, then a little northeast towards Haumont. See reconnaissance reports.
3. Activity of Our Own Aviation.
a. 1 Patrol. 16 h 14 to 17 h 20, 5 planes, altitude 500 meters. Chatillon to St. Mihiel. 94th Squadron. See reconnaissance report attached.

1 Patrol. 17 h 35 to 19 h 00, 4 planes, altitude 50 meters. Chatillon to St. Mihiel. 95th Squadron. See reconnaissance report attached.

1 Patrol. 18 h 55 to 19 h 45, 5 planes, altitude 1000 meters. Chatillon to St. Mihiel. 147th Squadron. See reconnaissance report attached.

1 Patrol. 6 h 20 to 7 h 25, 6 planes, altitude 50 meters. Chatillon to St. Mihiel. 95th Squadron. See reconnaissance report attached. Lt. Bailey had forced landing near Dugny. Lt. Butz had forced landing near Rampont.

1 Patrol. 7 h 40 to 8 h 30, 1 plane, altitude 200 meters. Chatillon to St. Mihiel. 147th Squadron. See reconnaissance report attached.

1 Patrol. 8 h 53 to 10 h 05, 4 planes, altitude 150 meters. Chatillon to St. Mihiel. 27th Squadron. See reconnaissance report attached.

1 Patrol, 8 h 45 to 10 h 15, 2 planes, altitude 100 meters. Chatillon to St. Mihiel. 147th Squadron. Nothing to report.

1 Patrol. 11 h 15 to 12 h 55, 6 planes, altitude 300 meters. Chatillon to St. Mihiel. 95th Squadron. See reconnaissance report attached. Lts. Taylor and Mitchell had forced landings. Lt. Proudfit is still missing.

1 Patrol. 12 h 30 to 13 h 20, 6 planes, altitude 800 meters. Chatillon to St. Mihiel, 147th Squadron. See reconnaissance report attached.

1 Patrol. 13 h 55 to 15 h 20, 6 planes, altitude 800 meters. Chatillon to St. Mihiel. 147th Squadron. See reconnaissance report attached.

1 Patrol. 14 h 55 to 16 h 30, 5 planes, altitude 50 to 800 meters. Chatillon to St. Mihiel. 95th Squadron. See reconnaissance report attached.

1 Patrol. 16 h 15, 18 h 00, 5 planes, altitude 500 to 3500 meters. Chatillon to St. Mihiel. 147th Squadron. See reconnaissance report attached. Lt. Dowd has not yet returned.

1 Patrol. 17 h 20 to 18 h 55, 6 planes, altitude 1000 meters. Chatillon to St. Mihiel. 27th Squadron. Nothing to report.

1 Voluntary Patrol. 10 h 45 to 11 h 35, altitude 150 meters. Chatillon to St. Mihiel. 95th Squadron. See reconnaissance report attached. Lt. Curtis had forced landing at St. Remy.

1 Voluntary Patrol. 9 h 50 to 11 h 09, 2 planes, altitude 50 to 300 meters. Chatillon to St. Mihiel. 94th Squadron. See reconnaissance report attached.

1 Voluntary Patrol. 15 h 17 to 16 h 40, 1 plane, altitude 500 meters. Chatillon to St. Mihiel. 94th Squadron. See reconnaissance report attached.

1 Voluntary Patrol. 15 h 30 to 16 h 25, 2 planes, altitude 300 meters. Chatillon to St. Mihiel. 27th Squadron. Nothing to report.

1 Voluntary Patrol. 15 h 45 to 19 h 20, 2 planes, altitude 500 meters. Chatillon to St. Mihiel. 94th Squadron. See reconnaissance report attached.

1 Voluntary Patrol. 16 h 22 to 17 h 35, 2 planes, altitude 2000 meters. Chatillon to St. Mihiel. 94th Squadron. Nothing to report.

1 Voluntary Patrol. 18 h 30 to 19 h 25, 1 plane, altitude 1000 meters. Chatillon to St. Mihiel. 27th Squadron. Reports seeing allied troops on the road from Etain to Conflans. Also enemy artillery activity in the vicinity of Abbeville.

Group Summary

(a)	Sorties	76
(b)	Trials	5
(c)	Combats	1
(d)	Pilots Available	73
(e)	Total Pilots	79
(f)	Pilots Missing	4
(j)	Total Planes	95
(k)	Available Planes	66
(l)	Total Flying Hours	63 h 31
(m)	Total Service Hours	63 h 08
(o)	Patrols	11
(q)	Voluntary Patrols	7
(s)	Planes Dropped	2
(t)	Planes Received	3

4. Miscellaneous. Attention is drawn to the reconnaissance report of Lt. J. F. Wehner of the 27th Squadron, dated Sept. 12th in which he attacks a balloon in the region of Montsec stating that he did not burn. It appears that information had been received that a balloon was brought down in flames in that region and at the time he reported. Confirmation is therefore requested for this balloon.

In addition it is requested that a balloon brought down by Lt. Luke of the 27th Squadron, the signed statements of U.S. Officers which are attached be confirmed in your orders. It is noted that this item is reported in your operations report #12 under the heading of miscellaneous.

	27th	94th	95th	145th
Pilots on Hand	19	20	18	22
Pilots Available	19	20	17	20
Planes on Hand	25	24	23	25
Planes Available	15	19	14	21

Romer Shawhan
1st Lieut. A.S. U.S.A.
Group Operations Officer

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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Clouds at 3500 meters, good below.
Mission: Patrol
Route Actually Followed: Toul, Flirey, Thiaucourt, Toul.
Names of Pilots on Patrol and Leaders: Captain Riddle, Lieuts. Stovall, Stivers, Richards, Armstrong and Guthrie.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
5:45	6:30	400	13th	Sept. 13

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings in E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lieuts. Richards and Guthrie blew out tires rolling on ground before taking off. Lieut. Armstrong returned motor trouble. Captain Biddle returned broken air pipe. Lieut. Stivers not in yet (6:45)

No E.A. seen. Two American two seaters region Essey-Flirey.

Charles J. Biddle
Captain, A.S.U.S.A.

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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good. Clouds at 500 M.
Mission: Patrol
Route Actually Followed: Toul, Haumont, Charey, Arnaville, Solgne.

Battered village of Flirey, through which American troops passed in their assault on St. Mihiel.

Names of Pilots on Patrol and Leaders: Lieuts. Freeman, Brody, Brewer, Stiles, Bartron.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11:35	13:25	400-100 M	13th	Sept. 13

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

AAA very active in region of Charey. One Salmson No. 14 just north of Vieville-en-Haye appeared to be in good condition. One Spad with a white No. 5 near Bouillonville also appeared to be in good condition.

H. B. Freeman
1st. Lieut. A.S.U.S.A.

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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Very poor.

Mission: Patrol.

Route Actually Followed: Toul, St. Mihiel, Pont-a-Mousson, Vigneulles, Thiaucourt, Toul.

Names of Pilots on Patrol and Leaders: Lieuts. Armstrong, Stovall, Stivers, Guthrie, Kull, Richards, Captain Biddle and Major Spatz.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
15:00	16:30	4700 m	13th	Sept. 13

Number of E.A. Seen: [1] Time: 16:00

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

It was impossible to see anything on the ground on account of the clouds. There was not a break anywhere in the clouds. Lieut. Guthrie left formation on account of motor trouble. I saw an enemy single seater. He came through the clouds, saw our formation and turned and dove into Germany. I never got close enough to tell type.

H. G. Armstrong
1st. Lieut. A.S.U.S.A.

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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines:
Mission: Patrol.
Route Actually Followed: Toul,. Flirey, Vigneulles, Joinville, Puxieux, Pagny, Solgne.
Names of Pilots on Patrol and Leaders: Lieuts. Este (*Leader*), Hays, Seerley, Converse, Howe.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
17:45	19:10	2400 m	13th	Sept. 13

Number of E.A. Seen: 7 Time: 18:35
Number of E.A. Encountered: 7 Time:
Type: Bi-Place Fokkers Altitude: 2400 meters
Region: Chambley Combats: 5
Number of Rounds Fired: Confirmations Requested: 3
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: 3 Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Reports of Pilots and Other Observations:

Left Toul at 17:45 and followed the following route at 3500 meters. Flirey, Vigneulles, Joinville, Puxieux, Pagny, Solgne. Then went down to 2400 meters under the clouds that were banking up very thick. At Chambley were attacked by seven Fokkers which came out of the sun. Turned toward them, all climbing. The fight became a regular "Dog fight," my motor failed me for a moment and two Huns got on my tail. Lieut. Hays came down on one and shot him off. My motor then took and I was then able to get on the tail of the other Hun, and get in two good bursts. This Hun went down apparently out of control. I was able to attack two other Huns before the fight ended. I saw one plane, which I believe to be a Fokker going straight down in a nose dive. The patrol became separated largely due to the mist and clouds but during the larger part of the fight kept well together. The fight ended north of Chambley at 3500 meters at 18:55 o'clock. Lieut. Converse has not

returned at time of making report. Three Fokkers were dark colored with streak of white lightning on side and black tails with white crosses also had white crosses on wings.

J. Dickinson Este
1st Lieut. A.S.U.S.A.

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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines:
Mission: Patrol
Route Actually Followed: Flirey, Vigneulles, Joinville, Puxieux, Pagny, Solgne.
Names of Pilots on Patrol and Leaders: Lieut. Howe.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
17:45	19:10	3500-2500 M.	13th	Sept. 13

Number of E.A. Seen: 7 Time: 6:35
Number of E.A. Encountered: 7 Time: 6:35
Type: Fokkers Altitude: 3400 Meters
Region: Chambley Combats: 3
Number of Rounds Fired: 175 Confirmations Requested: 1
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: 1 Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation: Lieuts. Seerley and Howe.

Detailed Report of Pilots and Other Observations:

At 6:35 seven Fokker pequed on our formation. I was flying No. 3 position so climbed in right virage in endeavor to gain altitude. One Boche on my tail was first shaken off. Then I fired at a Boche who was peaquing on a Spad below me dislodging him. Lost sight of three Spads under my wings. Then Lieut. Seerly and myself fought three

Fokkers for about ten minutes, the remaining Spads and Fokkers separating into a distant fight. Lieut. Seerley and myself kept above the three Fokkers who played in front and below us in rapid maneouvers. We dove and fired many times. I believe I put several tracers in all three. One after five minutes of combat turned over on his back and went down apparently out of control after I had given him several bursts. Did not follow him. Combatted the other two until two more were seen to the north and about 200 meters above. At that time there was at least one plane left below us. We were then about 3500 meters near Mars-la-Tour. The Fokkers were all painted dark brown with black crosses which could be seen against the brown only at close range. Black tails with white crosses.

David Howe
1st. Lieut. A.S.U.S.A.

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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good.
Mission: Patrol.
Route Actually Followed:
Names of Pilots on Patrol and Leaders: Lieut. Seerley.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
17:45	19:10	3500-2500 m.	13th	Sept. 13

Number of E.A. Seen: 7 Time:
Number of E.A. Encountered: 7 Time:
Type: Fokkers Altitude:
Region: Chambley Combats: 4
Number of Rounds Fired: 75 Confirmations Requested: 1
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: 1 Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Seven Fokkers were seen coming out of the sun in region of Chambley. Enemy planes peaqued on formation. Climbed in spirals until a little above enemy formation. Peaqued on four enemy planes firing a burst each time and then pulling up. Last E.A. went into a nose dive and disappeared into the haze. Pulled up alongside of Lieut. Howe and then observed two Fokkers 400 meters behind and 200 meters above. Saw no Spads in trouble so started for field.

The Fokklers were dark colored with a jagged streak of lightning on side of fuselage, white crosses on tail and black cross on either wing.

J. J. Seerley
1st. Lieut. A.S.U.S.A.

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13th Pursuit Squadron

Report of 1st Lieutenant R.R.S. Converse

Late in the afternoon of ithe second day of the St. Mihiel offensive (September 13) six Spad machines from the 13th Pursuit Group left the aerodrome near Toul and commenced a patrol of the lines between St. Mihiel and Thiaucourt. The time for the patrol nearly over, they descended to 1200 meters preparatory to strafing the Infantry on the way home when Lieutenant Converse, who was flying in the rear, saw a formation of seven scouts about a thousand meters above him. At first he thought they were Spads but when they got "in the sun" he recognized the silhouette of the Fokker. Realizing from their actions that the rest of his formation had not seen the Huns but were probably watching instead the burning villages below, he dove past his leader, firing tracers past him to attract his attention. But the leader was engaged in watching the ground below and did not see the tracers. By this time the enemy had approached close enough to open fire, five of them diving down on the Spads, the other two remaining above for protection. Lieutenant Converse turned and climbed back into the attacking formation. At this instant his motor went dead—whether from enemy bullets or just ordinary ill luck, he never learned—and he was forced to leave the combat. He later learned that three of the Huns had been put down in flames with his own plane as the single American loss.

The Spad landed in a communicating trench about four kilometers behind the lines and crashed the landing gear. Converse was immediately surrounded by an excited crowd of infantrymen—

members of an Austrian unit which had been rushed up to the line that day. He was handled pretty roughly his flying equipment and his belt were removed with scant ceremony. One enterprising private who had taken a fancy to the American's signet ring and finding it difficult of removal, started to hack off the offending finger. At this juncture the proceedings were interrupted by the arrival of an Austrian Captain of Cavalry. He placed a guard over Converse and had him conducted toward the rear, along a very well camouflaged road.

The party had been proceeding on foot for some time when they were stopped by a German staff car which relieved the guard of their prisoner and took him into Mars-la-Tour and questioned at Headquarters. After spending that night in a small hut under heavy guard, Converse was marched to Joeuf in company with a Cavalry private of an American unit. As they were passing the Air Service Headquarters in Joeuf a German officer coming out of the building noticed the wings on Converse's tunic. He took the American away from his guard and to an Officer's Club where there were a number of Germans who spoke either English or French. They put questions but in a polite and indirect way. They gave their prisoner a book to look at—it proved to be a collection of photographs of Allied flying fields, and watched his face intently while he inspected it.

In the afternoon Lieutenant Kraft—the German officer who had appropriated the prisoner—took him to his quarters. Here the next four days were spent. Lieutenant Kraft was congenial but offered his guest very little in the way of food. Each day one French and two American fliers would be brought over to spend the day with Converse and his host, then taken back to their prison for the night. Why Converse was not kept in the prison also is a mystery.

On the fifth day the four of them were given a loaf of black bread between them and placed in a fourth class coach for the trip to Karlsruhe. This was a two day trip but they were given no additional food. At Karlsruhe they were placed in the notorious hotel there and left for five days. The food was not fit to eat so a letter was sent to the British Red Cross who responded immediately and supplied them with wholesome rations.

Orders sending them to Landshut (Bavaria) came as a relief for it was felt that any change would be for the better. But Landshut proved to be just as bad. The food was unfit to eat and numerous vaccinations and inoculations did not add to the general joy. After two weeks Converse was again placed on a train and taken to Villingen. He had planned to make a dash for liberty on this trip but was forestalled by the removal of his shoes. And he found small chance for a get away after arriving at the camp for Lieutenant Puryear—an American pilot—had just made good his escape and all the guards had been doubled.

In spite of the increased vigilance five of the Americans, including Converse, were able to start a move toward freedom. This was in the form of a tunnel which they planned to extend beyond the outer barbed wire. In the bath house was a disused room which had been boarded up and it was from this point that the tunnel was begun. An American private, working as bath house orderly, assisted by keeping guard and by heating a poker in the fire under the boiler, this red hot iron being used to cut through the flooring. After this had been accomplished the poker was used in digging. At first the plan progressed very well but when a rock strata was encountered the work became extremely hard. They persisted, however, and managed to extend the tunnel for a distance of twenty five feet when the news came that the German delegates had crossed the lines and that an armistice would be a matter of only a few hours. It was therefore decided to discontinue the tunnel as release would probably come within a week or two.

After the armistice, however, there were no signs of a speedy release so Lieutenant Converse and five other Americans made another attempt at escape. All prisoners were allowed to visit Villingen each day provided they gave their written word on honor each time that they would make no attempt to escape. One forenoon these six Americans remained behind when the others set out for the town. About a half hour later a wagon load of cabbages drove up to the camp. When the guard opened the main gate to admit it Converse and his companions cooly walked past him, making some remark about going for a walk. They got a good start for it was not until three o'clock that afternoon that they were missed, the guard fearing to report that he had let them out. They made good progress and reached the Black Forest. Here they suffered great hardships as the snow was very deep and their clothing insufficient.

On the second day a Captain of the party became completely exhausted and could go no further. Converse volunteered to stay with him and the other four fugitives continued on their way. On account of the cold it was necessary to seek shelter so they walked four kilometers to the village of Furtwagoner, arriving about midnight. They managed to arouse a German farmer who took them in and fed them. The farmer did not seem at all anxious to turn them over to the authorities but his son, a returned soldier, was not so considerate and reported them. They were immediately taken back to Villingen but were not punished and it was only a short time until they were released. They were sent to Constance, remained there for three days, then through Switzerland to Bellegarde, France.

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22nd Aero Squadron[a]

Reconnaissance Report

Visibility Near Lines: Poor. Impossible below 200 meters.

Mission: Patrol

Route Actually Followed: Flirey to Pont-a-Mousson

Names of Pilots on Patrol and Leaders: Lts. Little (leader), LaForce, Howard and Parrott in Liberty plane.[b]

Hour of Departure	Hour of Return	Altitude	Squadron	Date
10.06	11.10	150 M	22	Sept. 13

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames.	E.A.:	Allied:
Planes Seen to Have Crashed on Ground.	E.A.:	Allied:
Planes Seen to Have Gone Down Out of Control.	E.A.:	Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Several towns in German territory were seen to be on fire. Some small towns North of Thiaucourt were on fire. I did not observe any movement of enemy troops or trains. Enemy anti-craft batteries are still located North of Thiaucourt, but did not seem to be accurate.

Lt. Koepfgen,[c] flying Liberty plane #32456, had a forced landing N.W. of Bernecourt, and the machine turned over and crashed. Both pilot and observer were seen to get out of their machine O.K. They were given assistance by American soldiers.

R. J. Little
2nd Lt. A.S. U.S.A.

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22nd Aero Squadron[a]

Reconnaissance Report

Visibility Near Lines: Very Poor.
Mission: Patrol
Route Actually Followed: One circuit of the field
Names of Pilots on Patrol and Leaders: Lts. Sperry (leader), Beane, Kimber, Seaver, Stokes—Ob.[b]

Hour of Departure	Hour of Return	Altitude	Squadron	Date
13.15	13.50	1000 M	22	Sept. 13

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lt. Sperry was forced to return to field on account of motor trouble at 13.25

John A. Sperry
1st Lt. A.S. U.S.A.

Lts. Seaver and Stokes-Observ. were forced to return to field on account of motor trouble at 13.15.

Lt. Seaver
1st Lt. A.S. U.S.A.

Lt. Beane returned to field at 13.50, broken tachometer and motor trouble.

James D. Beane
1st Lt. A.S. U.S.A.

Returned because of motor trouble. Saw wrecked Liberty plane about 1 and a half [miles?] S.E. of Bernecourt between that town and Minorville. Many fires North of lines. Saw no boche in region Charey to Gorze. Great Boche "archie" activity. Made patrol with Escadrille 96 (French Aviation) our complete patrol not being able to get off.

Arthur C. Kimber
1st Lt. A.S. U.S.A.

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22nd Aero Squadron[a]

Reconnaissance Report

Visibility Near Lines: Bad.
Mission: Patrol
Route Actually Followed: Place of rendezvous and return.
Names of Pilots on Patrol and Leaders: Lts. Brooks (leader), Tyndall. Doolin, Hassinger and Jones, Porter and Parrott in Liberty.[b]

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16.07	16.53	6000 M	22	Sept. 13th

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Dropped out of formation and landed at French Breguet Sqdrn. N.W. of Boucq due to being blinded by dirt fragment in eye. Removed fragment and returned immediately to aerodrome.

B. M. Doolin
2nd Lt. A.S. U.S.A.

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines: O.K. above clouds. 3000 meters. Hazy below upper cloud layers.

Mission: Patrol

Route Actually Followed: Menil-le-Tour—Seicheprey—Lachaussee—and over region of Nomeny.

Names of Pilots on Patrol and Leaders: Lt. Brooks (leader), Lts. Tyndall, Jones, Doolin, Hassinger, Porter and Parrott.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16.09	18.15	1000-3800 M	22nd	Sept. 13

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. 1 E.A.: ? Allied: ?

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

A plane dove into cloud at 3000 Meters in flames, approximately over Bayonville. Made for that vicinity but so many planes between this objective and my formation distracted attention.

Air was full of allied ships. No boche planes sighted. At 5.55 or 6.00 P.M. an attack developed on hill on Eastern side of Moselle opposite Norroy (marked Bellaire Farm). Shell falling on road and between road and hill (Norroy Xon Heminville).

3 large fires in vicinity at Lachaussee, apparently Haumont, Hattuville, and Dampvitoux. No enemy balloons sighted.

A. R. Brooks
2nd Lt. A.S. U.S.A.

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Headquarters 2nd Pursuit Group
1st Pursuit Wing

Report of Operations #77
From 19 h 00 Sept. 12 to 17 h 00 Sept. 13, 1918.
Weather: Cloudy. Occasional showers AM, clearing PM. Visibility fair.

I. Patrols

1. Toul, Flirey, Thiaucourt, Toul
   5 h 45-6 h 50
   350 meters
   4 planes 13th
   Nothing to report
2. Toul, Pont-a-Mousson, Limey, Toul
   7 h 39-8 h 10
   200 meters
   5 planes 39th
   Nothing to report
3. Pannes, Thiaucourt
   9 h 06-9 h 58
   300 meters
   4 planes 139th
   Nothing to report
4. Flirey, Pont-a-Mousson
   10 h 06-11 h 10
   150 meters
   4 planes 22nd
   (2 D.H. 20th) Lt. Koepfgen 20th had forced landing near Bernecourt
5. Toul, Haumont, Charey, Toul
   11 h 35-13 h 15
   300 meters
   6 planes 13th
   Nothing to report
6. Toul, Louvigny, Vigneulles, Toul
   11 h 37-13 h 36
   5000 meters
   6 planes 139th
   Observed 5 Pfalz at Louvigny
   Nothing else to report.
7. Beney, Charey, Gorze
   13 h 15-14 h 15
   1000 meters
   4 planes 22nd
   Nothing to report

8. Arnaville, Chambley, Hadonville
   13 h-14 h 45
   500 meters
   (1 D.H. 11th)
   1000 meters
   6 planes 49th
   (1 D.H. 20th) See pilot's report
9. St. Mihiel, Pont-a-Mousson, Vigneulles, Thiaucourt
   15 h-16 h 30
   4700 meters
   7 planes 13th
   Patrol above clouds. Saw 1 EA
10. 15 h 05
    5 planes 139th
    Not in. Will show on tomorrow's report.
11. 16 h 20
    7 planes 49th
    (1 D.H. 20th) (1 D.H. 11th) Not in. Will show on tomorrow's report.
12. 17 h 05
    1 plane 49th
    Not in. Will show on tomorrow's report.
13. 15 h 45
    1 plane 13th
    Not in. Will show on tomorrow's report.
14. 16 h 07
    4 planes 22nd
    (1 D.H. 11th) Not in. Will show on tomorrow's report.

II. Protection
    None

III. Alerts
    None

IV. Trials
1. 15 h 20-16 h 35
   1 plane 13th
   Testing
2. 15 h 45
   1 Plane 13th
   Not in. Will show on tomorrow's report.

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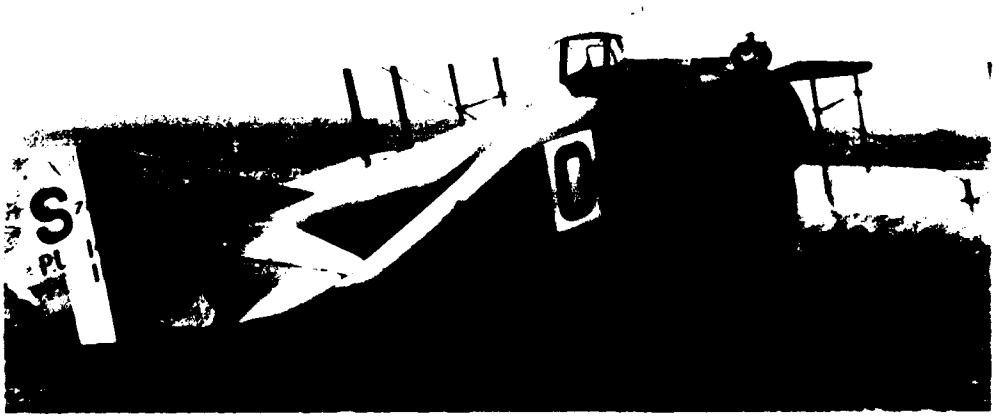
28th Aero Pursuit Squadron
Third Pursuit Group
Operations Office
Sept. 13th, 1918

Daily Operations Report.

1. Special Missions:
   1. 17:40 to 19:15 (9/12) 10 planes 28th Squadron. Route: Vaucouleurs, Void, St. Mihiel, Spada, Vigneulles, Chambley, Montsec, Vaucouleurs. Altitude 800 meters. Mission successful. Patrol leader: Lt. Merrick. Pilots: Lts. Cassady, Hardendorf, Allein, Cline, Greenhalgh, Hardy, Grimmer, Jebb, Buchanan. See reconnaissance report. Flying time 15:50.
   2. 11:35 to 13:45. 14 planes. 28th Squadron. Route: Vaucouleurs, St. Mihiel, Moranville, Etain, Conflans, Gorze, Fliery, Vaucouleurs. Altitude 1500 to 2500 meters. Mission successful. Patrol leaders: Lts. Turnure, Cassady, Merrick. Pilots: Cline, Jebb, Bell, Allein, Hardendorf, Buchanan, Carney, Smith, Grimmer, Greenhalgh, Jacques. See reconnaissance report. Flying time 30:20.



1st Lt. C. Maury Jones, Commanding Officer, 28th Aero Squadron.

2. Trial flights:
   1. 16:15 one new plane #15256 from Colombey-les-Belles
   2. 16:25 one new plane #15566 from Colombey-les-Belles

Summary:

Sorties	25
Trials	2
#No. Pilots available	9
Pilots missing	2
Total planes	25
Available planes	3
Planes not returned	15
Total flying hours	46:40
Total service hours	46:10
Special missions	2
Bombs dropped	19 (190 Kilos)
#No. pilots assigned	24

#Number not including Commanding Officer.

By order of Lt. Jones

A.B. Hill, 2nd Lt. A.S., U.S.A.
Operations Officer.

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28th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Very poor.

Mission: Bombing and machine gunning airdrome at Mars-la-Tour and troops and transports.

Route Actually Followed: Vaucouleurs, St. Mihiel, Moranville, Etain, Conflans, Gorze, Fliery, Vaucouleurs.

Names of Pilots on Patrol and Leaders: Patrol Leaders: Lts. Turnure, Cassady, Merrick. Pilots: Lts. Cline, Jebb, Hall, Allein, Hardendorf, Buchanan, Carney, Grimmer, Greenhalgh, Jacques.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11:55	13:45	100 to 2000 m.	28th	9/13/18

Number of E.A. Seen: 9 Time: 13:00

Number of E.A. Encountered: 1 Time:13:00
Type: Fokker Altitude: 1500 meters
Region: Near Essey Combats: 1
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Patrol did not reach its objective on account of rain.

Lt. Merrick dropped one bomb on train near Conflans, and one bomb in mouth of railway tunnel, also machine gunned camions loaded with troops headed toward Conflans, on Etain Conflans road. No troop concentrations seen.

Lt. Turnure reports seeing one Fokker Mono-plane near Pagny sur Moselle at altitude of 900 meters. Markings on E.A. a violet body and white Rudder; Cross in background of white circle or square. Lt. Turnure climbed to 1500 meters and fired 50 rounds at E.A., then lost him in clouds. Saw him again a few minutes later at 2500 meters, and also four other Fokkers. Lt. Turnure then turned and the nine E.A. followed him to Dieulouard. Fokker appeared to be about as fast as Spads at 2500 meters flying level.

Lt. Cassady reports seeing one blue nosed on ground near Essey. Plane apparently unhurt. Airdrome near Conflans being mined and hangars being torn down. Five German chasse machines seen on ground.

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28th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Poor.

Mission: Bombing and machine gunning concentrations of troops. (Vaucouleurs.)

Route Actually Followed: Vaucouleurs, Arnaville, Coin-sur-Seille, Arnaville, Pont-a-Mousson.

Names of Pilots on Patrol and Leaders: Lt. Stephenson. Pilots: Lts. Turnure, Cassady, Buckley, Allein, Moriarty, Stenseth, Jacques, Buchanan, Cline, Hardy, Merrick, Grimmer.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:10	18:10	100 to 1000 m.	28th	9/13/18

Number of E.A. Seen: 3 and 26 Time: 16:45 and 17:30
Number of E.A. Encountered: 3 Time: 16:45
Type: Fokker Altitude:
Region: Jouy Combats: 1
Number of Rounds Fired: 100 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Patrol was shelled so effectively by anti-aircraft that formation was broken up.

Lt. Jacques dropped two bombs on troops concentrated in outskirts of Arnaville. Troops were not in motion.

The formation was attacked by three Fokkers over Jouy, two of them attacking Lt. Jacques and one attacking Lt. Stephenson. Lt. Jacques fired 100 rounds at the E.A. then lost them in the clouds. Lt. Stephenson was last seen in combat with Fokker.

Lt. Merrick dropped two bombs, making direct hits on troops in street in Arnaville. Also fired on enemy camions headed east on Waville Arnaville road. Lt. Merrick saw 26 E.A. coming from direction of Metz towards Arnaville, at 17:30.

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93rd Aero Pursuit Squadron
Third Pursuit Group
Operations Office
September 13th. 1918

Daily Operations Report.

I. Special Missions.
1. 11:45-13:10 8 planes, 93rd Squadron. Route: Vaucouleurs—

Void—Vigneulles—Fresnes—Arnaville—Pont-a-Mousson—Vaucouleurs. Altitude: 400 meters. See Reconnaissance Report. Lts. Merz, Wright, Nash, Gude, Barry, Harding, Carruthers, Case, Lindsley. Lt. Nash has not returned.

II. Trial Flights

1. -19:05 1 plane, Lt. Long returned from forced landing Colombey-les-Belle.
2. -13:10 1 plane, Lt. Hartman, returned from forced landing Luneville.
3. -14:45 1 plane, Lt. Patterson returned from forced landing Field No. 2 Vaucouleurs.
4. -14:25 1 plane, Lt. Wright, testing.
5. -15:30 1 plane, Lt. Patterson, arrived with new plane from Colombey-les-Belle.

III. Summary

Sorties	13
Trials	5
Combats	1
*Pilots available	19
Pilots missing	1
#Enemy planes unconfirmed	1
Total planes	23
Available planes	9
†Planes crashed	2
Planes not returned	1
Total flying hours	8:50
Total service hours	8:25
Special missions	1
*Pilots assigned to Squadron	22

*Not including Commanding Officer
#Occurred yesterday but pilot did not return until today.
†Occurred yesterday but was not reported until after 19:00 o'clock.

By order of Major Huffer

Earl W. Martin
2nd Lt. A.S., U.S.A.
Operations Officer

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good.

Mission: Machine gun Infantry and Airdrome at Mars-la-Tour.

Route Actually Followed: Vaucouleurs—Void—St. Mihiel—Vigneulles—Fresnes—Hannonville—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Case, Carruthers, and Merz.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11:45	13:10	400 to 500M	93rd	Sept. 13th 1918

Number of E.A. Seen:	Time:		
Number of E.A. Encountered:	Time:		
Type:	Altitude:		
Region:	Combats:		
Number of Rounds Fired:	Confirmations Requested:		
Planes Seen to Have Gone Down in Flames.		E.A.:	Allied:
Planes Seen to Have Crashed on Ground.		E.A.:	Allied:
Planes Seen to Have Gone Down Out of Control.		E.A.:	Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Shot up troops in Labeuville-Hannonville-au-Passage and Sponville. Very little traffic on Labeuville—Mars-la-Tour road. Unable to locate Hangers at Mars-la-Tour. Lieut. Merz fired 200 rounds.

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93rd Aero Squadron

Reconnaissance

Visibility Near Lines: Good

Mission: Special Mission

Route Actually Followed: Vaucouleurs—Toul—Thiaucourt—Lachaussee—Jonville—Woel—Vigneulles—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Gude, Harding, Case, Cox, Long, D'Olive and Carruthers.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:15	17:50	1000 M	93rd	Sept. 13th-18.

Number of E.A. Seen: 4 Time: 17:05

Number of E.A. Encountered: 4 Time: 17:05-17:15

Type: 3 Fokker Monoplane, 1 Pfalz Altitude: 500 Meters

Region: Lachaussee Combats: 4

Number of Rounds Fired: about 200 Confirmations Requested: 4

Planes Seen to Have Gone Down in Flames. E.A.: 1 Allied:1(?)

Planes Seen to Have Crashed on Ground. E.A.: 3 Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Lieut. D'Olive, alone for 3 Fokkers, Lieuts. Carruthers, and Harding for 1 Pfalz.

An enemy aircraft shot down.

Detailed Report of Pilots and Other Observations:

At 17:05, just south of Lachaussee, Lieut. D'Olive encountered Fokker plane and attacked him. Another Spad with Indian head and no. 8 (Lieut. Furlow, 103rd Squadron) attacked at same time. E.A. went into a vrille near the ground. Lieut. D'Olive did not follow plane to the ground as his attention was called to another plane apparently a Spad going towards the lakes Lachaussee.

Lieut. D'Olive, after regaining 500 meters altitude, immediately attacked another enemy Fokker plane in company with Lieut. Furlow. The E.A. crashed to the ground in the region west and slightly south of Charey. The E.A. was smoking slightly when last seen.

Lieut. D'Olive, on again regaining 500 meters altitude, attacked a third enemy Fokker plane in the same vicinity. The plane fell and crashed on the ground between Beney and St. Benoit, slightly east of road, near a crashed Allied Salmson plane. The E.A. had a white tail, red nose, and stripe running diagonally from rear of cockpit across fuselage.

Lieuts. Carruthers and Harding report the following: At 17:05 in the region lying between Woel, Jonville, and Hadonville, they saw a formation of three Pfalz. Both attacked. Lieut. Harding's guns jammed. Lieut. Carruthers dove on the E.A. and after clearing his guns, Lieut. Harding also dove on the enemy and fired until his guns jammed again. E.A. appeared to go out of control and shortly burst into flames.

No traffic observed on the road between Mars-la-Tour and Chambley.

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: Patrol

Route Actually Followed: Vaucouleurs—Fliery—Pont-a-Mousson—Buxieres—Vaucouleurs

Names of Pilots on Patrol and Leaders: Lieuts. Wright, Lindsley, Patterson, and Long.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:30	18:00	2000 M	93rd	Sept. 13th-18

Number of E.A. Seen: 8 Time: 17:05 to 17:10

Number of E.A. Encountered: 3 Time: 17:05

Type: Fokker Altitude: 2500 Meters

Region: Buxieres Combats: 1

Number of Rounds Fired: 250 Confirmations Requested: No
Planes Seen to Have Gone Down in Flames. E.A.: Allied: 1
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lieut. Wright first saw three enemy planes in combat with Allied plane after which allied plane was seen to burst into flames and fell to ground. He fired 250 rounds at one of the enemy planes without success. Immediately after he saw five more planes and was forced to go into a cloud. No troops observed on the road.

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good
Mission: Special Mission
Route Actually Followed: Fliery—Pont-a-Mousson—Buxieres—Vaucouleurs.
Names of Pilots on Patrol and Leaders: Lieuts. Wright, Lindsley, Patterson, and Long.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:50	16:00	2000 M	93rd	Sept. 13th-18

Number of E.A. Seen: 8 Time: 17:05 to 17:15
Number of E.A. Encountered: 3 Time: 17:05
Type: Fokker Altitude: 2500 Meters
Region: Buxieres (north of Chambley) Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied: 1
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

At 17:05, region of Buxieres (north of Chambley) Lieut. Wright saw 3 E.A. in combat with allied plane, after which allied plane was seen to burst into flames and fall to ground. Lieut. Wright fired about 250 rounds at one of the E.A. without apparent result. Immediately following he saw three more Fokkers and was forced to go into a cloud. No traffic observed on Mars-la-Tour—Chambley road.

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Operations Office
103rd Aero Pursuit Squadron, S.C.
Third Pursuit Group
1st Pursuit Wing, 1st Army
September 13th, 1918

Daily Operations Report

1. Special Missions.

1. 17.55-19.30—6 planes, 103rd. Squadron. Route, Vaucouleurs—Vigneulles—Chambley—Beney—Vigneulles—Vaucouleurs. Altitude, 800 Meters. See reconnaissance report. Lieutenants Jones, Faith, Ponder, Irving, Kirtland, and Pyne.

2. 12.05-13.15—16 planes, 103rd. Squadron, Route, Vaucouleurs—Apremont—Vigneulles—Chambley—Waville—Villecey-sur-Mad—Arnaville—Corny—Pont-a-Mousson—Vaucouleurs. Altitude 500 Meters. See reconnaissance report. Captain Rockwell, Lieutenants Larner, Hunter, Eaton, Cannon, Irving, Palmer, Ponder, Jones, Furlow, Kirtland, Pyne, Monroe, Frost, Faith, and Kenyon.

II. Trial Flights.

1. 15.55-16.05—1 plane, Lieut. Faith, testing.
2. 16.00—1 plane arrived from Colombey-les-Belles, Lieut. Tobin, #7641.

III. Summary.

Sorties	24.
Trials	2.
Combats	2.
Pilots available	10.
Total Planes	25.
Available planes	4.
Planes not returned	13.
Total Flying Hours	15.30

Total Service Hours 15.05
Special Missions ..... 2.
Pilots assigned to Squadrons ..... 22.

Bombs dropped:

2 dropped on troops at Champs, burst not observed.
1 dropped on road South of Chambley, burst heard but not observed
1 dropped on Corny, burst not observed.

By order of Captain Rockwell

R. V. Bell
1st Lieut. A.S. U.S.A.
Operations Officer

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103rd Aero Squadron

Reconnaissance Report

Visibility Near Lines:

Mission: Special Mission.

Route Actually Followed: Vaucouleurs—Apremont—Vigneulles—Chambley—Wavrille—Villecey-sur-Mad—Arnaville—Corny—Pont-a-Mousson—Vaucouleurs.

Capt. Robert L. Rockwell, Commanding Officer, 103d Aero Squadron.

Names of Pilots on Patrol and Leaders: Captain Rockwell, Lieutenants Larner, Hunter, Eaton, Cannon, Irving, Palmer, Ponder, Jones, Furlow, Kirtland, Pyne, Monroe, Frost, Faith & Kenyon.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:05	13:15	500 M	103rd	Sept 13th, 1918.

Number of E.A. Seen:	Time:		
Number of E.A. Encountered:	Time:		
Type:	Altitude:		
Region:	Combats:		
Number of Rounds Fired:	Confirmations Requested:		
Planes Seen to Have Gone Down in Flames.		E.A.:	Allied:
Planes Seen to Have Crashed on Ground.		E.A.:	Allied:
Planes Seen to Have Gone Down Out of Control.		E.A.:	Allied:
Markings of E.A.:			

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Supply trains on roads east of Chambley facing north. Aviation field south west of Villecey-sur-Mad with landing T and white cross X.

Lieut. Larner dropped 2 bombs in dense mass of troops at cross roads at Champs. Did not observe bursts. Town of Chambley filled with troops. Many troops on road Chambley—Villecey-sur-Mad.

Lieut. Jones dropped 1 bomb on troops on road south of Chambley. Dropped another on village of Corny. He heard first bomb explode but not the second. On road between Ars and Corny shot up troops and distinctly saw 1 fall. Train of flat cars on railroad from Villecy-sur-Mad to Arnaville, with troops.

Lieut. Hunter attacked biplace Rumpler between Chambley and Lachaussee, altitude 100 meter., at 12:30, firing about 50 rounds without apparent result. The boche flew back into Germany at very low altitude. Shot up Vandelainville and Pagny-sur-Moselle. Also shot up Villecey-sur-Mad and the main road from Chambley to Vandelainville to Arnaville.

Lieut. Pyne was attacked by Fokker monoplace at 12:50 south of Thiaucourt, altitude 1000 meters. In climbing up for position, Lieut. Pyne lost the boche in a cloud before being able to attack him in turn. Enemy ground aerial defences are stronger than yesterday.

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103rd Aero Squadron

Reconnaissance Report

Visibility Near Lines:

Mission: Special Mission.

Route Actually Followed: Vaucouleurs—Montsec—St. Beniot—Villecy-sur-Mad—Vandieres—Pont-a-Mousson—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieutenants Larner, Furlow, Hunter, Pyne, Kirtland, Jones, Eaton, Palmer, Frost and Kenyon.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:35	17:45	500 M	103rd	Sept. 13th, 1918.

Number of E.A. Seen:	Time:		
Number of E.A. Encountered:	Time:		
Type:	Altitude:		
Region:	Combats:		
Number of Rounds Fired:	Confirmations Requested:		
Planes Seen to Have Gone Down in Flames.		E.A.:	Allied:
Planes Seen to Have Crashed on Ground.		E.A.:	Allied:
Planes Seen to Have Gone Down Out of Control.		E.A.:	Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and other Observations:

Lieut. Pyne was attacked by 2 monoplace Fokkers over Woel at 600 meters at 17.10. They dove on Lieut. Pyne, while he was pulling up for position, one disappeared and the other turned and flew off to the north west. Both these Fokkers were marked with white stripes on side of the fuselage running diagonally from cock pit to tail.

Lieut. Larner reports as follows: Near Haumont, I saw a Spad go down in flames at 17.00. At Chambley I was attacked by a formation of 6 Fokkers and one Albatros biplace at 17.10. I dropped 1 bomb on Chambley. At Chambley I attacked one Fokker head on firing 50 rounds who went into vrille. Saw Lieut. Hunter follow this boche as far as 400 meters from the ground east of Chambley. The boche was falling dead leaf fashion until he disappeared against a forest.

Lieut. Furlow reports as follows: I attacked a Fokker over St. Julien at 17:05 firing 150 rounds, boche went down in a dive with a trail of smoke behind him and crashed in region south west of Charey.

Confirmation requested. Saw another Fokker crash a little east of road half way between St. Benoit and Beney at 17.10. At 17.08 attacked a Fokker which was being shot at, at the same time by another Spad—marking #24 in large white figures and red borders. Pulled off to clear gun jam and saw him make a sharp turn to left as if going into a vrille and lost sight of him while watching a Spad go down in flames in same region.

Lieut. Frost reports the following: At 17.05 saw one Fokker attack Spad which went down in flames near Charey. I attacked this Fokker but gun jammed. Fired about 50 rounds.

Lieut. Hunter reports the following: Attacked Fokker (After Lieut. Larner shot 50 rounds head on at him after which he went down in a slow vrille to within 400 meters of the ground) where he recovered. I shot at him in vrille. He leveled out and headed north. Dove on him again firing 50 rounds at very close range after which he fell dead leaf fashion as if out of control. Emptied machine guns, then pulled up and could find no trace of the boche. Last seen he was very near the ground seemingly out of control a little east of Chambley. Confirmation requested.

Lieut. Jones did not return.

Lieut. Kenyon who had forced landing at Ourches reports: At 17.10 over St. Julien was attacked by patrol of Pfalz and Albatros, who came directly in front. One came directly in front of my sights and I shot with both guns. He started falling in dead leaf fashion and after he had fallen about 100 meters saw a cloud of white-gray smoke come out of his cock-pit. (This boche was black with broad white band around fuselage in front of Stabilizer.) I could not watch him to the ground as I was attacked by three Pfalz and also lost sight of our patrol. As my propeller was hit and a spark plug blown out, I dove to within about 50 meters from the ground when the boche who were about 200 meters over and behind me gave up the fight. So I climbed up again and headed home. My propeller broke over Ourches and I was forced to land with the wind. The plane except for the bullet hole is undamaged. The boche I believe fell east of road halfway between Chambley and Wavrille.

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Third Pursuit Group
Operations Office
213th Aero Pursuit Squadron
September 13th, 1918

Daily Operations Report

1. Special Missions

1. 12:15-13:50 17 planes, 213th Aero Squadron. Route: Vaucouleurs, St. Mihiel, Chambley, Mars-la-Tour, Chambley,

Bayonville, Vaucouleurs. Altitude 400M. Two planes have not returned. See Reconnaissance report. Lts. Hambleton, Ford, Matheson, H.S. Loomis, Fish, Pickard, Mell, Hoffman, McAlpin, Grey, Richardson, Phelan, Ogden, Sidler, Aiken, Gaillard, W. F. Loomis.

II. Trial Flights

1. 15:10 1 plane new, Lt. Munn, arrived from Colombey.

III. Summary

Sorties	18
Trials	1
Combats	1
*Pilots available	19
Pilots missing	2
Total planes	25
Available planes	10
Planes not returned	2
Total flying hours	14:05
Total service hours	13:55
Special missions	1
*Pilots assigned to squadron	22

*Not including Commanding Officer.

By order of Lt. Hambleton

E. Norman Hunt
1st Lieut. A.S., U.S.A.
Operations Officer

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213th Aero Squadron

Reconnaissance Report.

Visibility Near Lines: Fair

Mission: Special Mission

Route Actually Followed: Vaucoulers, St. Mihiel, Thiaucourt, Chambley, Mars-la-Tour

Names of Pilots on Patrol and Leaders: Lts. Grey, Richardson, Ogden, Gaillard, Aiken.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:15	13:50	400 M	213th	Sept. 13th, 1918

Number of E.A. Seen: 1 Time: 12:50

Number of E.A. Encountered: Time:

Type: Bi-place | Altitude: 500 meters
Region: Northeast of Mars-la-Tour | Combats:
Number of Rounds Fired: | Confirmations Requested:
Planes Seen to Have Gone Down in Flames | E.A.: | Allied:
Planes Seen to Have Crashed on Ground. | E.A.: | Allied:
Planes Seen to Have Gone Down Out of Control. | E.A.: | Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lt. Grey makes the following report covering the above named pilots. Saw little traffic on the road south of Chambley. North of Chambley extending beyond of Mars-la-Tour heavy traffic consisting of limbers and lorries. Also traffic of the same nature on the road Labeuville going into Mars-la-Tour. This traffic was all withdrawing from the front. In a field to the southwest of Mars-la-Tour scattered with machine gun fire a company of about 150 men. At Mars-la-Tour attacked two convoys of wagons passing towards the village from the west and south, causing confusion. Coming from Mars-la-Tour south, attacked heavily by very accurate machine gun and A.A.A. fire. Location about 2½ kilometers east of Sponville.

Lt. Gaillard reports seeing enemy bi-place northeast of Mars-la-Tour.

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213th Aero Squadron

Reconnaissance Report:

Visibility Near Lines: Fair

Mission: Special Mission

Route Actually Followed: Vaucouleurs, Commercy, St. Mihiel, Hadonville, Chambley

Names of Pilots on Patrol and Leaders: Lts. Ford, Matheson, Pickard, McAlpin

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:15	13:50	400 M	213th	Sept. 13th, 1918

Number of E.A. Seen: 2 Time: 12:50
Number of E.A. Encountered: 2 Time: 12:50

Type: Bi-place | Altitude: 200 meters
Region: Lake Lachaussee | Combats: 1
Number of Rounds Fired: | Confirmations Requested:
Planes Seen to Have Gone Down in Flames | E.A.: | Allied:
Planes Seen to Have Crashed on Ground. | E.A.: | Allied:
Planes Seen to Have Gone Down Out of Control. | E.A.: | Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lt. Matheson reports seeing two enemy bi-place machines painted grey with rudders painted red, white and black. He attacked with no apparent result.

Lt. Ford reports for the above mentioned pilots—shot up road from Hadonville to Mars-la-Tour and transports on road. Transports going towards Mars-la-Tour.

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213th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Fair
Mission: Special Mission
Route Actually Followed: Vaucouleurs, Commercy, Apremont, Thiaucourt, Chambley
Names of Pilots on Patrol and Leaders: Lt. McClure

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:50	18:15	600M	213th	Sept. 13th, 1918

Number of E.A. Seen: 1 | Time: 17:15
Number of E.A. Encountered: 1 | Time: 17:15
Type: Fokker | Altitude: 600 meters
Region: Mars-la-Tour | Combats: 1
Number of Rounds Fired: 30 | Confirmations Requested:
Planes Seen to Have Gone Down in Flames | E.A.: | Allied:
Planes Seen to Have Crashed on Ground. | E.A.: | Allied:
Planes Seen to Have Gone Down Out of Control. | E.A.: | Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lt. McClure reports combat over Mars-la-Tour at an altitude of 600 meters at 17:15. Dove on Fokker and fired one burst of 30 rounds. Enemy plane turned west and dove to low altitude.

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213th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Fair
Mission: Special Mission
Route Actually Followed: Vaucouleurs, Vigneulles, Dampvitoux, Rembercourt
Names of Pilots on Patrol and Leaders: Lt. Aiken

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:45	17:40	700 M	213th	Sept. 13th, 1918

Number of E.A. Seen: 1 Time: 17:15
Number of E.A. Encountered: 1 Time: 17:15
Type: Fokker Altitude 700 meters
Region: Chambley-Waville Combats: 1
Number of Rounds Fired: 50 Confirmations Requested:
Planes Seen to Have Gone Down in Flames E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lt. Aiken reports combat between Chambley and Waville at 17:15 at 700 meters. Fired 50 rounds at an enemy Fokker monoplace machine, which was painted black with white crosses. Enemy plane was firing on a Spad which was in the formation. While firing on this machine was attacked from the rear, zoomed into clouds and upon coming out was unable to find enemy plane or formation.

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 13th, 1918

Operations Report Number 39.

Special Missions

1. 17:40-19:15. 10 planes. 28th Squadron. Route: Vigneulles, Chambley, Altitude 500 meters. See Reconnaissance report.
2. 17:55-19:30. 6 planes. 103rd Squadron. Route: Vigneulles, Chambley, Beney, Altitude 800 meters. See Reconnaissance report.
3. 11:35-13:45. 14 planes. 28th Squadron. Route: St. Mihiel, Moranville, Etain, Conflans, Gorze, Flirey, Altitude 150 to 2500 meters. See Reconnaissance report.
4. 11:45-13:10. 9 planes. 93rd Squadron. Route: Void, Vigneulles, Fresnes, Arnaville, Pont-a-Mousson. Altitude 400 meters. See Reconnaissance report.
5. 12:05-13:15. 16 planes. 103rd Squadron. Route: Apremont, Vigneulles, Chambley, Waville, Villecey-sur-Mad, Arnaville, Corny, Pont-a-Mousson. Altitude 500 meters. See Reconnaissance report.
6. 12:15-13:50. 17 planes, 213th Squadron. Route: St. Mihiel, Chambley, Mars-la-Tour, Chambley, Bayonville, Altitude 400 meters. See Reconnaissance report.

W. Thaw
Major, A.S.; U.S.A.
Commanding

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 13th, 1918

Form Number 1 Pursuit

	28th	93rd	103rd	213th	Hdq.	Total
Sorties	25	14	24	18		81
Trial	1	5	2	1		9
Combats		1	2	1		4

	28th	93rd	103rd	213th	Hdq.	Total
Pilots available	9	12	10	7		38
Pilots Killed						
Pilots Missing	2	1		2		38
Pilots Wounded						
Enemy planes confirmed						
Enemy planes unconfirmed		1				1
Total planes	25	23	25	25	1	99
Available planes	3	2	4	0	1	10
Planes crashed		2				2
Planes lost in enemy lines						
Planes not returned	15	8	13	12		48
Total flying hours	46:40	11:45	28:32	22:35		109:35
Total service hours	46:10	11:20	28:10	22:23		108:05
Exercises						
Target Practice						
Alert						
Patrols						
Special Mission	2	1	1	1		5
Bombing raids						
Pilots enrolled	24	22	22	22		90
Bombs dropped (10 Kilos)	19		4			23
Pilots reported missing yesterday, returned		1				1

W. Thaw
Major,. A.S., U.S.A
Commanding

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96th Aero Squadron

Raid Report

Visibility: Poor

Objective: Chambley

Route Actually Followed: Amanty, Toul, Thiaucourt, Chambley, Toul, Amanty

Number of Teams Participating: 5, 3 reached the objective

Names of Leaders: Lts. Gaylord and Rath

Hour of Departure	Hour of Return	Altitude	Squadron	Date
15:35	16:45	1200 meters	96th	9/13/18

Number of E.A. Seen: 15 Time: 16:00

Number of E.A. Encountered: 15 Time: 16:00

Type: Fokker (probably) Altitude: 1200 M
Region: Chambley Combats: 1
Number of Rounds Fired: 1000 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Out of Control. E.A.: 1 Allied: 2
Markings on E.A.: 2 of our planes, Lts. Farnsworth—R.E. Thompson, Hopkins—Williams.

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation: Pilots and Observers of the formation of the 96th Aero Squadron.

Number of Bombs Dropped: 62-9.2 kilo Type: 90 m/m

Bursts Were Observed At: There were no troops at Chambley so bombed an ammunition dump which took fire.

Remarks on Enemy-Aircraft Artillery: Slight—also used to direct E.A. in our direction.

Remarks On Enemy Airplanes: probably Fokker, canary yellow fuselage and wing with black bands.

Other Observations: Could not locate troops on roads around Chambley.

E. E. Evans
1st Lt. A.S.U.S.A.
Squadron Operations Officer

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Day Bombardment Group
September 13, 1918

Summary of Operations

Mission left at 15:35 to bomb Chambley and returned at 16:40:

Pilots:	Planes:	Observers:
Flight leader, Lt. B. Gaylord	14	Lt. H. G. Rath
Lt. T. Farnsworth Lt. S. Hopkins	18	Lt. R. E. Thompson Lt. Bert Williams
Lt. N. C. Rogers Lt. C. P. Anderson	6	Lt. K. P. Strawn Lt. McDowell

Lt. Anderson and Lt. McDowell did not leave airdrome, plane # 6 forced landing at Badonvillers. Planes number 14 and 18 dropped their bombs when attacked by 15 enemy planes near Chambley. One enemy plane was shot down near Chambley. Two of our planes were shot down. Lt. T. Farnsworth and Lt. R. E. Thompson went down near Charey, Lt. S. Hopkins and Lt. Bert Williams went down near Dommartin.

62-9 kilo (558 kilos) were dropped. Enemy anti-aircraft active near Jaulny.

Itinerary was, Commercy, Thiaucourt, Chambley and Amanty.

Visibility was poor; No hostile airdromes were observed.

Lt. Nelson and Lt. Patterson reported to Maulan for duty yesterday afternoon.

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1st Pursuit Wing

Operations Report Number 13.
From 17 h 00 Sept 12th to 17 h 00 Sept 13th.

1. Atmospheric conditions: Low clouds and visibility poor, in the morning. High winds all day.

2. Enemy Air Service: Active and aggressive in the afternoon. Several patrols of 5 and 7 Fokker and Pfalz were encountered and 2 patrols of 15 Fokkers were encountered. It was obvious that the enemy's pursuit aviation have been heavily reinforced in the afternoon.

3. Activity of our Pursuit Aviation: A strict double tier barrage of the sector was maintained from day-break to dark. In addition the Third Pursuit Group carried out 5 special missions, bombing and machine gunning the roads between Labeuville, Mars-la-Tour, Chambley, Arnaville and Ars. In addition to the damage and destruction caused by these expeditions, intelligence of the highest importance relative to the circulation was obtained.

The Third Pursuit Group engaged in 4 combats prior to 17 h 00 and a late expedition encountered 15 E. A. Fokkers and engaged in a prolonged fight at a low altitude in the region between Lachaussee and Haumont. In its barrage patrolling the 2nd Pursuit Group did not obtain contact with the enemy before 17 h 00 but a late patrol attacked 7 Fokkers north of Chambley.

G. C. 16: did not obtain contact with the enemy but made reconnaissance of importance in the region of Haumont, Vigneulles, Hattonville and Billy.

4. Activity of our Bombing Aviation: 1 raid attempted before 17 h 00; only 3 out of 10 airplanes succeeded in getting away from the airdrome. These planes were attacked by 15 E. A. in the vicinity of Chambley and only one returned to the field. The pilots and observers

of the 2 airplanes lost in the enemy's lines, were Lieutenants Farnsworth, Thompson, Hopkins, and Williams.

Airplanes of the 11th and 20th Aero Squadrons cooperated with the 2nd Pursuit Group in its barrage of the sector.

Miscellaneous: Lieutenant Lindsey, 139th Aero Squadron, 2nd Pursuit Group was slightly injured after a combat and forced landing, Sept. 12th. Lieutenant Putman, 139th Aero Squadron, 2nd Pursuit Group was killed at 18:45 in a combat with 8 E.A. Type, Fokker. His plane was found southeast of Lomay and Lieut. Putnam had 2 bullets through his heart.

Lieutenant Gundelach and Lieutenant Way were killed in the course of a bombing mission in the morning of September 12th. Lieutenant Weeds, 28th Squadron, 3rd Pursuit Group is missing, after an expedition to bomb and machine gun roads in the vicinity of Thiaucourt and Arnaville, Sept. 12th.

Miscellaneous: Corrections: Lieutenant Way, and not Lieutenant Lunt as reported yesterday was the observer lost with Lieutenant Gundelach by the 96th Aero Squadron, on September 12th.

The following pilots are missing from the Third Pursuit Group:

Lieuts. Fish and Phelan, 213th Aero Squadron.

Lieut. Greenhalgh, 28th Aero Squadron.

Lieut. Nash, 94th Aero Squadron.

Summary

	1st Day Bombdmt Group	G.C.	2nd Pursuit Group	3rd Pursuit Group	Total Pursuit
Sorties	11	28	65	71	164
Trials	0	0	1	9	10
Combats	1	0	0	4	4
Pilots on rolls	57	69	84	90	243
Pilots available	43	69	81	81	231
Observers on rolls	62	—	—	—	—
Observers Available	48	—	—	—	—
Pilots killed	1	0	1	0	1
Observers killed	1	—	—	—	—
Pilots missing	2	0	0	4	4
Total Planes	52	77	99	99	275
Available Planes	14	51	58	53	162
Planes Crashed	0	0	1	2	3
Planes lost in enemy lines	2	0	0	0	0
Total Flying Hours	9:09	45:10	63:02	55:30	163:42

	1st Day Bombdmt Group	G.C.	2nd Pursuit Group	Total suit Group	Pursuit
Total Service Hours	9:09	45:10	61:47	53:40	160:37
Patrols	0	6	11	0	17
Special Missions	3	0	0	5	5
Bombing Raids	1	—	—	—	—
62 - 9 kilo bombs dropped					

By order of Lieutenant Col. Atkinson

Philip J. Roosevelt,
Captain, Sir Service, U.S.A.,
Operations Officer.

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Headquarters Ninth Aero Squadron

Operations Report for September 13th, 1918

Atmospheric Conditions.
Night—High Winds.
Day—Rain and high winds.

1. Reconnaissance. Nil.
2. Miscellaneous.
   Planes: 1 D.H. Liberty awaiting night equipment.
   2 Breguets awaiting night equipment.
   1 Breguet in reserve.
   3 Breguets awaiting minor repairs.
3. Observation. Reported by B.I.O.
4. Summary.
   Night Sorties—1 Rec.
   Day Sorties—(1 Rec., 8 practice)
   Service hours—2 hrs.
   Total hours—10 hrs.
   20 planes on hand (19 Breguets, 1 D.H. Liberty), 13 available for duty.
   10 pilots for duty.
   7 Observers for duty.

Harold W. Merrill
1st Lt 103/F.A.
Operations Officer

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Headquarters—24th Aero Squadron
First Army Observation Group

Operations Report for September 13th, 1918

Atmospheric conditions: Visibility good throughout day.
1. Reconnaissance. Nil.
2. Photographic. Nil.
3. Miscellaneous. 11 planes (Salmson 2A2) being repaired.
4. Summary.
   9 sorties.
   9 test flights.
   Service time—Nil.
   Total time—8:35.
   22 Salmson 2A2 planes on hand—11 available.
   13 observers—13 available. 18 pilots—18 available.

John W. Cousins
1st Lt. Inf.
Operations Officer

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1st Aero Squadron
September 13, 1918

Summary of Operations

Reconnaissance. Attempted mission by Pilot Lieut. Erwin, Observer Lieut. Baucom. Was not completed due to rain and low clouds. Time 9:25-10:00. Two planes of the First Aero Squadron furnished Protection 9:05-9:55.

Infantry Contact Patrol. Thiaucourt, Vaucay, 2nd Division. 12:20-17:10. Altitude 200 to 1000 meters. Visibility poor. Pilot Lieut. Groteclose, Observer Lieut. Henry. Panels displayed and message dropped.

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12th Aero Squadron
September 13th, 1918

Summary of Operations

Reconnaissance: Thiaucourt - Vandiers. 6:05-8:30. Alt 400 M. Vis. Poor. Pilot Lt Muller, Observer Lt. Read. 1 plane furnished as protection but was forced to land near Vieville-en-Haye.

Reconnaissance: Chambley—Metz. 12:00-15:15. Alt 200-700 M. Vis Fair. Pilot Lt. Thayer, Observer Lt McClurg. Attacked by 6 enemy planes and forced to land near Pont-a-Mousson. 1 plane furnished for protection.

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50th Aero Squadron

Operations Report

September 13, 1918. 17:00 hr.-17:00 hr.

Atmospheric Conditions—Visibility: Poor.
Reconnaissance.

1. Pont-a-Mousson, Mamey, Regnieville, 5:30-7:05. Alt 300 M. Vis Very poor, rain. Pilot Lt. Frayne, Observer Lt. Sain. See intelligence.
2. Pilot Lt. Beebe, Observer Lt. Bellows. Observer Lt. Bellows killed by machine gun fire from the ground.
3. Vittonville, Eply, Mardigny. 15:00-15:30. Alt 900 M. Vis Very poor. Pilot Lt. Anderson, Observer Lt. Bleckley. See intelligence report.

Infantry Contact Patrol.

1. Pont-a-Mousson, Norroy. 17:40-19:20. Alt 1000 M. Vis Fair. Pilot Lt. Morse, Observer Bellows.
2. Vieville, Norroy, River. 12:30-13:55. Alt 500 M. Vis Very poor. Pilot Lt. Hardin, Observer Lt. Lockwood. Infantry did not show panels when called on.
3. Pont-a-Mousson, Norroy, Vieville. 5:53-7:40. Alt 300 M. Vis Very poor. Pilot Lt. Slater, Observer Lt. French. No panels shown.

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Office of the Chief of Air Service
Headquarters First Army Corps
American Expeditionary Forces
14 Sept. 1918

Summary of Operations for the day of 13 Sept. 1918. No. 4.

Atmospheric Conditions: Unfavorable—Visibility poor throughout the day.

A. Aviation.

I. Reconnaissances: 10 reconnaissances of Corps Sector carried out. Observer Lt. McClurg and Pilot Lt. Thayer, 12th Aero Squadron, were attacked by six enemy planes and forced to land near Pont-a-Mousson at 13:50. Neither pilot nor observer injured. Observer Lt. Bellows and Pilot Lt. Beebe were fired on by enemy machine guns while carrying out a reconnaissance north of Pont-a-Mousson at a low altitude. Lt. Bellows was shot and died before reaching the field.

II. Infantry Contact Patrols: 3 Infantry contact patrols were carried out.

For 2nd Division—1 successful mission. Panels displayed by Infantry and message dropped at Division P.C.

For 90th Division—2 unsuccessful due to fact that panels were not displayed by the Infantry.

III. Photography: Nil.

IV. Adjustment of Artillery Fire: 4 Artillery surveillance missions carried out.

V. Miscellaneous:

3 flights for protection (1)
4 flights for protection (12)

VI. Summary:

1st Aero Squadron:

6 Sorties: 2 reconnaissances; 1 infantry contact patrol; 3 flights for protection.
23 Salmsons on hand—17 available for duty.
19 Pilots carried on rolls—18 available for duty.
15 Observers carried on rolls—13 available for duty.
Total time 9 hrs. 15 min. Service time 9 hrs. 15 min.

12th Aero Squadron.

7 Sorties: 3 reconnaissances; 4 flights for protection.
22 Salmsons on hand—14 available for duty.
20 Pilots carried on rolls—18 available for duty.
18 Observers carried on rolls—15 available for duty.
Total time 6 hrs. 00 min. Service time 5 hrs. 00 min.

50th Aero Squadron:

7 Sorties: 5 reconnaissances; 2 infantry contact patrols.
14 D.H. on hand—12 available for duty.
16 Pilots carried on rolls—15 available for duty.
12 Observers carried on rolls—11 available for duty.
Total time 10 hrs. 30 min. Service time 10 hrs. 30 min.

208th Aero Squadron:

3 Sorties: 3 Artillery surveillance missions.
10 Breguets on hand—7 available for duty.
8 Observers carried on rolls—7 available for duty.
10 Pilots carried on rolls—7 available for duty.
Total time 4 hrs. 50 min. Service time 4 hrs. 50 min.

214th Aero Squadron:
1 Sortie: 1 Artillery Surveillance mission.
10 Breguets on hand—7 available for duty.
7 Observers carried on rolls—6 available for duty.
3 Machine gunners carried on rolls—1 available for duty.
Total time 1 hr. 30 min. Service time 1 hr. 30 min.

B. Aerostation. 3 daylight ascensions—1 night ascension.
5th Balloon Co. 6:00-6:25—0 hrs. 25 min.
15:35-17:00—1 hr. 26 min.
22:15- 5:29—7 hrs. 14 min.
42nd Balloon Co. 13:52-14:13—9 hrs. 21 min.
Total time in air. 9 hrs. 26 min.
Artillery Adjustment: Nil.

By order by Major M. A. Hall C.A.S. 1st A.C.
Paul D. Meyers
2nd Lieut. C.A.C.
Operations Officer

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99th Aero Squadron
September 13, 1918

Missions Carried Out

Pilot	*Observer*	*Missions*	*Time Out*	*Time In*	*Total Time*	*Visibility*
Castleman	Preston	Reconnaissance	6:10 AM	10:00 AM	230	Rain
Simpson	McRossie	Reconnaissance	9:50 AM	10:25 AM	35	Clouds
Markham	Powell	Reconnaissance	1:00 PM	2:30 PM	80	Rain
Doran	Lawrence	Infantry Liaison	2:40 PM	3:15 PM	35	Rain
Eaton	Case	Reconnaissance	2:55 PM	4:30 PM	135	Good
Markham	Neel	Command Plane	3:40 PM	4:50 PM	70	Bad
Kahle	Hill	Reconnaissance	4:30 PM	5:55 PM	85	Clear
McElroy	Hunter	Reconnaissance	4:40 PM	6:20 PM	100	Fair
Blumenthal	McLachlan	Reconnaissance	5:00 PM	6:35 PM	95	Clear
Sanford	E. Stewart	Reconnaissance	?	?	?	
			TOTAL		14:25	

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104th Aero Squadron
September 13, 1918

Summary of Reports

Squadron took up work of Corps reconnaissance, the Divisional work for the 26th Division being turned over to a detachment of the 88th Aero Squadron. Lieut. Coffin, pilot, and Lieut. Northrup, observer, and Lieut. Morris, pilot, and Lieut. Full, observer, made a reconnaissance over Corps front; nothing unusual to report. Lt. Weeks, pilot, and Lt. McCann, observer, made artillery reconnaissance over Corps front, located front troops, sighted one enemy two-seater plane. Lt. Ellis, pilot, and Lt. Nichols, observer, made a reconnaissance of Rupt, Mouilly, St. Remy, and Dommartin; no great enemy activity. Lieut. Jacobi, pilot, Lt. Beard, observer, made a reconnaissance of sector, reporting much movement and activity of Allied troops, nothing of the enemy. Lost way on return and landed at Belrain. Lt. Roberts, pilot, and Lt. Williams, observer, made a reconnaissance over Corps front, reporting continual advance of Allied troops, nothing of the enemy. Lt. Arthur, pilot, and Lt. Wood, observer, made artillery reconnaissance of Corps front, no enemy batteries to report, great activity of our troops. Lt. Clark, pilot, and Lt. Gilchrist, observer, made reconnaissance of Corps front. Found enemy troops on the Haumont-Lachaussee road moving northeast; located a German anti-aircraft battery and report much activity of our own troops and aviation. Lt. Reynolds, pilot, and Lt. Polley, observer, made reconnaissance of Rupt, Vigneulles, St. Benoit, Woel, Doncourt, and Combres. No enemy troops found. Many fires and explosions reported. Lt. Weeks, pilot, and Lt. Northup, observer, made reconnaissance of Corps front, nothing to report. Weather throughout the day was generally poor for observation work. Rain and low hanging clouds being very often encountered. No news of Lt. Johnston, missing since previous day. Lt. French and Vowles arrived from Luxeuil. On this day, Friday the thirteenth, the Squadron first operated as a separate unit over the front. Had 18 hrs. and 40 minutes flying time, performed without accident or casualties. Squadron pilots and observers divided into three flights. Lt. Ellis, Wallace, and Roberts made Flight Commanders of the First, Second, and Third Flights respectively. From past experience, the commanding officer believes the following scheme of operation to be the best for an observation squadron and the same is accordingly put into effect this date: Pilots and Observers are "paired off" and assigned to flights. The aeroplanes of the squadron are assigned five to a flight with the remainder in a general reserve. Two pilots with observers are

assigned to each of three planes in a flight. This method assigns all pilot and observers to definite planes with which they become thoroughly familiar and leaves two planes in the flight as a reserve. All pilots and observers become familiar with these reserve planes. Five planes are always kept in commission in each flight by drawing on general reserv The advantage of this arrangement is that a pilot and observer going o a mission have a knowledge of the peculiarities of the particular plane they are flying. Also, when a team is assigned and has studied a mission, they may accomplish same in their own plane or the reserve plane which is always ready. They do not have to take some other pilot's particular plane, neither is it necessary to hurriedly assign a ne team because one team's plane has failed. Except on days of heavy duty, such as the beginning of an attack, it is the policy to have two flights on duty each day with one on repose.

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Headquarters Air Servic
Fifth Army Corps, American E.F

Operations Report Number 38, 19:00 Sept. 12 to 19:00 Sept. 13, 1918.

1. Atmospheric Conditions: Low clouds. Rainy and high wind.
2. Points of Interest: Combat with enemy Halberstadt near Vigneuelles, Lt. Babcock, Pilot, shot 18 rounds with fuselage gun. Enemy disappeared to east in clouds without firing.

Visual Reconnaissance:

Bonzee-en-Woevre—Vigacalles [?]; report fires in those towns an fires in towns along road between them.

Veux les Salemeix—Watronville; report towns Dampvitoux, Thillot, and St. Maurice burning.

Haulimont [?]—Harville—Moranville; report train of 16 cars (passenger coaches) left Pintheville going east at 7:12.

Enemy formation of nine planes were seen at about the same time by two of our planes not near enough to attack.

No response from the American Infantry when the line is called for Very little from French Division.

No Artillery controls made account bad weather.

By order of Major Christie:

Fraser Hale
1st Lt. FA USA
Operations Office

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Headquarters Commander Army Balloons
First Army
September 13, 1918

Supplementary Report of Operations, Balloons First Army for September 11th-12th.

Ascensions:

B-20. (French). 19.45 to 20.25. Alt 450 Meters. Tension 640 to 800 Kilogs. Balloon punctured, obliged to return to bed. New balloon inflated East of Fort de Troyon. Trial ascension at 12.45. Alt 100

A balloon bed.

meters. Tension 400 to 800 Kilogs. Balloon moved forward from Troyon-sur-Meuse for Seusey but obliged to stop on account of road blocked.

B-41. From Gironville to Bouconville.

B-52. From Boncourt to Buxieres.

B-53. In reserve at Vignot.

Fifth Corps. Balloon positions for September 14, 1918.

B-8. Two kilometer North Mouilly.

B-20. 1 Kilometer North East of Deuxnouds (2nd. Colonial Corps).

B-52. At Heudicourt (2nd Colonial Corps).

B-41. At Nonsard (Army).

Paegelow

Daily Report Operations Balloons First Army.
September 12th-13th.

Balloon Wing, First Army Corps. Noon to Noon.

Ascensions:

1st Co. No ascensions because of rain, wind and low clouds.

2nd Co. 18:55-19:22. Observer Lt. Dungan. Alt 400 M. Vis 10 Kilometres, very high winds.

5th Co.

12:45-13:00. Observer Lt. Bowers, Lt Furber. Alt 500 M. Vis 4 Kilometres, Windy.

6:00-6:25. Observers Lt. Bowers, Lt Furber. Alt 500 M. Vis 3 Kilometres. Low clouds.

42nd Co. No ascensions.

Observations:

1. Enemy Infantry. Nil.
2. Enemy Artillery: 19:12. Shell arriving north of Mamey (B-2).
3. Enemy Aeronautical Service: 19:15. Balloon on a line over Jaulny (B-2).
4. Circulation, roads and Railroads. Nil.
5. Destructions, explosions, fires:
   19:00. Heavy smoke from shell fire north of St. Benoit (B-2).
   19:05. Five fires at Hageville and Dampvitoux (B-2).
   19:10. Heavy shelling around Jaulny (B-2).
   19:12. Fire in Vieville-sous-les-Cotes (B-2).
   19:13 Explosions approximate line left of Vigneulles (B-2).
   19:11. Three star smoke rockets to left of Jaulny (B-2).
6. Trench Work, Shelters, Etc. Nil.

Adjustments of Artillery. Nil.

Balloon Wing, Fifth Army Corps, 1900 O'Clock Sept. 12,
to 19:00 O'Clock Sept. 13

Ascensions:
6th Co. No Ascensions.
7th Co.
5:55-6:15. In ballast, clouds at 300 meters.
18:20-18:45. Observers Lt Higgs, Sgt Nicholas. Alt 500 M. Vis First lines, hazy beyond.
8th Co. No Ascensions.
12th Co. No Ascensions.
Observations:
18:40. Enemy plane approaching Balloon No. 7 (B-7).
7:30. Enemy Balloon (Harville) in ascension till 7:35 (B-7).

Balloon Wing, Fourth Army Corps. Noon Sept. 12 to Noon Sept. 13

General impression of the day. Sector Active, traffic jammed, but gradually clearing up. Most of the 75s have come up, 122s and 124s are on the way.

8. Miscellaneous.

14:00. B-9 left Raulecourt for Xivray—Marvoisin, arrived 20:00 O'clock. No ascension account of wind, rain, low clouds. Telephone central to artillery central at Richecourt. Ascension Point 356.070-232.250.

Reports from other companies not received account no courier service.

Hdqrs Chief Air Service Fourth Army Corps
17:00, September 12 to 17:00, Sept. 13, 1918.

Atmospheric Conditions: Visibility poor in morning fair in afternoon.
Headquarters Balloon Wing.
Ascensions:
43rd Co. 1 Ascension, 10 Min.
Enemy Balloons:
Beney. 6:24-6:31, 7:37-7:40. 10 Min.
Woel. 6:29-6:31. 2 Min.
Grange. 7:35-8:10, 11:00-11:01. 36 Min.
Balloons [First Army:]
No. 9. 356.000-231.500
No. 3. 257.500-230.500.
No. 10. 361.500-231.500.
No. 69. 359.100-231.100.
No. 43. 361.200-234.400.

Addition. Received at 7:45 O'Clock. Enemy balloon directing fire on front of 82nd Division.

John A. Paegelow
Major, A.S., U.S.A.
Commanding Army Balloons, First Army

Headquarters Air Service
First Army
American Expeditionary Forces
France, 6:15 PM, 13, September, 1918

From Balloon Headquarters 5th Corps.

1. Balloon No. 7 in ascension from 5:55 to 6:15 pm, in ballast, clouds down to 350 meters.
2. Enemy balloon, Harville, in ascension from 7:30 to 7:35 am.
3. Practically all companies taking new positions.

14:15 P.M., Fifth Corps,. Sept. 13, 1918. Report on the conditions of the line authentically at this time:

From Combres to Herbeuville South east to Hannonville south Thillot north to Maurice thence to Billy along the road to Hattonville south to lower part of Bois-de-Chaufour thence straight to Jaulny continuing to Pagny.

15:10 P.M., Fifth Corps, Sept. 13.

Sixth Balloon Company is now on its way to Dommartin.

Ninety third French going into position at St. Remy.

Paegelow

18:30 P.M., Fourth Corps, Sept. 13, 1918.

At 15:50 O'Clock Balloon operating at co-ordinance G-31.10 connected with Col. Spurgeons Group and ready to regulate.

B-10's new position will be approximately G-00.45.

From 12:00 to 15:30 Jaulny was under heavy shell fire. At 14:34 Dommartin was burning. At 15:30 enemy balloon burned beyond Beney. The 9th, 10th, 43rd and 59th Companies were in ascension this afternoon. Third Co. was moving and inflating preparatory to ascent. 43rd Balloon moved from the south of Flirey to the North of Flirey 2 Kilometres.

Paegelow

Headquarters Commander Army Balloons
First Army
September 13, 1918

Memorandum for: Chief of Staff, Air Service, First Army

The following changes in Balloon positions following yesterday's movements are hereby submitted for your consideration:

First Corps

B-1. Same position, not located.
B-2. From Griscourt to near Mamey
B-5. From Dieulouard to 1 Kilometer North of same village.
B-42. At Ville-au-Val

Fourth Corps

B-3. From south of Ramonville to position near St. Baussant
B-9. From Raulecourt to Richecourt
B-43. From Ansauville to North of Flirey
B-69. From Etang Neuf-de-Mandres to Bois du Jury

2nd Colonial Corps

B-51. No report
B-52. From Boncourt to North of Petite Mandres
B-20. From North of Thillombois to Troyon-sur-Meuse

Fifth Corps

B-6. From Villers-sur-Meuse to West of Mouilly
B-7. No report
B-8. From 2 Kilometers N.E. of Dieue to 1 kilometer South of Sommedieue.
B-93. No report

Army Balloons

B-10. From Ansauville to Bois-de-la-Hazelle
B-11. At Gezoncourt
B-39. Same location
B-41. From Jouy to Gironville
B-16. Same location

John A. Paegelow
Major, A.S., U.S.A.
Commander Army Balloons, First Army

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Information Section
Air Service, First Army
September 13, 1918

Reports Received

Report from 2nd CAC, 13th September 8:55. Line reached by the 17th C.A., 2nd French Army: Bois des Caurieres—Bois du Grand Chenas—near Dieppe—center of the Bois Nobras—Station of Abaucourt—Moranville—Blanzee. Report received by Operations section from 4th Corps Group at 8:00 Hostile troops in Bois de la Montagne K3, H7 at 6:15. 30 R.R. cars between points EO, M8 and

E9, H4 at 6:20, Spad monoplane on ground at Bq[?], H2 at 6:15. Haumont on fire, Xammes on fire at 6:05. Aviation field at Rambois deserted at 6:10, fire in Dommartin at 6:15. One enemy plane seen. Germany battery seen at X7, J3 at 6:10. Our shells falling at K3, H7 a 6:10.

Report from First Pursuit Group, 13th September 10:50.

Lieutenant Nolan 95th Squadron reports American troops in Vigneulles. North Haumont on fire and all the towns and woods in th vicinity of Lake Lachaussee are burning. Enemy line along Sponville, Xonville, Hageville. The railroad from Chambley to Conflans and the highway from Mars-la-Tour to La Barraques are filled with German troops.

The 27th American Squadron reports American troops on the top of the ridge from Vigneulles to les Eparges. Plane was within 50 feet c the ground and the American troops waved at him.

Report from 2nd C.A.C., (French Time 10:50). Balloon 52 reports Montsec hill taken by 39th Division (French) still progressing.

Report from reconnaissance mission sent out from Maulan, 13th September 11:20. From 8:45 to 10:45 Lt. Corral, Pilot and Lt Stohl, observer. Vigneulles is burning. All towns on road running north and south through Vigneulles are also on fire. Hannonville was not on fire No American troops seen in Vigneulles. Saw small group of soldiers a St. Benoit who were believed to be Americans. Flew over woods southeast of Vigneulles at altitude of 100 to 200 meters and saw no troops movements on roads. R.R. track show effect of artillery fire.

Report from 2nd CAC French, 13th September 11:45. Patrols in Chaillon. American cavalry at Creue and east of Vigneulles north of th road Vigneulles—St. Benoit. American infantry between St. Benoit and Etang de Carpiere. Patrols in Dampvitoux woods along the railroa track to 00.90. Boches from Lachaussee to Dampvitoux and Marimbois, Ferme, Dampvitoux, Lachaussee, St. Benoit are burning.

Report from Independent Force, R.A.F., 13th September 12:15. IFG299, 13th. The railway at Metz-Sablon was heavily attacked last night by British Night flying machines. Three 550 lb bombs, seventy nine 112 lb bombs, besides many small bombs were dropped with goo results. Courcelles station was also attacked, nine 112 lb bombs beside small incendiary bombs being dropped. Transport leaving Chateau Salins for Metz was attacked with machine gun fire and many rounds were also fired at Metz station and at Searchlights.

Report from Independent Force, R.A.F., 13th September 12:15. IFl 102,13. Bomb raids last night, report as follows. Metz-Sablon lighted a 1220 A.M. One train seen on Metz-Briey line leaving Metz at 12:23 A.M. One train on Metz-Faulquemont Line leaving Metz 12:23 A.M. One small convoy seen on Chateau Salins-Metz road at one A.M. General Impression: activity not abnormal. Observations difficult. Repeating CAS First Army.

Report from Army Observation Group, 13th September 13:10. Visibility fair—low thick layer of clouds. Clouds were so low to the south of Metz that it was not possible to reconnoitre to the SW of that city. Route followed: Fresnes—Pareid—Mars-la-Tour—Lachaussee—Chambley—Ars—Pont-a-Mousson. R.R. movements—one train of 20 cars in the Chambley yard at 10:35 A.M. No R.R. movement from Conflans west at 10:32. No road movement from Conflans west at 10:32. Convoy of infantry and trucks 5 km. in length going south from Rezonville to Gorze at 10:45. A mixed convoy 3 km in length going north from Noveant at 10:45. Activity in vicinity of dumps at Gorze and St. Louis Ferme. No movement westward of the line Conflans—Mars-la-Tour and Chambley with the exception of single scattered vehicles. Large fires at Haumont, Lachaussee, Dommartin, Vigneulles, Phillot and all towns along the Meuse hills. Enemy troops in large numbers mixed irregular units with infantry, and trucks were in towns of Chambley, Mars-la-Tour, Thionville, Rezonville, Gorze, Dornot, Noveant, Brouville,. Waville.

Report from Fourth Corps Observation Group, 13th September 13:30. Reconnaissance over Hindenburg line. Visibility was poor. Cloudy and rainy flying at an altitude of 100 meters they could see practically nothing but observed that the Hindenburg line was occupied. A.A.A. active but behind the lines it was raining and they were unable to see any activity.

Report from First Pursuit Wing, 13th September 14:00. Reconnaissance reports at 13:15 o'clock that towns of Hattonville, Vigneulles,St. Benoit and lakes to the west of St. Benoit were in possession of American troops. Our troops were proceeding towards the north and northeast without meeting much opposition. Body of two to three hundred American Infantry proceeding along St. Benoit—Haumont road towards northeast at 13:00 one km. from St. Benoit. Another body of American infantry of two or three hundred proceeding along St. Benoit—Woel road toward Woel, about two and one half kilometers from St. Benoit at 13:00.

Report of reconnaissance by British Independent Force, 13th September 14:00. Altitude 2000 feet. Road movement—Jarny to Mars-la-Tour choked with transports. Infantry from "T" of Tronville to Chambley. Transports on Gorze—Chambley road. Dumps on fire just southeast of Vionville, also fire in the Bois de Hannonville and Bois de Maizeres. Area east of the Mar-la-Tour—Chambley road occupied by infantry in small parties, also the area Brainville, Hannonville, Ville franc [?], Pareid.

Report from First Pursuit Wing, 13th September 14:20. Convoy of infantry and trucks of 5 km length going south from Mars-la-Tour to Buxieres at 10:45. Convoy of infantry and trucks 5 km length going south from Rezonville to Gorze at 10:45. Mixed convoy of 5 km length going north from Noveant.

Report from Independent Force. R.A.F., 13th September 16:00. Confirms our report A-46 [Independent Force, 14:00, above] received 15:00 p.m., except dismantling of airdromes on which they have no information. In addition they report dismantling of dumps around Chambley and Xonville. Small bodies of troops in area southwest of Conflans moving northeast.

Report from French Information Section, 13th September 16:20. French Air Division reports reconnaissance at 14:00 p.m. No enemy planes encountered. Many trains of cars on tracks between Vandelainville and Waville. Two trains of cars between Waville and Rembercourt. Great quantity of material on station platform at Rembercourt. 50 wagons on track 1 km south of Chambley. Train of 20 camions on road from Chambley to Mars-la-Tour. Troops and wagons going on road from Woel to Marcheville. Enemy troops going from Doncourt-aux-Templiers to north. No circulation on road Jonville—Woel. No artillery activity. Heavy AAA activity in area of Chambley and Mars-la-Tour.

Report from Army Observation Group, 13 September 16:20. Reconnaissance at 15:40 to 16:15. Road Chambley, Dampvitoux, St. Julien, Charey, Waville, Rembercourt well filled with troops and truck trains going to Hindenburg line.

Report from First Observation Wing, 13th September 16:30. Our troops progressing around Lachaussee, Dampvitoux and Hadonville. Xonville, Lachaussee and Chaumont on fire. Friendly artillery firing on Metz (very heavy firing). Friendly artillery firing from position north of Thiaucourt toward Preny. This plane was attacked by three enemy planes south of Metz.

Report from Independent Force, R.A.F., 13th September 17:00. Important enemy columns in retreat from Chambley towards the east, from Mars-la-Tour toward Metz and Amanvillers, from Harville towards Conflans.

Report from First Pursuit Group, 13th September 17:10. Front between Gorze and Chambley. 4 horse artillery going out of Chambley into the open, from Chambley west. Haumont and small farms in vicinity of fire. Troops apparently holding line along road from St. Hilaire, 4 km south toward St. Benoit. Machine gun seats at Raville. French from southwest advancing from Fresnes on the Marcheville road apparently in extended order. Nothing burning back of the Hindenburg line or south of Chambley. Bi-place, smashed beyond recognition seen a little south of Spada.

Report from Fourth Corps, 13th September 19:20. Mission from 15:55 to 16:55. Observer Lieut. Hart, Pilot Lt. Shotte. Observed two Breguets attacked by six Fokkers and 2 Albatross. One Breguet brought down in flames and six enemy planes then attacked. Was shot from all directions. Our plane escaped. AAA active at this time. Fight occurred over Dommartin. Altitude 2500 feet. Our front line runs from point ot

Charey wood to south edge of Bois de la Montagne. Organized shell holes and trenches being dug. Another mission 15:05 to 16:25. Observer Lt Pike, 90th Squadron. Chain of enemy camions going northeast from Charey at 15:25. Enemy shells falling at 656,383 at 15:15. All towns in back area on fire. No enemy planes seen. AAA active and accurate at Dampvitoux at 16:00. Hole shot in plane by A.A.A. Message dropped at the first advance P.C.

Report from First Pursuit Wing, 13th September. Heavy traffic on road between Chambley and Mars-la-Tour; also in the Labeuville road. Camions filled with troops are proceeding from Conflans to Etain. The air dromes at Conflans and Mars-la-Tour are being dismantled. Chambley is heavily occupied by the enemy. Heavy movements seen from Villecey to Chambley; also north from Arnaville to Corny—Ancy (troop movements.) This information is confirmed by Escadrille No. 1 which has been machine gunning traffic going northwest. No sign of counter attack.

Report from Aerial Division, 13th September 21:25. A reconnaissance by pursuit at the end of the day signals an important intact dump in the quarries northwest of St. Julien-les-Gorze. Chambley in flames. Tanks northeast of Rupt de Mad which seems to be strongly held by the enemy between Rembercourt and Waville. Northwest bank of Etang de Lachaussee seems to be held by enemy.

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Headquarters, Air Service, First Army
American Expeditionary Forces

Operations Report Number 14, 19:00 Sept. 12th, 19:00 Sept. 13, 1918.

1. Atmospheric Conditions. Visibility very poor. Clouds at 300 meters in the early morning, lifting slightly at mid-day. Low clouds and mist in the late afternoon.

2. Enemy Aerial Activity. Enemy pursuit aviation, consisting in most places of Fokker bi-planes was employed in patrols of from seven to fifteen each. In one or two cases, mixed patrols of Fokkers and Pfalz planes were encountered.

As on previous days, the enemy employed his aerial forces in rather close proximity to his anti-aircraft batteries and at no time closer than 4 or 5 kilometers to the front lines.

Anti-aircraft was very active throughout the day.

A number of enemy balloons were in ascension during the early hours of the morning, and during this opportunity, two of them were destroyed.

3. Activity of Our Own Aviation.

(a) Pursuit. Extremely adverse weather conditions again prevailed, but our Pursuit Aviation nevertheless assisted in a very decisive manner in the attack during the course of the day.

Reconnaissance missions by the 1st Pursuit Group in the early morning rendered valuable information as to the locality of the front lines and the situation of the advanced patrols. In one case pilots of this group, while endeavoring to locate the enemy front lines, flew within 10 meters of the ground, at which time, friendly troops gave their location by means of coats and other personal effects.

Barrage patrols over the sector from Vigneulles to Nomeny were maintained throughout the day by planes of the 1st Pursuit Wing. These patrols were very effective in preventing the enemy air units from entering the Zone of Operations of our Corps Observation, which was enabled to work unmolested throughout the entire day, only being attacked in one instance. In addition to the above barrage patrols, the First Pursuit Wing carried out no less than 15 special missions, reconnoitering the enemy back areas, attacking concentrations of enemy troops and transports on the roads by means of bombs and machine guns. Enemy troops were attacked particularly by these planes in the valley of the [illegible]d, and between Conflans and Mars-la-Tour and Chambley. Several d[illegible]ct hits were observed, and valuable information was brought back from every mission.

A German anti-aircraft battery.

The French Division of the Air made 49 patrols in the course of the day, in the course of which over 12,000 rounds of machine gun fire were directed at troop concentrations and convoys on the highways. During the course of these patrols, seven combats occurred as the result of which 5 enemy planes were probably destroyed.

(b) Observation. In spite of extremely low clouds a great number of visual reconnaissance missions were made by all branches of Observation.

The First Army Observation Group carried out twenty reconnaissance missions far back in the enemy lines, bringing back very important information concerning the direction and intensity of the enemies movements. Only one enemy plane was encountered by the Army Observation Group in the course of the day, and that occurred over Metz at 15:30 when a single Fokker attempted to force the mission back over the lines. This enemy plane was shot down just south of Metz.

Corps Observation performed a great number of infantry liaison patrols establishing the location of our advancing front lines during the entire course of the day. Accurate location was also given of a number of very important enemy targets, including convoys of enemy artillery, troop concentrations, ammunition dumps and machine-gun nests. A special mission by the 4th Corps Observation Group at 13:30 returned with important information concerning the Hindenburg line. This mission was made at an altitude of only 100 meters, but in spite of extremely active anti-aircraft fire, completed its mission, and returned unmolested by enemy aircraft. The 4th Corps made a great number of successful reconnaissance missions returning with valuable information concerning the movement of enemy troops and trains, also located our advancing front lines by means of infantry panels. This mission was also successful in locating a number of enemy batteries. A special mission by Command Airplanes was made over the front lines, and brought back tactical information of importance to the Army Command.

(c) Bombardment. Bombing planes of the Aerial Division dropped several tons of bombs in the course of the day on convoys and troop concentrations in the immediate rear of the enemy's front lines.

In spite of the bad condition of the Airdrome, a number of planes of the First Day Bombardment Group made a very successful bombing raid on enemy transport reported moving north from Chambley.

The Independent Force, R.A.F., although experiencing great difficulty in leaving the ground on account of mud, dropped a considerable number of bombs on Champey, Metz, Sablon, Orny and Verny. Many direct hits were observed and on the return trip after one of those missions, three planes were attacked by fifteen Fokkers. One enemy plane was brought down in flames, and two British planes failed to return.

(d) Balloons. Weather was unfavorable for continuous balloon observation but all of our balloons followed the advance of our troops very closely remaining constantly in close liaison with our artillery.

Operations Report No. 14 (Cont'd)

Airplanes		French Aerial Division	Pursuit		Bombardment		Observation		Corps Observation Wing			
			1st Group	1st Wing	1st Army Day Group	Fr Night Group	1st Army Group	Heavy Artillery Group	1st Corps	4th Corps	5th Corps	2nd Fr C.A.C.
Sorties		230	83	164	11		24	14	20	49	28	15
Trials			5	10			5			7	10	
Combats		7	1		1		1	3	2	3	1	
Pilots	On Roll	667	79	243	57		34	44	50	61	58	41
	Available	451	75	231	43	28	34	41	48	57	44	36
	Missing	4	2		2			1	2	2		
	Wounded	1										
	Killed											
Observers	On Roll	247			62		27	23	44	49	49	28
	Available	176			48	36	27	19	38	41	46	27
	Missing	4			2			1	2	1		
	Wounded	1						2				
	Killed											
Enemy Planes	Con.		2									
	Uncon.	1		4	1							
Planes	Total	595	97	275	52		46	42	57	72	70	37
	Available	426	68	162	14	33	35	32	36	67	43	31
	Crashed			3								
Total Hours	Flying:		63:31	163:42	9:09		32:05		19:52	48:28	63:00	
	Service		63:08	160:37			25:38		19:52	45:28	55:00	31:00
Exercises												
Target Practice											1	
Alerts									1	2	1	
Patrols		40	12	17								
Protections		5							4			
Voluntary Patrol		4	7									

Reconnaissances	Visual	3					16	8	6	6	21	5
	Photo									1		
	Night											
Plates Taken	Suc											
	Unsuc											
Adjustments							6					
Rounds	Fired											
	Observed											
Cartridges fired		12000									100	
Infantry Liaison									1	14	5	11
Special Missions				5	8						10	
Ferry Flights												
Bombing Raids					1							
Bombs Dropped	50 Kg.											
	20 Kg.											
	10 Kg.											
	Kilos											
		1450kg										

Balloons	American	French
Ascensions	1	2
Hours of Flight	0:10	2:10
Adjustments		
Rounds		
Fired	14	
Observed		

William Mitchell
Colonel, A.S., U.S.A.
Chief of Air Service, First Army

By Thomas S. Bowen
Major, A.S., USA
Operations Officer

Plane Situation, First Army
Sept. 13, 1918

Station	Group	Squadron	On hand yesterday	Lost	Received	On hand to-day	Due on Order	Available for duty		Spad 13	Salmson 4	DH 4s B	DH 4s Ob.	Breg. B Breg. Ob.
Toul	2nd Pursuit Group	13	25	0	0	25	0		Spad	25				
		22	24	1	2	25	0			25				
		49	25	0	0	25	0			25				
		139	25	1	0	24	1			24				
	1st Corps Observation	1	23	1	0	22	1		Salmson		22			
		12	22	2	0	20	4				20			
Gondreville	Army Observation Group	24	24	0	0	24	0				24			
		91	24	0	0	24	2				24			
Vaucouleurs Field No. 1	3rd Pursuit Group	28	25	0	0	25	0		Spad	25				
		93	25	0	0	25	0			25				
		103	25	0	0	25	0			25				
		213	25	0	0	25	0			25				
Ourches	4th Corps Observation Group	8	24	5	0	19	5		DH 4				19	
		90	24	2	0	22	2		Salmson		22			
		135	24	4	0	20	4		DH 4				20	
Amanty	Night Recon. Day Bombing	9	18	0	0	18	7		Breg					18
		96	19	0	0	19	0							19
Bicqueley	1st Corps Observation Group French	50	16	0	0	16	8		DH 4				16	
Souilly	5th Corps Observation Group	88												
		99	24	0	0	24	0		Salmson		24			
		104	24	0	0	24	0				24			

Rembercourt	1st Pursuit (218th Park) (Flight C, 648 Supply)	27	25	0	0	25	0	Spad	25						
		94	25	0	0	25	0		25						
		95	25	0	0	25	0		25						
		147	25	0	0	25	0		25						
		11	21	4	4	21	2	DH 4			21				
		20	23	2	1	22	3				22				
Total			609	22	7	594	39		199	160	43	55	19	18	

Airplane Gas and Oil Report
Air Service First Army
Date Sept. 13, 1918

Report from Equipment Department

Station	Kind	Gallons on hand yesterday	Gallons Delivered	Gallons Received	Gallons on hand today
First Air Depot	Fighting Spirits	4,150		15,840	19,990
	Gasoline	57,924	11,093	0	46,831
	Castor Oil	24,781	1,855	0	22,926
	BB Oil	20,352	800		19,552
Rembercourt	Fighting Spirits	3,721			3,721
	Gasoline	50,402			50,402
	Castor Oil	7,353			7,353
	BB Oil	36			36
Souilly	Gasoline	5,945			5,945
	Castor Oil	10,969			10,969
Toul	Gasoline	11,827	346	2,030	10,310
	Fighting Spirits	747			747
	Castor Oil	30			30
Mobile Park No. One	Fighting Spirits	5,386			5,386
	Gasoline	16,905			16,905
	Castor Oil	4,550			4,550

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Air Service
First Army

Hostile Movements, Changes and Conduct

September 13th—Enemy aviation consisted in most cases of Fokker bi-planes employed in patrols of from seven to fifteen each. In one or two cases mixed patrols of Fokkers and Pfalz planes were encountered. During the entire day the enemy employed his aerial forces in close proximity to his anti-aircraft batteries. A number of enemy balloons were in ascension during the early hours of the morning, two of which were destroyed by our aerial forces. There was one reconnaissance in the morning over St. Genevieve and there was also one at about noon by twelve planes to the west of St. Mihiel. Later in the day hostile pursuit planes showed some activity within their own lines.

First French newspapers in four years arrive at St. Mihiel, 14 September 1918.

Orders

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First Army, A.E.F.
Ligny-en-Barrois, September 13, 1918—23:45 h

Field Order
No. 11

1. The First Army, A.E.F., has today completed the junction between the northern and southern attacks, completely cutting off the St. Mihiel salient and capturing many prisoners, material and munitions of war. The objective was reached at all points. Strong reconnaissance is now being pushed out by the I, IV and V Corps to determine whether the Hindenburg Line is held and in what strength.

2. (a) The army objective will be occupied by all corps tonight and organized for defense in conformity with the directions contained in F. O. 9, these headquarters. All corps will advance strong reconnoitering forces to the Hindenburg Line. Early information is desired as to whether or not this line is held by the enemy and if it is held, to determine hostile strength occupying same.

. . . . . .

(d) The air service will continue its reconnaissance and bombing plan as announced in F.O. 9, these headquarters, special attention being given to enemy convoys with transports and troops and concentration of troops in the Moselle Valley. Early information is desired of hostile movements north of the Hindenburg Line.

. . . . . .

By command of General Pershing:

H. A. Drum
Chief of Staff

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Headquarters Air Service First Army
American Expeditionary Forces
September 13, 1918

Battle Orders
No. 3

1. The enemy is continuing to lose ground, personnel and material at all points of his front which is being attacked by the First Army. The

patrols are reported to have pushed as far as the Hindenburg Line. Th captures of prisoners have been very great, estimates running betwee 10,000 and 25,000. His aviation has again been completely dominated by ours and his troops have been attacked on the ground by machine guns and bombs along all his lines of retreat.

2. The Army will continue to exploit its victory on the whole front. The front of the 1st Army extends along the line Pagny—Jaulny—Xammes—St. Benoit—Hallonville—St. Maurice—Hannonville—Tresauvaux.

3. OUR AIR SERVICE WILL CONTINUE THE OFFENSIVE AT ALL POINTS WITH THE OBJECT OF DESTROYING THE ENEMY'S AIR SERVICE, ATTACKING HIS TROOPS ON THE GROUND AND PROTECTING OUR OWN AIR AND GROUND TROOPS.

4. (a) The missions of the Corps Air Services will be the same as in "a", Battle Orders No. 1. Particular attention will be paid to reconnaissance of the enemy's lines to determine his direction of movement.

(b) The missions of the Army Observation Group (Reynolds) will be the same as in "b", Battle Orders No. 1. Special attention will be paid to the direction of movement of hostile units.

(c) The missions of the Army Artillery Group (Block) will be the same as in "c" Battle Orders No. 1.

(d) The 1st Pursuit Wing (Atkinson) will cover the front to a depth of 5 kilometers to the north from the right of the 1st Army to the line Vigneulles—Lachaussee—Tronville. The general mission will be the same as prescribed in "d" Battle Orders No. 1. After 9:00 A.M. one pursuit group loaded with bombs will be held in reserve to be used for the attack of hostile troops or convoys on the ground. It will be ready to take the air 15 minutes after the receipt of the order.

The 1st Bombardment Group (Dunsworth) will be held in reserve to attack hostile formations between our front and the line Conflans—Metz. Their time of departure will be announced on the morning of the 14th.

The right flank of the 1st Pursuit Wing will be protected by the 1st Brigade (French Aerial Division) and the aerial defenses of the 8th French Army.

Close liaison will be maintained by the 1st Pursuit Wing (Atkinson) with both of these and the Army Corps so as to keep close track of the advance of the troops.

(e) The 1st Pursuit Group (Hartney) will cover the front to a depth of 5 Kilometers to the east—Chatillon-sous-les-Cotes—to the line Vigneulles, Lachaussee, Tronville. The left flank will be protected by the pursuit aviation of the 2nd French Army. Close liaison will be kept with the 2nd French Army and with the Corps air services so as to keep track of the advance of the troops.

(f) The Army Night Bombing and Reconnaissance Wing (Villome) will execute the night reconnaissance as directed in the schedule provided for. Conflans, Mars-la-Tour and Vionville will be attacked.

(g) The French Air Division (Vaulgrenant) will fulfill the same general missions as prescribed in "g" Battle Orders No. 1. The two brigades will act along the same general axes, meeting on the line Mars-la-Tour—Vionville. The bombardment aviation will concentrate its efforts in the quadrangle Conflans—Mars-la-Tour—Gorze—Noveant—Verneville. Attacks will be made against the enemy's ground troops whenever opportunity offers. Provision will be made for the guarding the 1st Army's right flank. Close liaison will be maintained by radio and courier airplanes with the Corps air services so as to insure the air division's close co-operation in the attack of the ground troops.

5. The Equipment Section will hold itself ready to insure the supply and movement of any units required.

6. The Army dropping ground for messages and the Army landing ground remain the same as in paragraph 6, Battle Orders No. 1. The 1st Day Bombardment Group will provide a detail of four command airplanes to take station at Maulan beginning at 7:00 A.M. September 14th.

7. Reports will reach the Chief of Air Service at Headquarters, Air Service First Army, Ligny-en-Barrois.

A liaison officer from each Corps Air Service, each Wing or independent group of the Army Air Service and the French Aerial Division, will report at the Headquarters C.A.S., 1st Army at 21:00 H each day to receive orders.

A liaison officer for the Night Bombardment Wing (Villome) will report at the Headquarters, C.A.S., 1st Corps, at 14:00 H each day to receive orders.

Wm. Mitchell

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First Pursuit Group
Operations Office
Sept. 13th, 1918

Operations Order
Number 126.

1. The following schedule of operations is announced as effective for tomorrow Sept. 14th, 1918.

2. The 1st Army will aim at their new objectives throughout the day,

and the air service will be on the offensive along the entire line of the sector which will be Chatillon-sous-les-Cotes to Etang-de-Lachaussee, both included. The object being to destroy all enemy air service, to attack his troops on the ground and where ordered and to protect our planes and ground troops.

3. This Group will maintain a barrage against hostile aviation: observation aviation will be protected and hostile balloons will be attacked opposite the front of the 5th Corp.

4. The following patrols will be maintained throughout the day:

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to Etang-de-Lachaussee
147th	5 h 45 to 7 h 15, 10 h 45 to 11 h 15, 15 h 45 to 17 h 15.
94th	7 h 00 to 8 h 30, 12 h 00 to 13 h 30, 17 h 00 to 18 h 30.
95th	8 h 15 to 9 h 45, 13 h 15 to 14 h 45, 18 h 15 to darkness.
27th	9 h 30 to 11 h 00, 14 h 30 to 16 h 00.

5. Each patrol will consist of two echelons of four (4) planes each, the patrols of the lower echelon will operate from an altitude of 2500 to 3500 meters, and the patrols of the upper echelon from an altitude of 3500 to 5500 meters.

6. In addition to the above a mobile reserve of one flight will be maintained throughout the day commencing at 9 h 00. The 94th Squadron will hold its flight on alert while the 27th is on patrol and vice versa, and the 95th Squadron will hold its flight on alert while the 147th is on patrol and vice versa.

7. Squadrons will report for liaison duty at this office at 10 h 00 and will receive instructions as to localities to assume. At least one officer and transportation will be furnished by the Squadrons, and upon completion of their mission a written report will be rendered to the Group Operations.

8. Pilots must do their utmost to observe all activity on the ground reporting any interesting items immediately upon returning to the field for transmittal to the Intelligence, C.A.S. 1st Army.

By order of Major Hartney

Romer Shawhan
1st Lt. A.S.S.C.
Group Operations Officer

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First Pursuit Group
Operations Office
Sept. 14th, 1918

Operations Order
Number 127.

1. Each patrol will consist of two echelons of six (6) planes each, the patrols of the lower echelon will operate from an altitude of 2500 to 3500 meters, and the patrol of the upper echelon from an altitude of 3500 to 5500 meters.
2. Voluntary patrols of four (4) planes will be permitted after consultation at the Group Operations.

By order of Major Hartney

Romer Shawhan
1st Lt. A.S.S.C.
Group Operations Officer

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Operation Office
27th Aero Squadron, A.S.
1st Pursuit Group
Amer. E.F.
Sept. 13, 1918

Operations Order
No. 124.

1. The following patrols are scheduled for this squadron for tomorrow, Sept. 14, 1918.

MISSION	REGION	TIME
Patrol		9 h 30 to 11 h 00

2. Provided the weather is clear the following named pilots will fly the first patrol in two echelons. The lower echelon Lt. Hoover (leader), Lt. Roberts, Dawson, Donaldson, Stout, Clapp and Nicolson. The upper echelon Lts. Vasconcells (leader), Wilson, Hudson, Hewitt, Lennon, Lyman,. Rucker, Luke and Wehner.

3. The lower echelon will fly from 2500 to 3500 meters and the upper echelon from 3500 to 5000 meters, and will conform to the movements of the lower.

4. Pilots who are forced to drop out will return immediately to the airdrome.

5. The pilots selected for the second and third patrols will be announced one hour before the time appointed for these patrols to leave the ground.

6. Pilots chosen for patrols will report one half hour before hand at the operations office for final instructions.

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Operations Office
27th Aero Squadron
1st Pursuit Group
Amer. E.F.
Sept. 14, 1918

Operations Order
No. 124 (Supplementary)

1. There will be a patrol by this squadron 14 h 30 to 16 h 00.

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to Etang-de-Lachaussee

2. The patrol will operate as stated in 3 of Operations Order No. 124 of Sept. 13, in addition "A" Flight will be on alert from 12 h to 13 h 30 and "B" Flight from 17 h to 18 h 30.

3. Flight Commanders will submit the numbers of serviceable machines and the pilots to fly same, by 12 h today.

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95th Aero Squadron
September 14, 1918

Operations Order
No. 102.

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to Etang-de-Lachaussee
8 h 15 to 9 h 45	First and Second Flights

13 h 15 to 14 h 45 Third Flight.
18 h 15 to Darkness As many planes as are left.

Alerts.

10 h 45 to 11 h 15 Third Flight.
15 h 45 to 17 h 15 First and Second Flights.

Each patrol will consist of two echelons of six planes each. The lower echelon will operate from an altitude of 2500 to 3500 meters, and the upper will operate from an altitude of 3500 to 5500 meters.

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Headquarters, First Pursuit Wing
Air Service, American E.F.
September 13th, 1918

Operations Order
Number 14—for Sept. 14, 1918

1. Information of the enemy: At 18 h 00 Sept. 13th, our infantry held the following positions: Jaulny, 2 kilometers south of Charey, Marimbois, Woel, Treasauvaux. Our advanced elements had penetrated well beyond these positions.

The enemy air service showed signs of having been heavily reinforced with skillful and aggressive pilots in the afternoon. One patrol of between 15 and 20 Fokker planes was encountered by the 3rd Pursuit Group, and also by a Group from the Aerial Division. These planes engaged in severe combats when encountered. Patrols of 7 and 9 E. A. Mono Place planes were also encountered in the late afternoon.

2. Plan of Operations: The Army will continue to attack. Our pursuit barrage will be strengthened in force. The purpose of this barrage is to create an area, 5 kilometers in front of our advancing lines, in which it will be safe for our Corps Observation Aviation to work. And to prevent all enemy machines from crossing our lines. The Day Bombardment Aviation will attack the objectives assigned in Paragraph 4, this order.

3. The First Pursuit Wing:

The sector of the Wing is from the line, Vigneulles Lachaussee—Puxieux, to the line, Nancy Solgne. All patrols will cover the entire sector of the Wing. They will exert their maximum effort in the sector between the western boundary of the Wing and the Moselle River.

The following schedule of patrols will be adhered to:

Each patrol will be in two tiers; one high and one low, and each tier will consist of one squadron:

2nd Pursuit Group:	7:15	to	9:15
	14:15	to	16:15
3rd Pursuit Group:	Daylight	to	7:30
	12:30	to	14:30
G. C. 16:	9:00	to	11:00
	10:45	to	12:45
	16:00	to	18:00
	17:45	to	dark.

Alerts will be maintained subject to call from these headquarters in accordance with the following schedule:

2nd Pursuit Group:	9:00	to	12:30	2 squadrons
	16:30	to	19:30	2 squadrons
3rd Pursuit Group:	6:30	to	9:00	2 squadrons
	12:30	to	16:30	2 squadrons

Any indications of abnormal enemy aerial activity will be telephoned to these headquarters.

No bombs will be placed on any pursuit aeroplanes.

4. First Day Bombardment Group: will send an expedition comprising the entire Group at as early an hour as practicable to attack the following objectives.

(Primary Objective) Conflans.

(Alternate Objective) The roads and bridges on both sides of the Moselle from Ars—Jouy to Arnaville.

By order of Lieutenant Colonel Atkinson.

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

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Headquarters
2nd Pursuit Group, 1st Pursuit Wing
Operations Office
September 14, 1918

Operations Order
No. 56

1. The sector of the 1st Pursuit Wing is from the line, Vigneulles—Lachaussee—Puxieux, to the line Nancy—Solgne. All patrols will cover the entire sector of the wing. They will exert their maximum efforts in that part of the sector between the western part of the wing and the Moselle River.

2. Information of the enemy: At 18 h 00 Sept. 13th, our infantry held the following positions: Jaulny, 2 kilometers south of Charey, Marimbois, Woel, Tresauvaux. Our advanced elements had penetrated well beyond those positions.

The enemy air service showed signs of having been heavily reinforced with skillful and aggressive Pilots in the afternoon. One patrol of from between 15 and 20 Fokker planes was encountered by the 3rd Pursuit Group and also by a group from the Aerial Division. These planes engaged in severe combats when encountered. Patrols of 7 and 9 E.A. Mono Place planes were also encountered in the late afternoon.

3. Mission.

a) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our corps observation aviation to work.

b) To prevent all enemy planes from crossing our lines.

4. All patrols at 2500 to 3500 meters will be made along a line five to seven kilometers in advance of the line of battle. All patrols at 3500 to 5500 meters will be made along the line to nine kilometers in advance of the line of battle.

13th Squadron

7:15- 9:15	Patrol entire squadron. Sector of wing altitude 2500 to 3500.
16:30-19:30	Entire squadron on the alert.

22nd Squadron

9:00-12:30	Entire squadron on the alert.
14:15-16:15	Patrol, entire squadron, sector of the Wing altitude 3500-5500

49th Squadron

7:15- 9:15	Patrol, entire squadron, sector of the wing altitude 3500-5500
16:30-19:30	Entire Squadron on the alert.

139th Squadron

9:00-12:30	Entire Squadron on the alert.
14:15-16:15	Patrol, entire Squadron, Sector of the Wing altitude 2500 to 3500

5. Squadron on alerts to have pilots at the hangars and all available machines lined up ready to take off at a moment's notice during the period on alert.

6. All previous orders conflicting with the above are revoked.

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

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Headquarters
2nd Pursuit Group, 1st Pursuit Wing
Operations Office
September 14, 1918

Operations Order
No. 57.

1. The following change in the schedule for September 14th, 1918.

13th Squadron

16:00-18:00	Patrol, entire squadron sector of wing altitude 3500-5500 M. There will be two patrols (Low) of one squadron each from G C 16 (French) along the sector during this time. Alerts cancelled.

22nd Squadron

14:15-16:15	Patrol, entire squadron sector of wing altitude 2500-3500 M. (There will be a high patrol of one squadron

from the 3rd Pursuit Group along the sector during this time)

49th Squadron

Alerts cancelled. Planes and Pilots to be kept in readiness for such assignment as be made by later order.

139th Squadron

No change from Operations Order No. 56, except there will be a low patrol from the 22nd Squadron and a high patrol from the 3rd Pursuit Group along the sector at the same time.

2. Low patrols will attack all enemy balloons in ascension. Squadron Commanders will see that certain planes in each patrol equipped with incendiary ammunition are detailed for this mission.

3. The 14:15-16:15 patrol of the 22nd Squadron will form to the north of the flying field. The 14:15-16:15 patrol of the 139th Squadron will form to the South of the flying field.

4. All parts of Operations Order No. 56 which do not conflict with this Order are still in force.

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

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Headquarters
2nd Pursuit Group, 1st Pursuit Wing
Operations Office
September 14, 1918

Operations Order
No. 58.

1. Operations Order No. 57 is cancelled.
2. The schedule as given in Operations Order No. 56 will be in force.
3. The sector to be covered by patrols is from the line Lachaussee—Puxieux to the Moselle River.
4. Low patrols will attack all enemy balloons in ascension. Squadron Commanders will see that certain planes in each patrol, equipped with

incendiary ammunition are detailed for this mission.

5. Patrols will form in places designated to squadron commanders by the Group Commander. (at 11 h 45 during Officers meeting).

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

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Operations Office
13th Aero Squadron
September 14th, 1918

Flying Order
No. 45

1. The Sector of the 1st Pursuit Wing is from the line Vigneulles, Lachaussee, Puxieux, to the line Nancy, Solgne. All patrols will cover the entire sector of the wing. They will exert their maximum effort in that part of the Sector between the western part of the Wing and the Moselle River.

2. Information of the enemy. At 18 h 00 September 12th our Infantry held the following positions: Jaulny, 2 kilometers south of Charey, Marimbois, Woel, Tresauvaux. Our advanced elements had penetrated well beyond those positions.

The enemy air service showed signs of having been heavily reinforced with skillful and aggressive pilots in the afternoon. One patrol of between 15 and 20 Fokker planes was encountered by the 3rd Pursuit Group, and also by the Group from the Aerial Division. These planes engaged in severe combats when encountered. Patrols of 7 and 9 E.A. monoplace machines were also encountered in the later afternoon.

3. Mission.

a.) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our corps observation aviation to work.

b.) To prevent all enemy planes from crossing our lines.

4. All patrols at 2500 to 3500 meters will be made along a line five to seven kilometers in advance of the line of battle. All patrols at 3500 to 5500 meters will be made along the line six to nine kilometers in advance of the line of battle.

7:15 to 9:15 Patrol entire Squadron. Sector of the Wing, altitude 2500 to 3500 meters.

16:30 to 19:30 Entire Squadron on the Alert.

5. Squadron on alert to have pilots at the hangars and all available machines lined up ready to take off at a moment's notice during the period on alert.

6. All previous orders conflicting with the above are revoked.

By order of Captain Biddle.

Sydney Gross
1st Lieut. A.S. SIG. R.C.
Operations Officer

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Operations Office
13th Aero Squadron
September 14th, 1918

Flying Order
No. 46

1. The following schedule is made in the flying orders for September 14th, 1918.

16:00 to 18:00 Patrol, entire squadron sector of wing altitude 3500 to 5500 meters. (There will be 2 low patrols of one squadron each from G. C. 16 (French) along the sector during this time.)

Alerts cancelled.

By order of Capt. Biddle.

Sydney Gross
1st Lieut. A.S. U.S.A.
Operations Officer

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Operations Office
22nd Aero Squadron
2nd Pursuit Group
September 14, 1918

Operations Order
No. 23

1. The sector of the First Pursuit Wing is from the line Vigneulles

Lauchaussee Puxieux, to the line Nancy Solgne. All patrols will cover the entire sector of the Wing. They will exert their maximum efforts in that part of the sector between the Western part of the Wing and the Moselle River.

2. Missions for today.
9.00 to 12.30 Entire Squadron on Alert.
14.15-16.15 Patrol entire squadron, Sector of wing. Alt. 3500-5500 Meters.

By order of Capt. Bridgman

George B. Gillson
2nd Lt. A.S. U.S.A.
Operations Officer.

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Third Pursuit Group
Operations Office
September 14th, 1918

Operations Order
No. 44.

1. Information of the enemy: At 16:00, September 13th, our infantry held the following positions: Jaulny, 2 kilometers south of Charey, Marimbois, Woel, Tresauvaux. Our advanced elements have penetrated well beyond these positions.

The enemy air service showed signs of being heavily reinforced with skillful and aggressive pilots in the afternoon. One patrol of between 15 and 20 Fokkers was encountered by the 3rd Pursuit Group and also by a Group from the Aerial Division. These planes engaged in severe combats when encountered. Patrols of 7 and 9 E. A. monoplace were also encountered in the late afternoon.

2. Plan of Operations: The Army will continue to attack. Our pursuit barrage will be strengthened in force. The purpose of this barrage is to create an area, five (5) kilometers in front of our advancing lines in which it will be safe for our Corps Observation planes to work, and to prevent all enemy planes from crossing the lines.

3. The sector of the Group is from the lines Vigneulles—Lachaussee —Puxieux to the line Solgne—Nancy. All patrols will cover the entire sector of the Group. They will exert their maximum effort in the sector

between the western boundary of the Group and the Moselle river.

4. The following schedule of patrols will be adhered to: each patrol will be in two tiers (about 4000 meters for the high tier, and 2500 meters for the low tier); and each tier will consist all the available planes of one squadron:

Daylight to 7:30 Low patrol, 28th Squadron.
High patrol, 93rd Squadron.
12:30-14:30 Low patrol, 103rd Squadron.
High patrol, 213th Squadron.

5. Alerts will be maintained in accordance with the following schedule:

From 6:30 to 9:00, 103rd and 213th Squadrons, all available planes.

From 12:30 to 16:30, 28th and 93rd Squadrons, all available planes.

6. No bombs will be carried.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

German Fokker aircraft.

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Third Pursuit Group
Operations Office
September 14th, 1918

Operations Order
No. 45.

1. The 103rd Squadron will furnish a patrol of all available planes to furnish protection for 2 Salmson biplanes of the 90th Squadron. As soon as the visibility improves, these two planes will fly over this airdrome at 1500 meters altitude and fire 6-star rocket. Will await protection at that altitude over the airdrome. Altitude over lines: 3000 meters. Route: Rembercourt—Charey—Dampvitoux—Lachaussee—Chambley—Rembercourt. It is requested that protection patrol keep at 150 meters behind and 150 meters above protected planes.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 14th, 1918

Operations Order
No. 46.

1. Paragraph No. 4 of Operations Order No. 44, is amended as follows.

Patrols of all available planes will be furnished as follows:

93rd Squadron: 12:30-14:15. Lower tier, entire sector of the Group.

213th Squadron: 12:45-14:30. Lower tier, entire sector of the Group.

28th Squadron: 12:30-14:15. Upper tier, entire sector of the Group.

103rd Squadron: 14:15-16:00. Upper tier, entire sector of the Group.

2. Paragraph No. 5 of Operations Order No. 44 is amended as follows:

No alerts need be maintained.

3. Pilots coming down shortly after taking off, with minor troubles, will fix such troubles at once and take the air immediately, and rejoin their patrol.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 14th, 1918
13:25

Operations Order
No. 47.

1. Operations Order Number 46 is hereby cancelled.
2. All Squadrons will hold all available planes on alert until 16:30.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

—270—

103rd Aero Squadron

Flying Orders for September 14th, 1918.

12:30-14:30—Patrol of all available planes, 2500 meters.
6:30-9:00—A patrol of all available planes, to be held on alert.

The sector of the Group is from the line Vigneulles—Lachaussee—Puxieux to the line Nancy—Solgne. All patrols will cover the entire sector of the Group. They will exert maximum effort in the sector between the western boundary of the Group and the Moselle River. No bombs will be carried.

Flying Orders for September 14th, 1918. (Protection Mission).

A patrol of all available planes to furnish protection for 2 Salmsons biplaces of the 90th Squadron. As soon as visibility improves, these 2 planes will fly over the airdrome at 1500 meters, and fire a six-star rocket. Will await protection at that altitude over the airdrome. Altitude overlines—3000 meters. Route—Rembercourt—Charey—Dampvitoux—Lachaussee—Chambley—Rembercourt. It is requested that protection patrol keep at 150 meters behind and 150 meters above protected planes.

Flying Orders for September 14th, 1918. Issued 13:25 o'clock.

All available planes will be held on alert until 16:30.

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Operations Office
213th Aero Pursuit Squadron
September 14th, 1918

Operations Order
Number 16.

1. The sector of the Group is from the line Vigneulles—Lachaussee—Puxieux to the line Nancy—Sologne. All patrols will cover the entire sector of the Group. They will exert their maximum effort in the sector between the western boundary of the Group and the Moselle River.
2. The following schedule of patrols is in effect today:
   12:30-14:30 High patrol. 213th Squadron
   (Low patrol.) 103rd Squadron

By order of Lieut. Hambleton

E. N. Hunt
1st. Lieut. A.S., U.S.A.
Operations Officer

—272—

Operations Office
213th Aero Pursuit Squadron
September 14th, 1918

Operations Order
Number 17.

1. Operations Order Number 16 is hereby cancelled.
2. All available planes will be held on alert until 16:30.

By order of Lieut. Hambleton

E. N. Hunt
1st Lt., A.S., U.S.A.
Operations Officer

—273—

Headquarters 20th Aero Squadron
A.P.O. 703 A.E.F.
Sept 13, 1918

Operations Order
No. 2

The following named officers will stand by at 3:30 a.m. Sept 14, 1918 for a Bombing Mission, the time and objective to be designated later.

Their positions in formation will be as follows:

1
Lt Sellers, C G
Lt Payne (486)

3 2
Lt Edwards Lt Howard
Lt Endler (408) Lt Parrott (584)

5 4
Lt Potter Lt Mandell
Lt Shultz (768) Lt Fiske (446)

7 6
Lt Baker Lt Wiser
Lt Goodell (502) Lt Christian (440)

9 10 8
Lt Koepfgen Lt West Lt Seaver
Lt Willis (785) Lt Frank (448) Lt Stokes (465)

They will fly the plane whose number is opposite their names.

E S Parrott
1st Lieut A S U S A
Operations Officer

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Headquarters, 20th Aero Squadron
First Day Bombardment Group
A.P.O. 703 A.E.F., France
Sept 14, 1918

Operations Order
No. 3

The following named officers will stand by at 12:30 p.m. Sept 14/18, for a bombing mission, the objective to be designated later.

Their positions in formation will be as follows:

1
Lt Sellers
Lt Payne (486)

3
Lt Edwards
Lt Endler

2
Lt Howard
Lt Parrott (584)

5
Lt Leach
Lt Wilmer (502)

4
Lt West
Lt Fiske (448)

7
Lt Stephen
Lt Louis (785)

6
Lt Mathews
Lt Taylor (445)

9
Lt Townes
Lt Bunkley

10
Lt Tucker
Lt Faulk (440)

8
Lt Wadsworth
Lt Richardson (707)

E A Parrott
1st Lieut A S U S A
Operations Officer

Officers of the 20th Aero Squadron, First Day Bombardment Group: (l. to r.) 1st Lts. John Y. Stokes, Jr., Hold, Sidney C. Howard, Capt. Cecil G. Sellers, 1st Lts. Dan MacWhirter, Leslie P. Koepfgen, and Gardiner H. Fiske.

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Headquarters, 20th Aero Squadron
First Day Bombardment Group
A.P.O. 703 A.E.F., France
Sept 14, 1918

Operations Order
No. 4

The following named officers will stand by at 2:45 p.m. Sept 14, 1918 for a bombing mission, the objective to be designated later.

Their positions in formation will be as follows:

1
Lt Sellers
Lt Payne (486)

3 — Lt Edwards, Lt Endler (408)
2 — Lt Leach, Lt Wilmer (448)

5 — Lt Mandell, Lt Fiske (445)
4 — Lt Howard, Lt Parrott (584)

7 — Lt Tucker, Lt Faulk (707)
6 — Lt Seaver, Lt Stokes (502)

9 — Lt Koepfgen, Lt Willis (440)
8 — Lt Wadsworth, Lt Richardson (546)

They will fly the planes wnose number is opposite their names.

E A Parrott
1st Lt. A S U S A
Operations Officer

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Operations Office
96th Aero Squadron
September 14, 1918

Operations Order No 60

The following pilots and observers will stand by at 5:15 A.M. for raid at 5:30 A.M.

Position Pilots Flight leader	Observers	Plane No.
1. D H Young	Lt Lunt	12
2. Lt Beverly	Lt Newbury	15
3. Lt Anderson	Lt H S Thompson	14
4. Lt C P Young	Lt Anspach	20
5. Lt Forshay	Lt O'Donnell	8
6. Lt Lakin	Lt Codman	18
7. Lt Rogers	Lt Straun	6
8. Lt Ten Eyck	Lt Smith	7
9. Lt Hopper	Lt Kelly	5
10. Lt Taylor	Lt Stuart	4

E E Evans Operations Officer
1st Lt A S U S A

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Operations Office
96th Aero Squadron
September 14, 1918

Operations Order No 61

The following pilots and observers will stand by from 8:30 A.M.

Position Pilot Flight Leader	Observer	Plane No.
2 Lt Gaylord	Lt Cawston	14
1 Lt Beverly	Lt Newberry	15
4 Lt C P Young	Lt Anspach	20
7 Lt Taylor	Lt Stuart	4
8 Lt Baker	Lt Milner	5
6 Lt Rogers	Lt Strawn	7
3 Lt Codman	Lt Pressler	12
5 Lt Forshay	Lt O'Donnell	8

E E Evans Operations Officer
1st Lt. A S U S A

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Operations Office
96th Aero Squadron
September 14, 1918

Operations Order No 62

The following pilots and observers will stand by from 1:30 P.M.

Position	Pilot	Observers	Plane No
	Flight Leader		
1	Lt D H Young	Lt Lunt	12
2	Lt Beverly	Lt Newberry	
3	Lt Bates	Lt Hexter	15
4	Lt Turnbull	Lt McDowell	20
5	Lt. Elliott	Lt Ellis	8
6	Lt Ten Eyck	Lt Smith	4
7	Lt Lakin	Lt Douglas	5
8	Lt Hopper	Lt Kelly	14

E E Evans Operations Officer
1st Lt. A S U S A

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Headquarters 91st Aero Service Squadron

Missions for Sept 14, 1918

1. Reconnaissance.

	At 4:30	
Capt Wallis		Lt Strahm
	At 7:30	
Capt Roper		Lt Powell
Lt Schricker		Lt Hughey

By order Major John N. Reynolds

John H. Snyder, 2nd Lt. A.S.
Operations Officer

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Headquarters 4th Observation Group
5:30 P.M. Sept 13th 1918

Memo for all Squadrons:

By order of the Group Commander the following schedule will be in effect for tomorrow:

One infantry Contact Plane daylight till Daylight plus 1½ hrs.
One Counter Attack plane.

Upon the return of the first mission or at a maximum time of 1½ hrs after its departure: one Counter Attack plane will be sent out.

Other mission including photo (if any) will be assigned later. If possible squadron commanders will send protection with second missions.

Two planes will be held in readiness as usual for alert calls.

Observers are urged to pay especial attention to signs of concentration on and behind the "Hindenburg Line."

Observers will devote any spare time to Liaison with Artillery if it is practical to do so.

Lt. Jack Phinizy, C.A.C.
Group Operations Officer

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Headquarters
90th Aero Squadron
Observation Group—Fourth Army Corps
Sept. 14, 1918

Schedule of flights will be published later.
Lieut. Broomfield will be in charge of the field.
Lieut. Rohrer will be Squadron Censor Officer.
19 pilots-19 available.
14 observers-13 available. One on liaison duty within the corps.
3 M.G. Observers—3 available.
22 Salmson—22 available.
1 Spad—1 available.

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer

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Headquarters
90th Aero Squadron
Observation Group—Fourth Corps
Sept. 14, 1918

Observers	Pilots	Plane No.	Time
	Photographic		
Lt. Hayden, V.B.	Lt. Pierson, N.E.	14	8:00
Lt. Lindstrom, G.T.	Lt. Conover, Harvey	4	8:00
Have 52 camera with 4 magazines and [?] in Sal 4 and 14.			
	Reserve for Corps Artillery		
Lt. Walden, D.M.	Lt. Lee, M.G.	15	
Lt. Bogle, H.C.	Lt. Young, J.S.	19	

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer

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Headquarters
90th Aero Squadron
Observation Group—Fourth Army Corps
Sept. 14, 1918

	Reconnaissances		
Lt. Vinson, F.L.	Lt. Rohrer, L.E.	16	1:30
Protection:			
Lt. Grier	Lt. Ellis, H.R.	9	1:30
Lt. Tillman, F.A.	Lt. Greist, E.H.	D[?]	3:30
Protection:			
Lt. Walden, D.M.	Lt. Hart, A.T.	5	3:30
Lt. Lowe, W.O.	Lt. Kinsley, W.E.	10	5:30
Protection:			
Lt. Bogle, G.C.	Lt. Dorrance	6	5:30
Equip Nos. 16, D, 10, with 270 meter reels and two (2) message containers.			
	Photographic Mission		
Lt. Hayden, V.B.	Lt. Pierson, N.E.	14	
Protection:			
Lt. Burger	Lt. Carver, Leland	12	
Lt. Shuss, P.B.	Lt. Livingston, J.W.	2	

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer

—284—

Office of the Chief of Air Service
Headquarters First Army Corps
American Expeditionary Forces
14 Sept. 1918

Operations Order
No. 1

1. The 2nd and 5th Divisions are to be relieved on the night of 15/16 Sept. by the 78th Division. The 2nd Division, with its artillery, leaves this area. The 5th Division remains as Corps reserve. The artillery of the 5th Division will remain in the lines, working with the 78th Division, until such time as the latter's artillery is available.

2. After midnight on the 15th Sept., the 1st Aero Squadron will be assigned to the 75th Division for all aviation duties. The 12th Aero Squadron will be assigned to the 90th Division for all aviation duties. Both squadrons will be prepared to carry out such photographic missions of the Corps sector as may be called for, and any command missions that may be ordered by the Corps Commander. The 50th Aero Squadron will be assigned to the 82nd Division for all aviation duties.

3. The 1st and 12th Aero Squadrons will commence preliminary liaison with the 78th and 90th Divisions respectively on the 15th Sept. The squadron liaison officers will consult with Lieut. Hamman, at these headquarters, before carrying out such liaison.

4. The 208th and 214th (French) Squadrons will remain assigned to Corps Heavy Artillery.

5. After midnight on the 15th Sept. the assignment of the Balloon Companies in this Corps will be as follows:

First Balloon Co.—to 78th Division;
Second Balloon Co.—90th Division;
Forty-Second Balloon Co.—82nd Division;
Fifth Balloon Co.—to Corps Heavy Artillery.

6. The First and Second Balloon Companies will commence preliminary liaison with the 78th and 90th Divisions respectively on the 15th Sept. and will be prepared to operate with these divisions at daybreak on the 16th Sept.

M. A. Hall
Major, Air Service, U.S.A.
C.A.S., 1st A.C.

Reports

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Headquarters, 27th Aero Squadron, A.S.
Operations Office, 1st Pursuit Group
September 14th, 1918

From 18 h 30 Sept. 13th to 18 h 30 Sept. 14th. 1918.

The patrols that left at 17 h 20 Sept 13th returned at 18 h 55. Six planes flying time was 9 h 30 min. The Trial flight that left at 18 h 30 on Sept 13th returned at 19 h 25. Flying time 55 min.

1) —1 Patrol. 9 h 30 to 11 h 15, 13 planes. Lts. Clapp, Donaldson, Lennon, Hudson, Rucker, Roberts, Nicolson, Hoover, Vasconcells, Stout, Dawson, Lyman and Luke. Alt. 3000 to 5000 meters. For results see reconnaissance report of Lts. Dawson, Luke and Lennon and Clapp.

1)—1 Trial Flight. 9 h 50 to 10 h 00, 1 plane. Lt. Wehner.

2)—1 Trial Flight. 11 h 30 to 12 h 15, 1 plane. Lt. Wehner.

3)—1 Trial Flight. 11 h 45 to 12 h 05. 1 plane. Lt. McKimmon.

4)—1 Trial Flight. 12 h 35 to 13 h 05, 1 plane. Lt. White.

2)—1 Patrol. 14 h 30 to 16 hr 05, 9 planes. Lts. Roberts, Rucker, Vasconcells, White, Dawson, Wilson, Stewart, Luke and Wehner. Alt. 2500 to 5000 meters. For results see Lts. Wehner and Luke's reconnaissance report. Lt. Luke returned at 16 h 50.

5)—1 Trial Flight. 14 h 50 to 17 h 15, 1 plane. Major Hartney. Testing.

6)—1 Trial Flight. 15 h 00 to 15 h 25, 1 plane. Lieut Grant. Testing.

7)—1 Trial Flight. 15 h 40 to 16 h 22, 1 plane. Lieut Stout. Testing.

8)—1 ;Trial Flight. 16 h 25 to 17 h 10, 1 plane. Lieut Clapp. Testing.

9)—1 Trial Flight. 17 h 00 to 17 h 25, 1 plane. Lieut Lyman. Testing.

10)—1 Trial Flight. 17 h 10 to 17 h 25, 1 plane. Lieut Nicolson. Testing.

11)—1 Trial Flight. 17 h 14 to 17 h 30, 1 plane. Lieut. Wilson. Testing.

Summary

a) Sorties	40	j) Total planes	25
b) Trials	12	k) Available planes	19
c) Combats	7	l) Total flying hours	52'30"
d) Pilots available	19	m) Total service hours	45'
e) Pilots total	19	o) Patrols	3
i) Enemy planes unconfirmed	2 Planes & 2 balloons.		

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27th Aero Squadron
September 14, 1918

Combat and Reconnaissance Reports

Lt. K. S. Clapp reports: When the upper echelon dove through the clouds in the vicinity of Etain my motor was about 100 degrees temperature so I dove within 300 meters of the ground but could only cool it to 70 degrees. Lost both echelons in this act but circled this spot for 15 minutes climbing all the time. Later I found three French Spads and patrolled with them north of Verdun. We ran across three blue-green Fokkers and got in a few good bursts at them from long range, but they were faster than our machines and went into Germany.

Lt. Leo H. Dawson reports: I left the formation over Moranville and attacked an enemy balloon near Boinville, diving at it three times and emptying both guns. Tracers entered it in great numbers. The observer jumped and the balloon was hauled down in a very flabby condition. White flaming balls were fired at me. Lieut. Luke was below the balloon firing at the Archie battery. I left after the balloon had struck the ground and it was not sent up again, at the time I left, twenty minutes later. From what I could observe it was very badly shot up. Confirmation requested.

Lt. T. F. Lennon reports: Followed Lt. Luke and Dawson. Saw them attack enemy balloon in vicinity of Boinville. Observed that the observer jumped and enemy archie began to burst. The balloon flattened out and went to the ground. I dove on it and fired 50 round from each gun. The last I saw of balloon it was on the ground in a very flabby condition. Confirmation requested.

Lt. Frank Luke reports: Left formation at Abaucourt and attacked an enemy balloon near Boinville. Dove at it six times at close range. Had two stoppages with left gun which carried incendiary bullets, and after fixing both, continued the attack. After about 75 rounds being left in right gun, I attacked an archie battery at base of balloon. Am sure that my fire took effect as the crew scattered. After my first attack on balloon, the observer jumped. The last I saw of the balloon, it was on the ground in a very flabby condition. Confirmation requested.

Lt. Frank Luke reports: I and Lt. Wehner were to leave with formation, dropping out at Buzy to attack enemy balloon. By orders of the C.O. On arriving at Buzy left formation and brought down enemy balloon in flames. While fixing my gun so that I could attack another nearby balloon, eight enemy Fokkers dropped down on me. Dove and pulled away from them. They scored several good shots on my plane. I saw planes on my tail, but as my guns were jammed, [I] did not turn, as I was not sure it was an allied plane until he joined me later. You will find attached confirmation of balloon.

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94th Aero Squadron, Operations Office[a]
Sept. 14th, 1918

Today's Schedule of Operations.

1. Voluntary Patrol Two (2) Planes. Lieuts. Chambers, and Kaye. Hour of departure from Toul Field 18 h 10 and landed on Field of 94th airdrome at 19 h 10.[b]

Operations for Today, Sept. 14th., 1918.

2. Patrol Chatillon-sous-les-Cotes to Etang-de-Lachaussee. (4) Planes. Lieut. Cates, Patrol leader. 7 h 00 to 8 h 24. Lieuts. Palmer, Hopkins, and Snow. Altitude reached 2500 meters. See reconnaissance report of Lieut. Cates.

3. Voluntary Patrol Verdun, Villecy, Waville, Lachaussee. One (1) Plane. Lieut. Rickenbacker. 7 h 30 to 9 h 09. Alt. reached 4000 meters. See Reconnaissance report of Lieut. Rickenbacker.

4. Patrol Conflans, St. Mihiel and Lachaussee. Three (3) planes. Lieut. Sherry, Patrol Leader. 7 h 40 to 8 h 59. Lieuts. Clark and Crocker. Alt. reached 3000 meters. See Lieut. Sherry's reconnaissance report.

5. Voluntary patrol Mars-la-Tour and Ars. One (1) plane. Lieut. Rickenbacker. 11 h 46 to 13 h 31. Altitude reached 5000 meters. No results.

6. Patrol of upper Echelon. Fresnes and Lachaussee. Five (5) planes. Lieut. Chambers, P.L. 12 h 00 to 13 h 30. Lieuts. Kaye, Clark, Sherry and Scroggie. Altitude reached 4000 meters. See reconnaissance report of Lieut. Chambers.

7. Patrol of lower Echelon, Fresnes and Lachaussee. Four (4) Planes. Lieut. Taylor, Patrol leader. 12 h 00 to 13 h 15. Lieuts. Jeffers, Sparks and Eastman. Lieut. Taylor has not as yet returned. Lieut. Jeffers landed on Field of 94th Airdrome with motor trouble at 12 h 15. Lt. Sparks landed also with motor trouble at 12 h 50. Lt. Eastman landed on Field of 94th Airdrome at 13 h 15 and reports that he could not keep up with formation.

8. Trial Flight Lieut. Fowler, 11 h 40 to 12 h 00. Lieut. Cates flew Lieut. Coolidges' plane from Belrain, departing from Belrain's Aviation Field at 12 h 15, and landed on Field of 94th Airdrome at 12 h 25.

9. Trial Flight Lt. Fowler, 15 h 28 to 15 h 32.

10. Alert. To Pick up Salmson over Souilly Two (2) Planes. Lieuts. Zacharias and Palmer. 16 h 00 to 17 h 05. Lt. Zacharias landed on 94th Airdrome. Because patrol leader failed to take off at 16 h 20, Lieut. Palmer reports that he awaited over Souilly, for Salmson from 16 h 15 to 16 h 25, but could not locate Salmson and returned home.

11. Patrol Chatillon-sous-les-Cotes to Etang-de-Lachaussee. Six (6)

planes. Lieut. Chambers, P.L. 17 h 00 to 18 h 15. Lieuts. Cates, Eastman, Kaye, Sherry, and Cook. See Lieut. Chambers' reconnaissance report.

(a)	Sorties	31
(b)	Trials	2
(c)	Combats	2
(d)	Pilots Available	19
(e)	Total Pilots	20
(f)	Pilots Missing	1
(g)	Pilots Wounded	0
(h)	Enemy Planes Confirmed	1
(i)	Enemy Planes Unconfirmed	0
(j)	Available Planes	15
(k)	Total Flying Hours	32 h 47
(l)	Total Service Hours	32 h 22
(m)	Alerts	1
(n)	Patrols	4
(o)	Protection Patrols	0
(p)	Voluntary Patrols	3
(q)	Special Missions	0
(r)	Planes Dropped	0
(s)	Planes Received	1

J. Bayard H. Smith
1st Lieut. AS. USA

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94th Aero Squadron
Sept. 14th, 1918

Reconnaissance Report

Time out: 7 h 00
Time in: 8 h 24
Max. Altitude: 2500 m
Mission: Patrol
Pilot: Lt. Cates, P.L., Lts. Palmer, Snow, Hopkins.

Lieut. Cates Reports: Fire in the region of Chambley. There were fires on road leading from Etain to Conflans. Boche balloons in region of Gorze.

J. Bayard H. Smith
1st Lieut. Air Service USA
Acting Operations Officer

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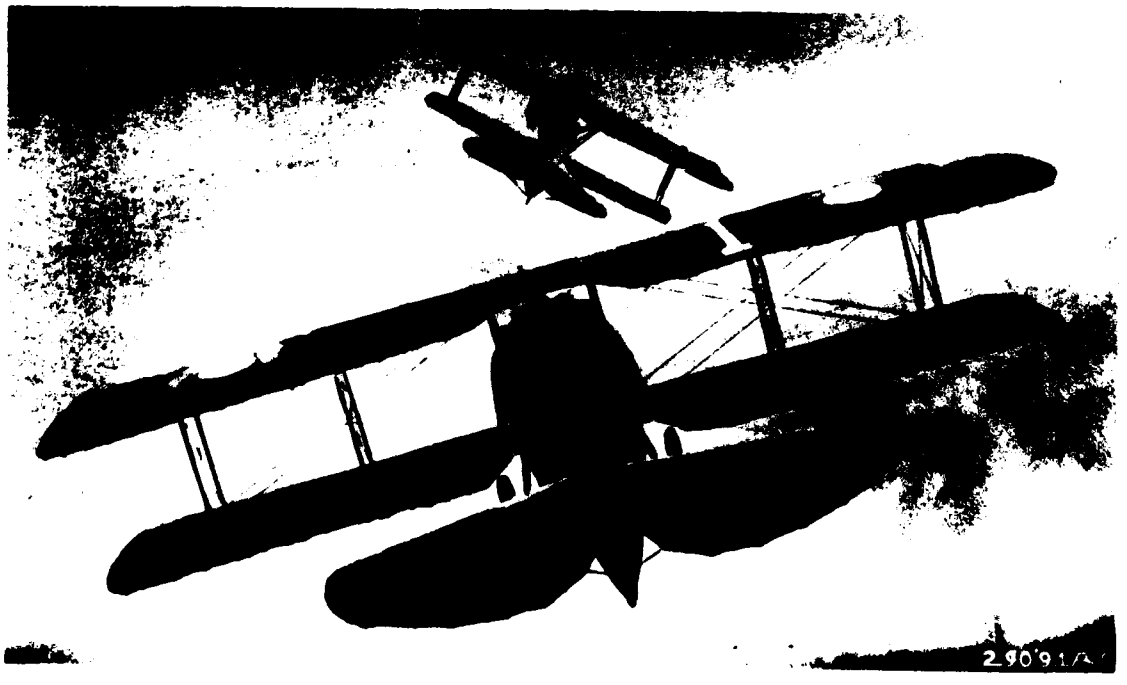
94th Aero Squadron
9/14/18

Reconnaissance Report

Airplane Type: Spad Time out: 7 h 30
Motor Type: Hispano-Suiza. Time in: 9 h 09
Max. Altitude: 4000 m.
Mission: Voluntary Patrol.
Weather: Good.
Pilot: Lieut. Rickenbacker.

Lieut. Rickenbacker Reports: Left at 7 h 30 A.M. Met one enemy biplace over Verdun. Looked like an L.V.G. Followed him about seven (7) kilometers, but it was too high to reach. Then returned from the lines at 4000 meters. Met four (4) enemy Fokkers, with red wings, light gray fuselage and striped tail over the towns of Villecey and Waville. They were flying at about 3000 meters. I piqued on the upper man of the formation, fired approximately 200 rounds and saw him go down,



apparently out of control. Was unable to follow him on account of the other three, who showed excellent fighting spirits. This took place at 8 h 10 and 8 h 15. I then returned over Lachaussee, where, at 8 h 25, I noticed five (5) Fokkers with their regular camouflage crosses on the tail, apparently new men. I started to pique, but they immediately turned for home. Fired about 50 rounds without result. Confirmation requested.

J. Bayard H. Smith
1st Lieut. A.S., U.S.A.
Acting Operations Officer

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94th Aero Squadron
9/14/18

Reconnaissance Report

Time out: 7 h 40
Time in: 8 h 59
Max. Altitude: 3000 m.
Mission: Conflans, St. Mihiel & Lachaussee.
Weather: Fair
Pilot: Sherry, P.L., Clark & Crocker.

Lt. Sherry Reports: I saw seven (7) Fokkers over the Moselle north of Pont-a-Mousson at 8 h 30, but did inot get involved in combat. I also noticed smoke from several villages around Conflans, between St. Mihiel and Lake Lachaussee. I dove below the clouds followed by Lieut. Clark. The third number of the patrol, Lieut. Crocker, did not follow and was last seen by Lieut. Clark, over Lake Lachaussee.

J. Bayard H. Smith
1st Lieut. A.S. U.S.A.
Acting Operations Officer

94th Aero Squadron
9/14/18

Reconnaissance Report

Time out: 12 h 00
Time in: 13 h 30
Max. Altitude: 4000m.
Mission: Patrol
Weather: Good.
Pilot: Lt. Chambers, P.L., Kaye, Clark, Sherry, and Scroggie.

Lt. Chambers Reports: We went in as far as Conflans and over Chambley at 4000 meters and saw only seven E.A., which were about on a line between Conflans and Etain. They did not attack us, although they had the altitude. Considerable anti-aircraft north of us and some at our formation. We were too high to note activity on the ground.

J. Bayard H. Smith
1st Lieut. A.S. USA
Acting Operations Officer

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94th Aero Squadron
9/14/18

Reconnaissance Report

Time out: 17 h 00
Time in: 18 h 15
Max. Altitude: 3500
Mission: Patrol.
Weather: Good.
Pilot: Lt.Chambers, P.L., Lieuts. Cates, Eastman, Kaye, Sherry, and Cook.

Lieut. Chambers Reports: Noticed five (5) or six (6) very large fires between Conflans and Etang. Went down low to locate enemy balloons and only saw two (2) which were low and quite some distance in their

lines. Saw one formation that was probably Boche, but they stayed behind Chambley.

J. Bayard H. Smith
1st Lieut. Air Service, USA
Acting Operations Officer

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Headquarters 95th Aero Squadron
Operations Office
Sept. 14, 1918

Report of Operations up to 18 h 30

1) Patrol 8 h 15 to 9 h 50; 8 planes; altitude 300 meters; line—Chatillon to Etang de Lachaussee; Lts. Mitchell, Curtis, Sewall, Woodard, Hall, Butz, Gravatt, and McLanahan; Lt. Sewall was forced to land in flames as result of combat near Hannonville; Lt. Mitchell had forced landing near Troyon sur Meuse; 3 combats, see pilots' reports.

1) Protective patrol 13 h 15 to 14 h 50; 6 planes; altitude 3000 meters; line—Bezonvaux and Damloup; Lts. Buckely, Heinrichs, Weatherhead, Butz, Hall, and Taylor. Protection for 17th Army Corps, mission accomplished, nothing to report.

1) Special mission 9 h 25; Lt. Weatherhead arrived with new plane Spad No. 15251

2) Special mission 17 h 50; Lt. Mitchell arrived with new plane Spad No. 7601

2) Patrol 18 h 05 to 19 h 10; 12 planes; nothing to report.

Note—Lt. Eoff flew back with plane that Lt. Mitchell had forced landing with yesterday, arriving at 10 h 40.
Lt. Bailey returned at 11 h 45 from forced landing near Monthairons
Lt. Taylor returned at 12 h 00 from forced landing of yesterday at Villotte.

Summary

a) Sorties 17
b) Trials 1
c) Combats 3
d) Pilots available 18
e) Total pilots 18
j) Total planes 25
k) Available planes 19
l) Total flying hours 19 h 34
m) Total service hours 18 h 02

o) Patrols 1
p) Protection patrols 1
r) Special missions 2
s) Planes dropped 1
t) Planes received 3

Edward Butts Jr.
1st Lt. AS USA
Operations Officer

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Operations Office
147th Aero Squadron
Amer. E.F.
Sept. 14, 1918

Daily Report No. 98

1. Patrol, 5 planes, Lieuts. White (leader), Love, Meissner, Simon, and Brotherton. Altitude 3000 meters. Visibility fair. Mission patrol lines between Etang-de-Lachaussee and Chatillon-sous-les-Cotes. Time 6 h. 00 to 7 h. 45.

Lieut. Meissner reports at 6 h. 55 in the region of Jonville saw 2 E.A. coming west at 2,000 meters. Turned into our lines climbing to lead them over at 7 h.00, over Harville, Lt. Love and I dove on second of 2 Halberstadts biplaces. I shot a burst and turned out his fire, as he had swung his observer into position. Then the other E.A. dove head on; we both shot and I had to dive under him to avoid collision. Wind had blown us well over and E.A. both turned east so we returned to our lines. Saw another E.A. Rumpler coming west over Hennemont, so climbed over him when he turned back. Dove under his tail at 7 h. 15, firing five shots when both guns jammed. Turned away and Lt. Love attacked Rumpler, last seen diving steeply. Allied barrage falling in Bois des Moines. Enemy balloon up in region of Boinville.Considerable enemy anti-aircraft fire and machine gun fire from ground in regions of Parfondrupt and Hageville.

Lieut. Love reports that at 6 h.55m in the region of Jonville, saw 2 E.A. coming west at 2,000 m. Climbed over our lines and about 7 h. 00m. Lieut. Meissner dove upon one Halberstadt. Fired a couple of bursts, E.A. turned east so we turned to our lines. Saw another E.A. (Rumpler) coming west over Hennemont, so climbed over him and dove, coming up under his tail. Followed to St. Jean-les-Buzy when I got a lot of machine gun fire from the ground. Observed a couple of my

incendiaries enter fuselage of Rumpler behind observers seat, then it went down in a steep dive. Returned to lake, west thru quite a bit of fire from the ground including archies. Encountered 5 Halberstadts about over the three fingered Lake Etang-de-Lachaussee. Climbed under tail of highest; he turned and dove. Fired about four bursts at him, he banked to give his observer a shot and the one under me began firing at me. One crossed in front of me and I turned with him firing a few bursts. As I was alone, decided to come home.

2. Patrol, 10 planes, Lieuts. White (leader), O'Neill, Muther, Jones, Simonds, Willard, K. L. Porter, Simon, Love and Bronson. Altitude 2000 meters. Visibility good. Mission patrol between Chatillon-sous-les-Cotes and Etang de Lachaussee. Time 10 h.45m to 12 h.30m.

Lieut. Simon reports observing balloon SE of Etain near Boinville. He went in back of balloon and dove on it and continued firing until within about 100 feet from balloon, which was about 300 to 500 meters from the ground. He could not stay around to see if balloon went down in flames, as his motor began to get bad and he had a water leak. He observed another balloon south of Boinville which was about 500 meters high.

Lieut. Jones reports seeing shells bursting in position in vicinity of Pareid. Saw white A.A. fire in clouds over Etang-de-Lachaussee at an altitude of 2,000 meters but could see no machines around.

Lieut. Bronson had a forced landing at Domevre due to broken oil pump.

3. Protection Patrol, 5 planes, Lieuts. Jones (leader), O'Neill, Muther, Willard and Herron. Altitude 1,500 meters. Visibility fair. Mission protection for Salmson. Route, Fresnes-en-Woevre, Mars-la-Tour, Chambley, and Jonville. Time 12 h.55m to 15 h.15m. Mission successful.

Lt. Jones reports seeing 6 E.A. coming south towards Etang-de-Lachaussee. Too far to distinguish type.

Lt. Muther reports seeing Hun observation or kite balloon at Purieux. Seen about 14 h.45.

4. Protection Patrol, 2 planes, Lieuts. White (leader), and O'Neill. Altitude 3000 meters. Mission protection for Salmson picked up over Souilly. Time 16 h.00 to 18 h.00.

Reconnaissance reports being made up and will be handed in with least possible delay.

5. Voluntary Patrol, 1 plane, Lieut. Miessner (Sept. 13th). Altitude 2000 meters. Visibility fair. Mission patrol from Verdun to Vigneulles. Time 17 h.40 to 16 h.45. Nothing to report.

Supplementary:

Lieut. Dowd who was reported missing on supplementary to Report No. 97 was forced to land at Bannoncourt due to broken water connection. He returned to this field by motorcycle last night at 20 h.30.

Trial flights, 1 plane.

Summary

a)	Sorties	22
b)	Trials	1
c)	Combats	9
d)	Pilots available	19
e)	Total pilots	22
f)	Pilots missing	0
g)	Pilots wounded	0
h)	Enemy planes confirmed	0
i)	Enemy planes unconfirmed	1 (balloon)
j)	Total planes	25
k)	Available planes	12
l)	Total flying hours	24 h. 16
m)	Total service hours	23 h. 21
n)	Alerts	0
o)	Patrols	2
p)	Protection patrols	2
q)	Voluntary patrols	1
r)	Special missions	0
s)	Planes dropped	0
t)	Planes received	0

By order of Lieut. James A. Meissner

M. L. Dowd
2nd Lt. Air Service, U.S.A.
Acting Operations Officer

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147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Fair

Mission: Patrol lines between Etang-de-Lachaussee and Chatillon-sous-les-Cotes

Route Actually Followed: Eix to Lachaussee

Names of Pilots on Patrol and Leaders: Lts. White (leader), Brotherton, Meissner, Love and Simon

Hour of Departure	Hour of Return	Altitude	Squadron	Date
6 h.00	7 h.45	3000 meters	147th	Sept. 14.

Number of E.A. Seen: 3 Time: 2 at 6 h.55, 1 at 7 h.05

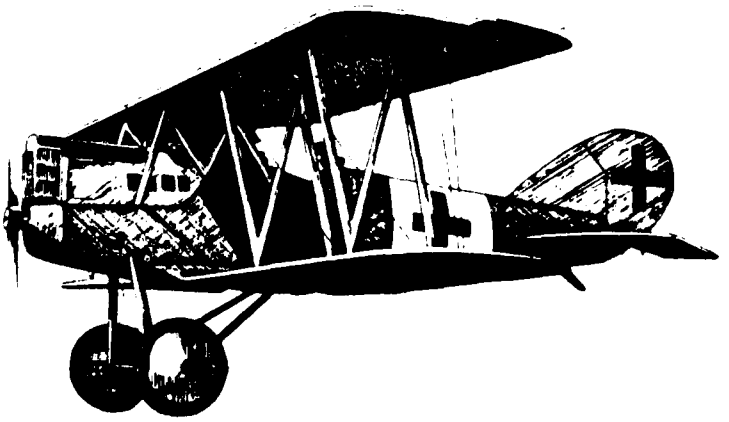
Number of E.A. Encountered: 3 Time: 2 at 7 h.00, 1 at 7 h. 15
Type: 2 biplaces Halberstadt, Altitude: 2500 & 2000
1 Rumpler
Region: 2 Halbers at Harville, Combats: 3
1 Rumpler at Hennemont
Number of Rounds Fired: 200 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

At 6 h.55, in the region of Jonville, saw 2 E.A. coming west at 2000 meters. Turned into our lines climbing to lead them over and at 7 h.00 over Harville, Lt. Love and I dove on second of 2 Halberstadt biplaces. I shot a burst and turned out of his fire, as he swung his observer into position. Then the E.A. dove headon. We both shot and I had to dive under him to avoid collision. Wind had blown us well over, the E.A. turned east so we returned to our lines. Saw another E.A. Rumpler coming west over Hennemont, so climbed over him when he turned back. Dove under his tail at 7 h. 15, firing five shots when both guns jammed. Turned away and Lt. Love attacked. Rumpler last seen diving steeply.

Allied barrage falling in Bois de Moines. Enemy balloon up in region of Boinville. Considerable enemy anti-aircraft fire and machine gun fire from ground in region of Parfondrupt and Hageville.



Lt. James A. Meissner
1st Lt. Air Service, USA

George J. Brew
1st Lt. Air Service, USA
Squadron Operations O.

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147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Fair

Mission: Protection patrol

Route Actually Followed: Fresnes-en-Woevre, Mars-la-Tour, Chambley and Jonville

Names of Pilots on Patrol and Leaders: Lts. Jones (leader), O'Neill, Muther, Willard, Herron and Abernathy

Hour of Departure	Hour of Return	Altitude	Squadron	Date
13 h.55	15 h.15	1500 meters	147th	Sept. 14

Number of E.A. Seen: 6 Time: 14 h.40

Number of E.A. Encountered: 0 Time:

Type: Unknown Altitude: 2500 meters

Region: Going south toward Three Finger Lake Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Met three Salmsons over Souilly, one dropped out. Took two over lines, successfully from our point of view. Saw 6 Huns coming south towards Three Finger Lake assisted by their anti-aircraft. Too far away to distinguish type.

Arthur H. Jones
2nd Lt. Air Service, USA

In addition to the above, observed Hun operation or kite balloon at Puxieux, which is just north of Lachaussee. Balloon observed about 14 h.45.

Walter P. Muther
1st Lt. Air Service, USA

Frank S. Ennis
2nd Lt. A.S. U.S.A.
Squadron Operations O.

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Operations Office
147th Aero Squadron
Amer. E.F.
September 14th, 1918

Supplementary Report

1. Protection Patrol, 2 planes, Lieuts. White (leader) and O'Neill. Altitude 3,000 meters. Mission protection for Salmsons picked up over Souilly. Route Souilly, Etain, East of Etain, SE in region of Conflans, Chambley, St. Mihiel. Altitude 3,000 meters. Time 16 h00 to 18 h00. See reconnaissance reports attached. 6 combats.

2. Trial flights, 1 plane.

Summary

a)	Sorties	25
b)	Trials	2
c)	Combats	15
d)	Pilots available	19
e)	Total pilots	22
f)	Pilots missing	0
g)	Pilots wounded	0
h)	Enemy planes confirmed	0
i)	Enemy planes unconfirmed	2 (1 balloon)
j)	Total planes	25
k)	Available planes	12
l)	Total flying hours	24 h.20
m)	Total service hours	23 h.21
n)	Alerts	0
o)	Patrols	2
q)	Voluntary patrols	1
p)	Protection patrols	2
r)	Special missions	0
s)	Planes dropped	0
t)	Planes received	0

By order of Lieutenant James A. Meissner

S. M. Purcell
2nd Lt. A.S. U.S.A.
Acting Operations Officer

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147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good. Some clouds at 3000 M.

Mission: Protection patrol for 3 Salmsons, of 99th Squad.

Route Actually Followed: Souilly, Etain, E. of Etain, S.E. in region of Conflans, Chambley and St. Mihiel.

Names of Pilots on Patrol and Leaders: Lts. White (leader) and O'Neill. Also two of 94th Squad.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16 h.00	18 h.00	3000 meters	147th	Sept. 14

Number of E.A. Seen: 5 and 1 balloon — Time: 3 at 16 h.30. 2 at 16 h.45

Number of E.A. Encountered: 5 and 1 balloon — Time: 3 at 16 h.30, 2 at 16 h.45

Type: 1st Formation Halberstadt, 2nd Fokker — Altitude: 1st 3000 m., 2nd 1000

Region: 1st E. Etain, 2nd (& bal.) region of Chambley — Combats: 6

Number of Rounds Fired: 180 — Confirmations Requested: 1 balloon

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

A German Halberstadt.

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation: Lt. W. W. White

Detailed Report of Pilots and Other Observations:

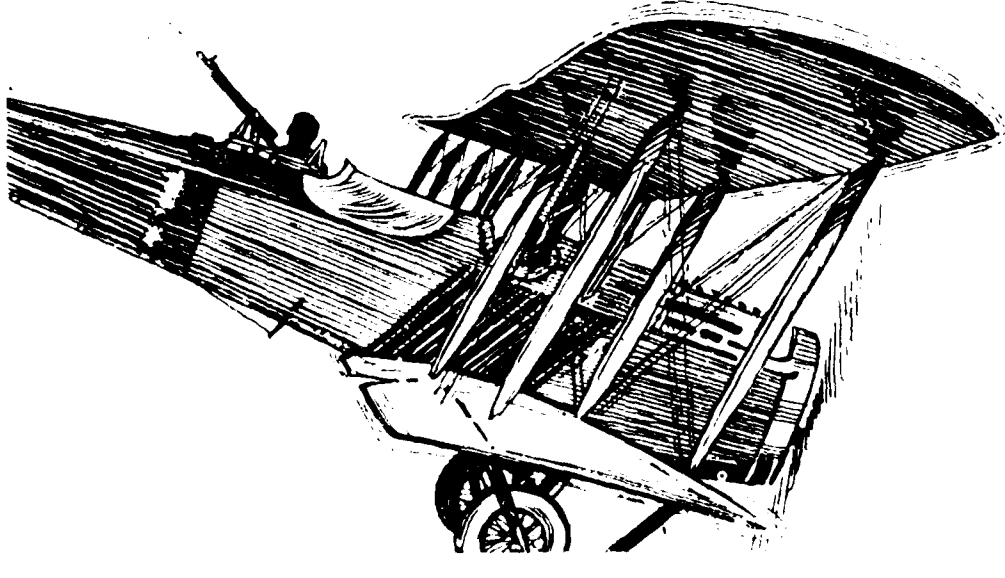
Met Salmsons at about 16 h.15 over field. There were no other Spads there. Three Salmsons started in direction of Etain. I followed at 2500 meters in region of Etain. I lost the three machines and drifted east while looking for them. Turned west and saw three Halberstadts peaking on me. Fired about 50 rounds (both guns) while turning at range of about 300 yards. Went S.E. as I was cut off from lines. Dove through cloud and went after balloons in region of E. of Chambley. Firing about 50 rounds at 150 meters. Confirmation requested.

While diving, two Fokkers (red noses) peaked on me from front. I pulled up and fired a burst at first coming head-on. He dove under. I pulled and fired burst at second who went over me. I continued south and came home by St. Mihiel.

Saw large column of smoke in region of Audun (possibly north of Audun).

Wilbert W. White
2nd Lt. Air Service, USA

Joined 94th Squad, formation of two. Flew with them in region S.W. of Etang-de-Lachaussee. After an hour of this left them and flew along lines to east of Verdun. Heavy black and white archies in region N, and E. of Verdun, but ran into nothing but five Spads (U.S.). Observed several big points on fire probably Conflans, Briey and others in that region.



Ralph A. O'Neill
2nd Lt. Air Service, USA

George J. Brew
1st Lt. A.S. U.S.A.
Squadron Operations O.

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First Pursuit Group
Operations Office
Sept. 15th [14th!] 1918

Report of Operations

1. Atmospheric Conditions. A marked improvement today, visibility generally quite good, clouding up toward evening.

2. Enemy Aerial Activity.

(a) Airplanes. Decidedly augmented all along the sector, formations of five to seven encountered quite frequently throughout the day, but in no case did they penetrate our aerial defense.

(b) Balloons. Enemy balloons were quite persistant throughout the day endeavoring to keep in the air, and as soon as they were reported in ascension by returning patrols, missions were immediately dispatched to destroy them, which resulted in considerable success for this group. Four confirmations requested.

(c) A.A.A. Very active in the vicinity of Etain, Boinville and the Etang-de-Lachaussee, and several pilots returned with their machines slightly damaged.

3. Activity of our own aviation.

(a) 1 Patrol. 6 h 00 to 7 h 45, 5 planes, altitude 3000 meters. Chatillon to Etang-de-Lachaussee. 147th Squadron. See reconnaissance report attached.

1 Patrol. 7 h 00 to 8 h 24, 4 planes, altitude 2500 meters. Chatillon to Etang-de-Lachaussee. 94th Squadron. See reconnaissance report attached.

1 Patrol. 7 h 40 to 8 h 59, 3 planes, altitude 3000 meters. Chatillon to Etang-de-Lachaussee. 94th Squadron. See reconnaissance report attached.

1 Patrol. 8 h 15 to 9 h 50, 8 planes, altitude 300 meters. Chatillon to Etang-de-Lachaussee. 95th Squadron. See reconnaissance report attached. Lt. Sewall had forced landing at Hannonville. His reservoir was pierced by a bullet from attacking E.A. but he was able to land unhurt. Lt. Mitchell had forced landing near Troyan-sur-Meuse.

1 Patrol. 9 h 30 to 11 h 15, 13 planes, altitude 3000 to 5000 meters. Chatillon to Etang-de-Lachaussee, 27th Squadron. See reconnaissance report attached.

1 Patrol. 10 h 45 to 12 h 30, 10 planes, altitude 2000 meters. Chatillon to Etang-de-Lachaussee. 147th Squadron. See reconnaissance report attached. Lt. Bronson had forced landing at Domevre.

1 Patrol. 12 h 00 to 13 h 30, 5 planes, altitude 4000 meters. Chatillon to Etang-de-Lachaussee.

1 Patrol. 12 h 00 to 13 h 30, 5 planes, altitude 4000 meters. Chatillon to Etang-de-Lachaussee. 94th Squadron. See reconnaissance report attached.

1 Patrol. 12 h 00 to 13 h 15, 4 planes, altitude 4000 meters. Chatillon to Etang-de-Lachaussee. 94th Squadron. Nothing to report. Lt. Taylor has not yet returned.

1 Patrol. 14 h 30 to 16 h 05, 9 planes, altitude 2500 to 5000 meters. Chatillon to Etang-de-Lachaussee. 27th Squadron. See reconnaissance report attached.

1 Patrol. 17 h 00 to 18 h 15, 6 planes, altitude 4000 meters. Chatillon to Etang-de-Lachaussee. See reconnaissance report attached. 94th Sqdn.

1 Patrol. 18 h 05 to 19 h 05, altitude 4000 meters. Chatillon to Etang-de-Lachaussee. 95th Squadron. Nothing to report.

(b) 1 Protection Patrol. 13 h 15 to 14 h 50, 6 planes, altitude 3000 meters. Line Bezonvaux and Damloup. 95th Squadron. Protection for 17th Army Corps. Mission Accomplished.

1 Protection Patrol. 13 h 55 to 15 h 15, 5 planes, altitude 1500 meters. Fresnes-en-Woevre, Mars-la-Tour, Chambley and Jonville. 147th Sqdn. See reconnaissance report attached.

1 Protection Patrol. 16 h 00 to 18 h 00, 2 planes, altitude 3000 meters. Mission protection for Salmsons picked up over Souilly. 147th Sqdn. See reconnaissance report attached.

(c) 1 Voluntary Patrol. 17 h 40 to 8 h 45, 1 plane, altitude 2000 meters. Verdun to Vigneulles. 147th Squadron. Nothing to report. Sept. 13th.

1 Voluntary Patrol. 7 h 30 to 9 h 09, 4000 meters, 1 plane. Verdun, Villecy, Waville, Lachaussee. 90th Squadron. See reconnaissance report attached.

1 Voluntary Patrol. 11 h 46 to 13 h 31, 1 plane, altitude 5000 meters. Mars-la-Tour and Ars. 94th Squadron. Nothing to report.

(d) 1 Alert. 16 h 00 to 17 h 05, 2 planes, altitude 2000 meters. To pick up Salmson over Souilly. Did not locate Salmson. Mission unsuccessful.

4. Miscellaneous.

(a) Attention is drawn to the difference in the telephonic report of the Group summary rendered at 19 h 00 and the summary attached herewith. One of the patrols was still out which alters our report.

Lt. Dowd of the 147th Squadron, who was reported missing in yesterday's report of operations had a forced landing at Bennoncourt and returned to the airdrome by motorcycle late last night.

Group Summary.

(a)	Sorties	123
(b)	Trials	17
(c)	Combats	27
(d)	Pilots Available	75

(e)	Total Pilots	79
(f)	Pilots Missing	1
(g)	Pilots wounded	0
(i)	Enemy planes Uncon.	7
(j)	Total planes	98
(k)	Planes Available	64
(l)	Total flying hours	137 h 09
(m)	Total service hours	127 h 43
(n)	Alerts	1
(o)	Patrols	11
(p)	Protection Patrol	3
(q)	Voluntary Patrols	3
(r)	Planes received	4

	27th	94th	95th	147th
Pilots on hand	19	20	18	22
Pilots Available	19	19	18	19
Planes on hand	25	25	25	25
Planes Available	19	15	19	12

Romer Shawhan
1st Lieut. A.S.U.S.A.
Group Operations Officer

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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good
Mission: Squadron Patrol
Route Actually Followed: Toul, Lachaussee, Toul.
Names of Pilots on Patrol and Leaders: Capt. Biddle, Lieuts. Seerley, Stivers, Guthrie, Armstrong, Kull, Este, Richards, Hays, Stiles, Brewer, Bartron, Drew, Freeman, Brody, Brodie.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
7:15	9:10	4000 meters	13th	Sept. 14

Number of E.A. Seen: About 12 Time:
Number of E.A. Encountered: 4 Time:
Type: Bi-plane Fokkers Altitude: 2500-3500 meters
Region: Preny Combats: 6
Number of Rounds Fired: Several hundred Confirmations Requested: 2

Planes Seen to Have Gone Down in Flames.	E.A.:	Allied:
Planes Seen to Have Crashed on Ground.	E.A.:	Allied:
Planes Seen to Have Gone Down Out of Control.	E.A.: 2	Allied: 1

Markings of E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation: Lieuts. Stiles, Stivers, Guthrie.

Detailed Report of Pilots and Other Observations:

At 8:00 o'clock two Fokkers at 2500 meters over Thiaucourt following 5 Liberties. They returned to their own lines before patrol could come up with them, leaving the Liberties as soon as patrol approached.

8:00 one Fokker dove past patrol, was followed by Spad.

8:10 three Fokkers dove on rear of patrol from above firing on Lieut. J. J. Seerley. Lieuts. Guthrie and Stiles attacked one firing several hundred rounds at short range. Fokker diving vertically when last seen. Confirmation requested.

Lieut. Stivers attacked a second, firing 150 shots at short range. Fokker diving vertically at low altitude when last seen. Confirmation requested.

I attacked third Fokker driving him from 3000 to 2000 meters and firing several bursts without apparent result. Then caught sight of Spad following Fokker at 50 meters from ground. Followed into German lines above him but Spad was in turn attacked by another Fokker. I dove to assist him but motor failed, then motor retook but by time I had reached 100 meters saw white smoke come out of Spad's motor and it was forced to land in region of Pournoy-la-Grasse. Spad landed normally and then went up on its nose while rolling on the ground. I watched Spad on ground but could not see pilot get out of machine. Spad was heavily fired on by machine guns from Goin balloon when he passed it while pursuing the Fokker. I was also fired on by machine guns on ground.

All combats commenced at about 3000 meters and ended at 1000 except as otherwise set forth above. Some Fokkers seen in distance were dark in coloring. Those attacked by 13th patrol had red wings and tail.

At 10:00 Lts. Freeman, Drew, A. A. Brody had not returned. 18 planes started on patrol, four forced to return within ten minutes with motor trouble. Combats started at Preny and progressed north along river. Fokkers also had red body as far as pilots seat. Rest of fuselage pure white. Black crosses on wings and tail.

Details as to locations in reports of individual pilots.

Chas J. Biddle
Captain A.S.U.S.A.

Was having motor trouble between Pont-a-Mousson and Metz. Observed our patrol above me in combat with red Fokkers at 8:00. One firing about 150 rounds. I am sure that the fire took effect and the enemy plane disappeared from sight in the region of Pagny-sur-Moselle in a straight nose dive. I noticed three other Fokkers in the combat painted the same (red fuselage with white tail).

G. D. Stivers
1st Lieut. A.S.U.S.A.

A Bi-plane Fokker dove on the rear of Flight 1. Lieuts. Guthrie from Flight 2 [and] Stiles from Flight 1 at once dove on this plane opening fire at 100 meters and closing in to 20 meters. Both pilots saw their tracers entering fuselage of the Fokker, who was last seen at 2000 meters going straight down in a nose dive. Lieuts. Guthrie and Stiles were forced to withdraw on account of both guns on each plane jamming after about 150 rounds. Were not positive whether Fokker was in or out of control. The Fokker had red wings and red fuselage forward of the pilot's seat, and red vertical stabilizer. Black crosses on top wings and rudder.

R. M. Stiles
1st Lieut. U.S.U.S.A.

M. K. Guthrie
1st Lieut. A.S.U.S.A.

Due to badly fouled plugs was unable to continue in formation with 2nd Flight but continued with group of 48th [?] which had joined formation. Was at considerable distance when 3 followed (E.A.) Fokkers dove on patrol. Was unable to gain formation but fired approximately 30 rounds at long range (300 to 400 meters) at single Fokker. Saw 8 E.A. at same distance a few moments later. Altitude 3200 meters. Time, 8:10; Place, Between Metz and Pont-a-Mousson.

E. F. Richards
1st Lieut. A.S.U.S.A.

Patrol was attacked by Fokkers. Rear of 1st Flight was attacked by 3 red Fokkers. I saw one Spad go down smoking considerably. Became lost from patrol in general fight and went to Pont-a-Mousson to await reforming of patrol. Picked up flight 3 for awhile and later a patrol of 49th Squadron saw 15 E.A. in formation about over Verny, south of Metz, returned to field at 9:05.

L. Brewer
1st Lieut. A.S., U.S.A.

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13th Pursuit Squadron

Statement by 1st Lieutenant Harry B. Freeman

On the morning of the fourteenth of September, I was one of a patrol of fourteen planes of the 13th Squadron, led by Capt C. J. Biddle. We left the Airdrome at about 7:00 A.M. and crossed the lines at an altitude of about 2500 meters. This patrol was to keep low, not over 3500 meters as another squadron was on the same sector, on a higher patrol. Our sector was to be five kilometers in advance of the lines of battle between the large three-fingered lake, north-west of Thiaucourt and the east bank of the Moselle river.

At about 7:45 A.M. our patrol was attacked by four Fokker planes which had gotten between us and our lines at a greater altitude than we were flying. I was flying directly behind the leader (Capt Biddle), and witnessed one of our planes shot down out of control. Immediately afterwards I saw another plane being forced down within the German lines. I was about to make a right hand turn to stay with the leader and attack the Boche behind us, but on seeing this, another plane being forced down by a single Boche plane, I turned to the left and started to go to his assistance. They were considerably below us and I put my plane into a steep nose-dive. I attempted to turn the valve on the nourrice tank, but it was stuck and could not be moved. At about one thousand meters I drew close to the Boche plane, which was gradually forcing the Spad to the ground, shooting continuously. I commenced firing at a long range to draw him from this plane. At that moment my motor stopped, and I turned toward the lines, trying to start it again. This all took place about eight kilometers within the German lines, a few kilometers east of the Moselle River. When my motor failed, I was at an altitude of about nine hundred meters. I was unable to restart the motor and was forced to land in the second-line trenches (German) on the east bank of the Moselle River, just north of Pont-a-Mousson. I was unable to destroy the plane as I landed among German troops. I attribute the motor stopping to the pressure on the gasoline tank down[?], due to poorly constructed nourrice valve and motor pump.

During my stay in Germany I visited the following camps: St. Avold, Strassbourg, Karlsruhe, Landshut, Villingen and Constance. On the whole, the treatment received was not bad, although the food in most places was terrible and insufficient to live on. The Red Cross supplied us with food and clothing when we reached our permanent camp at Villingen. Especially bad treatment was received when I was first captured, while in Strassbourg. Eight of us were kept confined in a small room, with two bowls of soup a day.

—302—

13th Aero Squadron

Statement by 1st Lieutenant Charles W. Drew

September 14th, 1918, I flew, No 2 position 1st flight of a squadron patrol of three flights, Major Charles J. Biddle, Commanding Officer 13th Aero Squadron, (then Captain) Leading. During the course of this patrol at an altitude of about 3500 meters while over enemy territory my left magneto failed, and due to decrease in speed I gradually dropped back losing my position in the formation. Realizing there would be, in all probability, a fight with enemy planes, I endeavored to keep up with the formation, and at an approximately 9:03 A.M. I observed three Fokkers biplanes (monoplace) dive through our first flight partially breaking up the formation.

Two of our planes went down with the last Fokker and were apparently in trouble, so I dove from my position then at the right rear of the formation, and at 2,000 meters altitude engaged the enemy plane nose on at about 150 meters range, receiving an incendiary bullet in my right thigh partially paralizing my right leg. The two Spads had pulled off to the left just previously and I continued the fight although greatly handicapped by my loss in speed and inability to use my right leg. While viraging for position I received several direct bursts, one bullet ripping my blouse open and another my breeches, finally, at about 9:10 A.M. I was hit in the right arm by an explosive bullet. The shock twisted my body in the straps and I fainted while trying to grasp the control stick with my left hand. The plane falling out of control for a distance of about 1500 meters, the rush of air partially revived me, my only recollection of landing being a flash of green in front of me and pulling back the control lever struck, crashing my landing gear and lower wings, not receiving any further personal injuries, however.

This fight began Southwest of Metz and I was brought down some distance South of the Frescaty Airdrome. The enemy plane was painted a brilliant scarlet on upper and lower wing, engine housing and three quarter way back on fuselage, the tail sections were striped black and white, but I did not observe any squadron marking. During the course of the fight I fired about 100 rounds at ranges of 200 to 100 meters with no apparent effect.

My motor housing was smoking and the plane was riddled by machine gun fire. I managed to unbuckle my strap and get out, my right arm and leg being paralized, I only crawled a few feet in the direction of a woods when I again fainted. When I came to, a German captain and a squad of soldiers were standing beside me together with some peasants. The Captain asked me in French, "Etes-vous francais?" I answered "Non, American" He then, using his knife and with the aid of

one of his soldiers, cut away my flying suit and blouse where I was wounded and put a tourniquet on my upper arm and leg, there by, no doubt, saving my life, as the main arteries in my upper arm were severed. They gave me a glass of water and arranged me as comfortably as possible, then the captain questioned me about the straight belt of flat nosed incendiary cartridges that I carried in my left hand gun. He called them dums-dums but after reading my orders to attack enemy balloons nothing more was said about them. Then after looking at our squadron insignia he said in English, "You have killed four Germans". I said "No, two only". The soldiers then arrived carrying a stretcher and I was carried five or six hundred yards to an ambulance which took me to a small village where I was carried into a German field dressing station, in one of the village houses. I was operated on immediately, ether anesthetic being used.

The morning of September 15th I was carried in an ambulance to a Hospital located somewhere in Metz. Here I was again operated upon, a German orderly staying with me after the operation and giving me every medical attention. That afternoon a German intelligence officer questioned me as follows: How old, where born, name and address, name of nearest relative, when entered service, how long commissioned, how long overseas, how long at front, and organization. I gave my age and birthplace, my mother's name and address, and stated that I had just reached the front and knew nothing more. He then asked me whether I would like to know what had become of my comrades in the same flight. I said "Yes", and reading from a paper he said, "Lt. Freeman and Lt. Brodie are prisoners of war, unhurt, and Lt. Kull was killed." He then laughingly told me that I was in the 13th Aero Squadron,. Second Pursuit Group, St. Mihiel Aerodrome.

He then made the following statement, "This offensive (St. Mihiel) was expected by us but your superiority in artillery overcame our resistance." He asked me whether I had seen the naval guns. I answered "No", and was not questioned any further.

Up to this time I had not been given anything to eat or drink because of the ether, but was given a small glass of Cognac several times that afternoon and evening. At 11:30 or 12:00 o'clock that night I was placed in another ambulance, a wooden wheeled springless, horse drawn vehicle, together with another American Officer, and the driver having his "Wind" up because of an allied aerial night bombardment, drove at a gallop over the rough streets. At the height of the bombardment we were taken out of the ambulance and placed in concrete bomb proofs where a number of German soldiers were sleeping. After the raid we continued our trip, reaching the German prisoners hospital, St. Clemens, in Metz.

The morning of the 16th I was placed in a ward of four beds, two French officers, one Italian and myself. In the adjoining ward were two English Officers. We had an English convalescent soldier as orderly and

the beds were fairly comfortable and were kept clean. The German surgeon worked on my arm in the operating room each morning, but on the morning of the 21st told me that it would be impossible to save it, and my only chance to live would be to have it amputated, asking my consent to the amputation, and from that time on I recovered slowly.

Up to this time I had not been able to eat because of my physical condition but my food was palatable, although not of the best food for wounded or sick men. Up to Oct 10th, I was on special diet, the daily menu being about as follows: 7:30 a.m. a cup of substitute coffee and daily bread ration of about five ounces of fair bread; at 9:30 a.m. one-quarter glass of red wine, poor quality; one small roll and an allowance of oleomargerine or jam, also of poor quality; at 12:00 o'clock noon dinner, generally of soup, meat and potatoes, sometimes a vegetable either cabbage, carrots, or greens; at 4:30 p.m. a cup of substitute coffee with milk; at 6:00 p.m. a light supper, generally soup and coffee. Dinner and supper usually balanced; that is, if we had had a good dinner the supper would be very light and poor, or vice-versa. After October 10th I was put on regular diet consisting of: 7:30 a.m. substitute coffee and daily bread rations (black potato bread); 9:30 a.m. oleomargerine or jam allowance, 12:00 noon dinner, afternoon coffee and supper same as special diet.

The personnel of this hospital was as follows: Two or three German Officer surgeons, who were only on duty in the morning, five German Catholic sisters (Nurses), German soldier orderlies, and sergeants, convalescent prisoner stretcher bearers and officers ward orderlies, an inspector and Oberhartz. The hospital itself was a former school or college building fairly well heated, kept clean and the wards were regularly inspected each morning by one of the officer surgeons, the patients needing dressing, being designated by him and carried to the dressing rooms or stretchers. Two or three prisoner interpreters were available at all times. During an air-raid patients able to walk were supposed to go in the cellar, which had been converted into a bombproof and they were not allowed in the court yard until the raid was over.

The morning of November 17th I was brought into Nancy by four Y.M.C.A. men in a Ford, who had driven into Metz that morning. November 18th p.m. I reported to Evacuation Hospital No. 1, Toul, and was admitted as a patient, reporting while there to my former commanding officer, and the Prisoners Receiving Station at Menil-la-Tour, also C.A.S., 2nd Army.

Two watches, pocket-book, cigarette case and other personal articles and my uniform were returned to me while a patient at St. Clemens. I was given in exchange for 560 Francs in my possession when shot down 441 marks. My field boots, Sam Browne belt, identity card, pilots card, fountain pen, pen knife, flying clothes and cigarettes were not returned. I was paid 60 marks for one month only, the hospital

keeping 40 marks for board, the balance I used to purchase toilet articles.

The German Officer doctors were polite and respectful at all times, and I believe, efficient, at least judging from the operation performed on myself. The head doctor told me shortly after my amputation that when entirely well I would be sent to Switzerland as I was disabled. The German Catholic sisters were very kind and efficient, the personnel was insufficient for the number of prisoner patients, there being 500 prisoners in this hospital at one time A few of the German soldiers and non-commissioned officers were surly, and not careful in handling stretcher patients. This was rather the exception.

I do not speak or write German and conversed very seldom with the German personnel, however, judging from the conversations of some of the German soldiers and non-commissioned officers with the French Officer prisoners, the average soldier was "fed up" with the war, and admitted even in early October that the war was lost for them.

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Excellent—Light clouds at 2000 Meters.

Mission: Protection patrol 1st Sqdn. Salmson #8, 17, 21.

Route Actually Followed: Region Lachaussee-Moselle river toward Bey and back to Toul.

Names of Pilots on Patrol and Leaders: Lt. Brooks (leader), Capt. Bridgman, Lts. Doolin, Hassinger, Tyndall, Agar, Tucker, Lovell, Sperry.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
10:30	12:40	2500-4000M	22nd	Sept. 14

Number of E.A. Seen: 7	Time: 11.15, 11.20, 12.00, 12.30.
Number of E.A. Encountered: 4	Time: 12.30
Type: Unknown mono-place	Altitude: 2000 M
Region: Chambrey [?]	Combats: 1
Number of Rounds Fired: 20	Confirmations Requested: No

Planes Seen to Have Gone Down in Flames.	E.A.:	Allied:
Planes Seen to Have Crashed on Ground.	E.A.:	Allied:
Planes Seen to Have Gone Down Out of Control.	E.A.:	Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

While protecting Salmsons, saw 1 Fokker 1000 Meters above, formation region of Dampvitoux. 1 Pfalz came up from direction of Metz, looked over our formation from 1000 Meters and disappeared in direction of Metz at 11.20. After protection was over, headed for white archie bursts over region N.W. of Bey. 1 Boche bi-place sighted and seen to turn back into his own lines at 12.00. 4 dark grey mono-places in region of Chambrey at 12.30. Dove from 4000 Meters to their level at 2000 meters [and] shot about 20 rounds from long range for effect, but they disappeared into clouds. Lack of gasoline forced patrol to return at 12.35. Enemy baloon on ground S.W. of Arnaville in clearing on edge of woods.

A. R. Brooks
2nd Lt. A.S. U.S.A.

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good
Mission: High patrol and Protection of Salmsons.
Route Actually Followed: Toul—Thiaucourt—Norroy—Mars-la-Tour—Toul.
Names of Pilots on Patrol and Leaders: Capt. Bridgman (leader) Lts. Brooks, Hassinger, Tyndall, Doolin, La Force, Kimber, Little, Agar.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
14.18	16.02	5000 M	22nd	Sept. 14

Number of E.A. Seen: 6, 5, 12 Time: 14.50
Number of E.A. Encountered: 12 Time: 15.10
Type: Fokker D. 7 Altitude: 5000 Meters
Region: Mars-la-Tour Combats: 3
Number of Rounds Fired: 300 Confirmations Requested: Yes 2
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: 1 Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Lts. Brooks and Hassinger.

Detailed Report of Pilots and Other Observations:

While waiting around Mars-la-Tour for Salmsons, our patrol saw 6 E.A. in region of Conflans. Tried to get into position to attack E.A. but they turned and went far away. At this moment patrol was attacked by a group of 12 enemy Fokkers. Patrol was completely broken up and numerous combats resulted. Lt. Brooks brought down 2 E.A. He himself received more than a score of bullet holes in his plane. His rudder controls were cut. He landed safely at Menil-la-Tour. Lt. Hassinger failed to return. I saw one enemy plane explode into flames and one go down out of control both in region of Lachaussee.

Lt. Doolin had a combat for which he asks investigation. (See following page).

Ray Clafflin Bridgman
Captain A.S. U.S.A.

Individual Combat Report

Date: Sept. 14 Visibility Near Lines: Good

Mission: Patrol

Route Actually Followed: Toul—Thiaucourt—Norroy—Mars-la-Tour—Toul.

Names of Pilots in Patrol and Leaders: Same as on Foregoing Report of Capt. Bridgman.

Hour of Departure: 14.19 Return: 15.22

Dropped out of formation with a missing motor; just after I left I saw tracers passing left wing, turned and fired at 2 Fokkers that were diving on my tail approximately 100 meters behind and 50 meters above me. Both Fokkers turned back, one, the closest to me, made a very wild chandelle and I am pretty sure I hit him although I did not have time to look again. Both Fokkers had light blue colored fuselage and wings.

B. M. Doolin
2nd Lt. A.S. U.S.A.

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Headquarters 2nd Pursuit Group
1st Pursuit Wing

Report of Operations #78

From 17 h 00 Sept 13th to 17 h 00 Sept 14, 1918
Weather: Fair. Visibility good.

I. Patrols

1. Toul, Pont-a-Mousson,. Champenaux, Bayonville, Thiaucourt, Toul
   15 h 04-16 h 27
   2500 meters
   5 planes 139th
   Nothing to report
2. Pont-a-Mousson, Thiaucourt
   16 h 20-17 h 14
   3200 meters
   7 planes 49th
   (1 D.H. 11th) (1 D.H. 20th) Nothing to report
3. St. Mihiel, Heudicourt, Regnieville
   17 h 05-17 h 54
   3500 meters
   1 plane 49th
   Nothing to report
4. Vigneulles, Nomeny
   15 h 45-17 h 05
   2500 meters, 1000 meters
   1 plane 13th
   Nothing to report
5. Nomeny, Lachaussee
   16 h 07-18 h 15
   3800 meters
   4 planes 22nd
   (1 D.H. 11th) Nothing to report
6. Menil-la-Tour
   17 h 30-18 h 15
   2500 meters
   6 planes 139th
   (2 D.H. 20th) Nothing to report
7. Flirey, Vigneulles, Solgne
   17 h 45-19 h 10
   3500 meters
   5 planes 13th
   5 combats. See pilots reports

8. Lauchaussee
   7 h 15-9 h 10
   4000 meters
   16 planes 13th
   See pilots reports
9. Toul, Pont-a-Mousson, Arnaville, Thiacourt
   7 h 00-9 h 08
   4500 meters
   11 planes 49th
   See pilots reports
10. Pont-a-Mousson, Menil-la-Tour
    14 h 18-16 h 02
    4700 meters
    11 planes 22nd
    Lt Hassinger not returned. 6 combats; see pilots reports.
11. Dieulouard, Chambley, Haumont, Pont-a-Mousson, Montsec
    14 h 30-16 h 37
    3000 meters
    14 planes 139th
    1 combat. See Lt. Seevers report

II. Protections
1. Region of Lachaussee
   8 h 56-10 h 54
   2500 meters
   13 planes 139th
   Motor trouble—mission returned.
2. Moselle River, Bey, Preny
   10 h 30-12 h 40
   4000 meters
   9 planes 22nd
   See pilots reports.

III. Alerts
1. Overfield (1EA)
   9 h 45-10 h 00
   1 plane 22nd
   Nothing to report

IV. Trials
1. 15 h 45-17 h 05
   1 plane 13th
   Testing
2. 8 h 20-8 h 35
   1 plane 13th
   Testing
3. 10 h 25-10 h 35

1 plane 13th
Testing

4. 10 h 10-10 h 40
1 plane 139th
Testing
5. 10 h 54-12 h 40
1 plane 22nd
Testing
6. 11 h 20-11 h 40
1 plane 49th
Testing
7. 11 h 25-11 h 53
1 plane 139th
Testing
8. 12 h 00
1 plane 139th
New plane arriving
9. 11 h 51-12 h 07
1 plane 22nd
Testing
10. 13 h 30-13 h 50
1 plane 13th
Testing
11. 14 h 15-15 h 00
1 plane 13th
Testing
12. 15 h 00-15 h 30
1 plane 13th
Testing
13. 16 h 15-16 h 25
1 plane 13th
Testing

V. Miscellaneous

1. Lt. R.R.S. Converse, 13th Sqdn. had not returned from patrol which left at 17.45 and returned at 19.10. He was last seen to dive through the clouds just before the combat, time 18.50.

2. Lt. Chas. W. Drew, Alton H. Brody, Harry B. Freeman, Geo. R. Kull have not returned from patrol which left at 7.15 and returned at 9.,10. At 8.10 they were last seen having been brought down in the combat.

3. Lt. Philip E. Hassinger, 22nd Sqdn. has not returned from patrol which left at 14.18. Was last seen during course of combat over Mars-la-Tour at 15.20.

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28th Aero Pursuit Squadron
Third Pursuit Group
Operations Office
Sept. 14th, 1918

Daily Operations Report.

1. Patrol:

1. 6:30 to 8:10. 12 planes. 28th Squadron. Route: Vaucouleurs, Toul, Pont-a-Mousson, Louvigny, Waville, Vigneulles, Toul, Vaucouleurs. Altitude 2500 to 3500 meters. Patrol leaders: Lt. Cassady, Merrick. Pilots: Lts. Grimmer, Buchanan, Jebb, Meyer, Hardendorf, Hardy, Moriarty, Buckley, Allein, Cline. Visibility poor. See reconnaissance report. Flying time 20:00.

2. 12:50 to 15:10. 7 planes. 28th Squadron. Route: Vaucouleurs. Void. Nomeny, Louvigny, Chambley, Etain, Chambley, Louvigny, Nomeny. Void, Vaucouleurs. Altitude 3500 to 4500 meters. Patrol leaders: Lts. Cassady, Merrick. Pilots: Lts. Buckley,. Greenhalgh, Bell, Allein, Hardy. Visibility good. Nothing to report. Lightly shelled over Sillegny and Noveant. Lts. Bell and Hardy returned with motor trouble.

2. Special Mission:

1. 16:10 to 18:10. 13 planes. 28th Squadron. Route: Vaucouleurs, Mars-la-Tour, Chambley. les Baraques, Waville, Arnaville. Mission: to bomb and machine gun the roads and concentration of troops in the vicinity of Waville and Arnaville. Altitude 100 to 1000 meters. Mission successful. Patrol leaders: Lts. Turnure, Cassady, Merrick. Pilots: Lts. Buckley, Allein, Moriarty, Stenseth, Stephenson, Buchanan, Jacques, Cline, Hardy, Grimmer. See reconnaissance report. Flying time 26:00.

Summary:

Sorties	32
#No. Pilots available	20
Total planes	23
Total flying hours	55:20
Total service hours	55:20
Patrols	2
Special missions	1
#No. Pilots assigned	22
Planes available	11

#Number not including Commanding Officer.

By order of Lt. Jones.

A.B. Hill. 2nd Lt. A.S. U.S.A.
Operations Officer

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28th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good
Mission: Patrol
Route Actually Followed: Vaucouleurs, Vilcey-sur-Trey,Vaucouleurs.
Names of Pilots on Patrol and Leaders: Lt. Merrick. Pilots: Lts. Cassady, Hardy, Allein, Moriarty, Jebb.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
6:30	8:10	2500-3500 meters	28th	9/14/18

Number of E.A. Seen: 6 Time: 7:35
Number of E.A. Encountered: 6 Time: 7:35
Type: Fokker Altitude: 2500 meters
Region: North of Vilcey-sur-Trey Combats: 1
Number of Rounds Fired: 300 Confirmations Requested: 1
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings of E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Lts. Jebb, Moriarty, Cassady, Allein and Merrick.

Detailed Report of Pilots and Other Observations:

At 7:35 when north of Vilcey-sur-Trey over Foret des Vencheres patrol encountered six Fokkers. A general combat ensued and one E.A. was seen to go down in a vrille apparently out of control.

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93rd Aero Pursuit Squadron
Third Pursuit Group
Operations Office
September 14th, 1918

Daily Operations Report

1. Special Missions
   1. 16:15-17:40 7 planes, 93rd Squadron. Route: Vaucouleurs

—Toul—Thiaucourt—Lachaussee—Jonville—Woel—Vigneulles—Vaucouleurs. Altitude 1000 meters. See Reconnaissance Report. Lts. Gude, Harding, Case, Cox, Long, Carruthers, and D'Olive. Lt. D'Olive between 17:05 and 17:15 engaged in three separate combats near Lachaussee. All 3 E.A. planes crashed on ground. Confirmations requested. Lt. Carruthers and Harding at 17:05 near Hadonville, one E.A. which burst into flames. Confirmation requested.

2. 16:50—18:00 4 planes, 93rd Squadron. Route: Vaucouleurs —Fliery—Pont-a-Mousson—Buxieres—Vaucouleurs. Altitude: 2000 meters. See Reconnaissance report. Lts. Wright, Lindsley, Patterson and Long. Lt. Wright saw three E.A. near Buxieres. Fired 250 rounds without apparent result.

3. 16:30-18:10 7 planes, 93rd Squadron. Route: Vaucouleurs —Chambley—Louvigny—Pagny-sur-Moselle—Nomeny—Vaucouleurs. Altitude: 3000 meters. Nothing to report. Lts. Patterson, Ball, Case, Lindsley, D'Olive, Cox and Long.

4. 12:30—14:30 8 planes, 3rd Squadron. Route: Vaucouleurs —Pont-a-Mousson—Pagny-sur-Moselle—Hadonville—Buxieres—Thiaucourt—Vaucouleurs. See Reconnaissance report. Lts. Wright, Case, Patterson, Carruthers, Lindsley, Cox, Rummell and Ball.

II. Trial Flights

1. 18:10 1 new plane arrived from Colombey-les-Belles.
2. 13:00-14:00 1 plane, Lt. Long testing.
3. 12:30 1 plane, Lt. Evans, arrived from forced landing Nancy
4. 13:55-13:40 1 plane Lt. Barry testing.
5. 14:20-14:30 1 plane, Lt. Barry testing.
6. 14:55 1 new plane arrived from Colombey-les-Belles.
7. 16:20-16:25 1 new plane, Lt. Wright testing.

III. Summary

Sorties	33
Trials	7
Combats	5
*Pilots available	20
Enemy planes unconfirmed	4
Total planes	24
Available planes	8
Total flying hours	21:55
Total service hours	19:50
Special missions	4
*Pilots assigned to Squadron	21
Patrols	2

*Not including Commanding Officer

By order of Major Huffer

Earl W. Martin
2nd Lt. A.S., U.S.A.
Operations Officer

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Fair

Mission: Patrol

Route Actually Followed: Vaucouleurs—Haumont—Jaulny—Chambley—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Cox and Rummell

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:45	14:30	3500 M	93rd	Sept. 14th,-18

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Archies active all along new line. Saw formation over Metz about seven planes, too far off to distinguish.

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Very Good

Mission: Special Mission

Route Actually Followed: Vaucouleurs—Pont-a-Mousson—Pagny-sur-Moselle—Hadonville—Buxieres—Thiaucourt—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Wright, Case, Patterson, Carruthers, Lindsley, Cox, Rummell, and Ball.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:30	14:30	3000 M	93rd	Sept. 14th, -18

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: 250 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

An enemy balloon was seen near Buxieres, altitude 500 meters, which was fired upon. The balloon was pulled down but not destroyed. Time 13:20. Nothing further to report.

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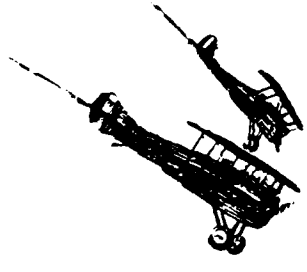
Operations Office
103rd Aero Pursuit Squadron, S.C.
Third Pursuit Group
1st Pursuit Wing, 1st Army
September 14th, 1918



Daily Operations Report

I. Special Missions.

1. 16.35-17.45—10 planes, 103rd Squadron, Route, Vaucouleurs—Montsec—St. Benoit—Chambley—Villecy-sur-Mad—Vandieres—Pont-a-Mousson—Vaucouleurs. Altitude, 500 Meters, See Reconnaissance Report, Lieutenants Larner, Furlow, Hunter, Pyne, Kirtland, Jones, Eaton, Palmer, Frost, and Kenyon.

II. Protection Patrols.

1. 9.30-11.20—10 planes, 103rd. Squadron, Route, Vaucouleurs—Rembercourt-Charey—Dampvitoux—Lachaussee—Chambley—Rembercourt—Vaucouleurs. Altitude, 2000 Meters. See reconnaissance report. Lieutenants Tobin, Furlow, Cannon,. Faith, Monroe, Kirtland, Hunter, Irving, Eaton, and Ponder.

III. Trial Flights.

1. 12.40—1 plane arrived from Colombey-les-Belles, Lieut. Waddell #4633.

2. 15.20—1 plane arrived from forced landing at Gondreville, Lieut. Manchester.

3. 15.20-15.30—1 plane, Lieut. Cannon, testing.

4. 15.20-15.35—1 plane, Lieut. Eaton, testing.

IV. Summary.

Sorties	24
Trials	4
Combats	9
Pilots	21
Pilots missing	1
Enemy planes unconfirmed	4
Total planes	25
Available planes	8
Planes not returned	2
Total Flying Hours	20.35
Total Service Hours	20.00
Protection Patrols	1
#Pilots assigned to Squadron	22
Special Missions	1

Bombs dropped—1 bomb dropped on Chambley, burst not observed.

#Not including the Commanding Officer.

By order of Captain Rockwell.

H. V. Bell
1st Lieut. A.S.U.S.A.
Operations Officer

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103rd Aero Squadron

Reconnaissance Report

Visibility Near Lines:

Mission: Protection for 2 Salmsons.

Route Actually Followed: Vaucouleurs—Rembercourt—Charey—Dampvitoux—Lachaussee—Chambley—Rembercourt—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieutenants Tobin, Furlow, Cannon, Faith, Monroe, Kirtland, Hunter, Irving, Eaton and Ponder.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
9.30	11.20	2000 M.	103rd	Sept. 14th, 1918.

Number of E.A. Seen:	Time:	
Number of E.A. Encountered:	Time:	
Type:	Altitude:	
Region:	Combats:	
Number of Rounds Fired:	Confirmations Requested:	
Planes Seen to Have Gone Down in Flames.	E.A.:	Allied:
Planes Seen to Have Crashed on Ground.	E.A.:	Allied:
Planes Seen to Have Gone Down Out of Control.	E.A.:	Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lieut. Tobin reports: Met two Salmsons over our field at 2000 meters, about 9.40. Salmsons became separated on their way to the lines. Our patrol followed Salmson No. 4 across the lines at Rembercourt and followed same to Lachaussee, when Lieut. Irving was attacked by lone Fokker. Hun machine being alone did not persist in the attack. Shortly afterwards I observed strong patrol of E.A. and as pre-arranged signalled Lieut. Furlow to dive alongside of Salmson and give warning. Lieut. Furlow did as instructed whereupon the rest of the patrol was led back from the lake towards Pont-a-Mousson, the prearranged rendezvous. Lieut. Furlow accompanied by Lieut. Hunter followed Salmson machine from Lachaussee to Chambley where Salmson was lost in the clouds. Mission accomplished by Salmson machine.

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Third Pursuit Group
Operations Office
213th Aero Pursuit Squadron
September 14th, 1918

Daily Report of Operations

1. Protection Patrols
9:25-11:05. 6 planes, 213th Squadron. Route: Vaucouleurs, Rembercourt, Chambley, Vaucouleurs. Altitude 4500 M. Mission unaccomplished. See Reconnaissance report. Lt. Hoffman had a forced landing flew back to field. Lts. Hoffman, W. F. Loomis, McAlpin, H. S. Loomis, Munn, Aiken.

II. Patrols

1. 12:45-14:45. 12 planes, 213th Aero Squadron. Route: Vaucouleurs, Bey, Pont-a-Mousson, Fresnes, Chambley, Jonville, Vaucouleurs. Alt. 2500 M. Lts. Grey, Gaillard, Richardson, engaged a hostile plane. See Reconnaissance report, Lts. Grey, Ford, Matheson, Weirick, Pickard, McClure, H. S. Loomis, McAlpin, Richardson, Gaillard, Mell, Lee.

III. Trials

9:15- 9:25	1 plane.	Lt. Gaillard, Testing
9:55-10:00	1 plane.	Lt Treadwell, testing
11:00-11:10	1 plane.	Lt Treadwell, testing
16:40-16:45	1 plane.	Lt Treadwell, testing

IV. Summary

Sorties	22
Trials	4
Combats	1
*Pilots available	19
Pilots missing	2
Enemy planes unconfirmed	1
Total planes	25
Available planes	12
Planes not returned	2
Total flying hours	18:50
Total service hours	18:20
Patrols	1
Protection patrols	1
*Pilots assigned to squadron	21

*Not including Commanding Officer.

By order of the Commanding Officer

E. Norman Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

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213th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: Protection Patrol

Route Actually Followed: Vaucouleurs, Rembercourt, Hannonville, Chambley, Vaucouleurs

Names of Pilots on Patrol and Leaders: Lts. W. F. Loomis, McAlpin, Munn, Hoffman, H. S. Loomis, Aiken.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
9:25	11:05	4500 M	213th	Sept 14th, 1918

Number of E.A. Seen: 5 Time: 10:20
Number of E.A. Encountered: Time:
Type: Fokkers Altitude: 4500 meters
Region: Gravelotte Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Met Salmsons over field and took position at 4500 meters, but while proceeding towards line lost Salmsons in the clouds. Proceeded to region in which mission was to be accomplished but did not find Salmsons. In the region of Gravelotte saw 5 Fokkers going northwest at 10:20. Did not attack as was outnumbered [?]

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213th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good
Mission: Special Mission
Route Actually Followed: Vaucouleurs, Bey, Pont-a-Mousson, Fresnes, Chambley, Jonville.
Names of Pilots on Patrol and Leaders: Lts. Grey, Gaillard, Richardson

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:45	14:45	2500 M	213th	Sept. 14th, 1918

Number of E.A. Seen: 22 Time: 14:00
Number of E.A. Encountered: 1 Time: 14:00
Type: Fokker Altitude: 1000 meters

Artist's portrayal of a "Dog Fight." (Art by Clayton Knight).

Region: Sponville Combats: 1
Number of Rounds Fired: 350 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: 1 Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Lts. Grey, Richardson, and Gaillard

Detailed Report of Pilots and Other Observations:

Lts. Grey, Richardson, and Gaillard report combat with enemy mono-place of the Fokker type, which was painted red with exception of tail, which was of light color; crosses on wings were straight.

Lt. Grey fired 150 rounds and observed machine go into right hand vrille. Lt. Richardson then attacked firing 100 rounds. Fokker still in vrille. Lt. Gaillard then attacked firing 75 rounds and observed E.A. to go into a very tight vrille about 400 meters from the ground. Confirmation requested.

Saw two formations of enemy aircraft, 8 to 10 in number, coming from direction of Metz.

Enemy AAA active but not accurate north of Lake Lachaussee.

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 14th, 1918

Operations Report Number 40.

1. Patrols

1. 6:30-8:10. 10 planes, 28th Squadron. Route: Vigneulles, Chambley, Louvigny, Lachaussee, Pont-a-Mousson. Altitude 2500-3500 meters. See Reconnaissance report.

2. 6:30-8:10. 7 planes, 93rd Squadron. Route: Chambley, Louvigny, Pagny, Nomeny, Altitude 2500-3500 meters. Nothing to report.

3. 12:30-14:30. 8 planes, 93rd Squadron. Route: Pont-a-Mousson, Pagny, Hadonville, Buxieres, Thiaucourt. Altitude 3000 meters. See Reconnaissance report.

4. 12:45-14:45. 12 planes, 213th Squadron. Route: Bey, Pont-a-Mousson, Fresnes, Chambley, Jonville,. Fresnes, Commercy. Altitude 2500 meters. See Reconnaissance report.

5. 12:50-15:10. 7 planes, 28th Squadron. Route: Void, Nomeny, Louvigny, Chambley, Etain, Chambley, Louvigny, Nomeny. Altitude 4500 meters. Nothing to report.

II. Protection Patrols.1. 9:45—11:05. 6 planes, 213th Squadron. Route: Rembercourt, Hannonville. Altitude 4500 meters. See Reconnaissance report.

2. 9:30-11:20. 10 planes, 103rd Squadron. Route: Rembercourt, Charey, Dampvitoux, Lachaussee, Chambley, Rembercourt, Void. Altitude 2000 meters. See Reconaissance report.

III. Special Missions

1. 16:15-17:50. 7 planes, 93rd Squadron. Route: Toul,. Thiaucourt, Lachaussee, Woel, Jonville, Vigneulles. Altitude 1000 meters. See Reconnaissance report.

2. 16:10-18:10. 13 planes, 28th Squadron. Route: Arnaville, Coin sur Seille, Arnaville, Pont-a-Mousson. Altitude 100-1000 meters. See Reconnaissance report.

3. 16:25-18:25. 12 planes, 213th Squadron. Route: Commercy, Apremont, Thiaucourt, Chambley, Hannonville, Mars la Tour. Altitude 60 meters. See Reconnaissance report.

4. 16:35-17:45. 10 planes, 103rd Squadron. Route: Montsec, St. Benoit, Chambley, Villecy sur Mad, Vandieres, Pont-a-Mousson. Altitude 500 meters. See Reconnaissance report.

5. 16:50-18:00. 4 planes, 93rd Squadron. Route: Flirey, Pont-a-Mousson, Buxieres, Void. Altitude 2000 meters. See Reconnaissance report.

W. Thaw
Major, A.S., U.S.A.
Commanding

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 14th, 1918

Form Number 1 Pursuit

	28th	93rd	103rd	213th	Hdq.	Total
Sorties	32	33	24	34		123
Trials		7	4	4		15
Combats		5	9	1		15
Pilots available	20	20	21	19		80
Pilots Killed						
Pilots Missing			1			1
Pilots Wounded						
Enemy planes confirmed						
Enemy planes unconfirmed		4	4	1		9
Total planes	23	24	25	23	1	96
Available planes	11	8	8	13	1	41
Planes crashed						
Planes lost in enemy lines						
Planes not returned			2			2
Total Flying Hours	55:20	37:30	30:55	34:30		138:15
Exercises	55:20	35:25	30:00	34:00		154:45
Target Practice						
Alerts						
Patrols	?	2		1		5
Protection patrols			1	1		2
Special Missions	1	2	1	1		5
Bombing raids						
Pilots enrolled	22	21	22	21		86
Bombs dropped: (60 Kilos)	7		1			8

W. Thaw
Major, A.S., U.S.A.
Commanding

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11th Aero Squadron

Raid Report

Visibility: Fair, Misty toward ground
Objective: Conflans
Route Actually Followed: Bar-le-duc, St. Mihiel,. Verdun, Obj & Return
Number of Teams Participating: Seven
Names of Leaders: Lieut. Chapin (pilot) Lieut. Laird (Obser)

Hour of Departure	Hour of Return	Altitude	Squadron	Date
6:45	8:30	3,000 M	11	Sept 14th

Number of E.A. Seen: 7 to 9 Time: 8:00
Number of E.A. Encountered: 7 to 9 Time: 8:00
Type: Fokkers Altitude: 3,000 M
Region: South of Conflans Combats: One
Number of Rounds Fired: Confirmations Requested: Two
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: 2 Allied: 2
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Lt. Biggs, Lt. Greer, Lt. Harter, Lt. Stephenson, Lt. Munn, Lt. Ward, Lt. Tyler, Lt. Strauch, Lt. Chapin, Lt. Laird.

Number of Bombs Dropped: 6 Type: 155 M/m 50 kils
Bursts were Observed at: Railroad yards in Conflans, center of railroad yards and warehouses south of yards with little smoke.
Remarks on Enemy-Aircraft Artillery: Poor and inaccurate
Remarks on Enemy Airplanes: seven or nine encountered.
Other Observations: 60 cars on tracks entering Conflans from Briey 8:10. 1-25 cars going north out of Mars-la-Tour

Clair B. Laird
2nd Lt. A.S.U.S.A.
Squadron Operations Officer

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11th Bombardment Squadron

Report of 1st Lieutenant Fred T. Shoemaker

On the second [third] day of the St. Mihiel drive the 11th Bombardment Squadron left their Aerodrome at Amanty for a bombing raid against Conflans. Near the objective they were attacked by a formation of Huns and in the ensuing fight Lieutenant Shoemaker was shot down. Recovering consciousness five days later he found himself in a hospital and was informed that this was the Manninshien Hospital at Dusseldorf. After a few days he was removed to the Officer's ward in the Waldershein Hospital at Dusseldorf. Here he received excellent care. A German doctor set his broken jaw very skillfully. After returning to France, Lieutenant Shoemarker was told by our own doctor that the job done on his jaw was a very good one.

About September 10th [?], Lieutenant Shoemaker was sent to Liege, Belgium where he remained until after the Armistice, when he returned to France.

From Notes taken by
W.C. King, 2nd Lieutenant A.s.

Airmen of the 11th Aero Squadron pose in front of their aircraft bearing their insignia of "Mr. Jiggs."

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11th Bombardment Squadron

Report by 2nd Lieutenant Robert N. Groner, Jr.

The second [third] day of the St. Mihiel drive (September 14th) 10 machines left the Aerodrome at Amanty. An early start had been made and all machines were off the ground before 7:00 A.M. Before reaching the lines three machines were forced to turn back, the other seven crossing the lines at Verdun. They were steadily "Archied" all the way to Conflans but saw no hostile machines. Having reached Conflans they dropped their bombs into the railway yards and turned south, for home. They had just commenced their homeward journey when they were attacked by fifteen Fokkers. During the fight that ensued, one Liberty was crashed and shortly after one German plane followed. Lieutenant Groner received a bullet through the leg but continued fighting, his back towards his pilot. Their engine had stopped and [they] were going down in long spirals. The pilot had received nine bullet wounds and was unconscious. The machine was bringing itself down but Lieutenant Groner did not know this and made no move towards the controls but continued firing upwards at the diving Fokker. They spiraled for 8,000 feet and then crashed in a forest.

Lieutenant Groner's next recollection is that of the field at Rezonville where he came to late that afternoon. His pilot did not regain consciousness for five days. The both of them were given very fair medical treatment. There was no suitable food in the hospital but they were given some milk by French women. After several days, Lieutenant Groner was separated from his pilot [and] moved by truck into Jeouf. Here he was placed in a civil prison for three days receiving as rations bread, and coffee with occasional bowl of soup. During his stay he was questioned by an Intelligence Officer who seemed especially anxious about our tanks and artillery. The next move was by train to Karlsruhe where seven days were spent in the hotel. Five days were then spent in the regular prison camp, before being sent to the camp at Landshut. After twenty days at Landshut, Lieutenant Groner was removed to Villingen where he was kept until November 26th when in company with other American prisoners he left for Constance. After three days there the Americans came through Switzerland to Bellegarde, France.

—321—

20th Aero Squadron

Raid Report

Visibility: Good
Objective: Conflans
Route Actually Followed: Bar-le-Duc, Verdun, Conflans, Chambley, Thiaucourt, Amanty
Number of Teams Participating: 10 teams left the field. 8 reached the objective.
Names of Leaders: C. G. Sellers, Lieut. Payne, Leaders

Hour of Departure	Hour of Return	Altitude	Squadron	Date
0645	0845 a.m.	13,000 ft	20th	Sept. 14/18

Number of E.A. Seen: 9 Time: 8:20 a.m.
Number of E.A. Encountered: Time:
Type: Unknown Altitude: 12,000 ft
Region: Conflans, Thiaucourt Combats: None
Number of Rounds Fired: 200 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 18-50 kg Type: 155 m/m Total 900 kilos
Bursts were Observed at:

Remarks on Enemy-Aircraft Artillery: Heavy and inaccurate from Conflans to Thiaucourt.
Remarks on Enemy Airplanes: 9 E.A. seen—a Group of 6 could not catch up, group of 3 did not attack
Other Observations: Considerable activity on lines south of Conflans.

E. A. Parrott
1st Lieut. A.S., U.S.A.
Squadron Operations Officer

—322—

20th Aero Squadron

Raid Report

Visibility: Poor
Objective: Dommary-Baroncourt
Route Actually Followed:
Number of Teams Participating: Lt. C. G. Sellers leading—7 teams started, 3 reached objective.
Names of Leaders:

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11:15 a.m.	12:40 a.m.	13000 ft	20th	Sept. 14/18

Number of E.A. Seen: None Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots Are Entitled to Share in Confirmation:

Number of Bombs Dropped: 12-50 kilos Type: 155 m/m Demol
Total: 600 Kilos
Bursts were Observed at: No bursts were observed due to cloud bank
Remarks on Enemy-Aircraft Artillery: Very light and inaccurate.
Remarks on Enemy Airplanes: None seen.
Other Observations: Chambley seemed deserted.

E. A. Parrott
1st Lieut. A.S., U.S.A.
Squadron Operations Officer

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20th Aero Squadron

Raid Report

Visibility: Very Good
Objective: Gorze
Route Actually Followed: Toul, Nancy, Pont-a-Mousson,. Gorze, Thiaucourt, Amanty
Number of Teams Participating: 10 teams left the field, 8 reached the objective
Names of Leaders: 1st Lt. C. G. Sellers, 1st Lieut. E.A. Parrott, leading.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
15:35	17:00 p.m.	10000ft	20th	Sept. 14/18

Number of E.A. Seen: 3 Time: 16:15 p.m.
Number of E.A. Encountered: 3 Time: 16:20 p.m.
Type: Fokker Biplane Altitude: 10000 ft
Region: Gorze Combats:
Number of Rounds Fired: 500 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Out of Control. E.A.: Allied:
Markings on E.A.:
In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 32-50 Type: 155 m/m Total: 1600 kilos

Bursts were Observed at: On hill immediately to the east of Gorze.
Remarks on Enemy-Aircraft Artillery: Heavy & very accurate.
Remarks on Enemy Airplanes: Few but aggressive.
Other Observations: 1 train of 50 cars north of Arnaville going towards Metz. Single E.A. Biplane 14000 ft near Nancy at 16:05 p.m. Enemy balloon 371.8, 250.8.

E. A. Parrott
1st Lieut. A.S., U.S.A.
Squadron Operations Officer

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96th Aero Squadron

Raid Report

Visibility: Poor, Clouds

Objective: Bomb Conflans

Route Actually Followed: Bar-de-Duc, Fresnes, Conflans, Toul, Amanty.

Number of Teams Participating: 8, 3 reach objective.

Names of Leaders: Lts. D. H. Young, and Lunt

Hour of Departure	Hour of Return	Altitude	Squadron	Date
6:25	8:20	4500 M	96th	9/14/18

Number of E.A. Seen: 20 Time: 7:40

Number of E.A. Encountered: 20 Time: 7:40

Type: Unknown Altitude: 4200 meters

Region: Mars-le-Tour Combats: 1

Number of Rounds Fired: 120 Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 48-90 m/m 9 kilo Type: 90 m/m
2-50 kilo 155 m/m
2-9 kilo Incendiary

Bursts were Observed at: on roundhouse, tracks and buildings south of yards, 2 large fires started.

Remarks on Enemy Aircraft Artillery: Active and accurate at Conflans and vicinity.

Remarks on Enemy Airplanes: about 20 attacked near Mars-la-Tour, but did not get close enough to distinguish type. Followed formation to lines.

Other Observations: 3 trains on tracks going in direction of Dommary-Baroncourt, about 3 kilometers north of Conflans at 7:53 A.M. 2 trains of 100 to 150 cars going South into Mars-la-Tour. One train of 100 cars going south into Chambley 7:40 A.M. About 200 cars in yards at Conflans.

E. E. Evans
1st Lt. A.S., U.S.A.
Squadron Operations Officer

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96th Aero Squadron

Raid Report

Visibility: Near Lines. Poor, Cloudy
Objective: Etain
Route Actually Followed: Bar-le-Duc, Verdun, Etain, Combres, Amanty.
Number of Teams Participating: 8, 6 reached objective
Names of Leaders: Lts. Clayton, and Cawston

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11:00	13:25	45.00 M	96th	9/14/18

Number of E.A. Seen: None Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: 150 Confiormations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Out of Control. E.A.: Allied:
Markings on E.A.:
In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped:		Type:
	48	90 m/m
	12	155 m/m
	8	Incendiary

Bursts were Observed at: All bombs hit in center of town
Remarks on Enemy-Aircraft Artillery: Very slight and inaccurate
Remarks on Enemy Airplanes: None seen
Other Observations: None observed

E. E. Evans
1st Lt. A.S.U.S.A.
Squadron Operations Officer

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96th Aero Squadron

Raid Report

Visibility: Near lines fair
Objective: Vittonville and Arnaville
Route Actually Followed: Toul, Pont-a-Mousson, Toul, Amanty.
Number of Teams Participating: 6, 4 reached the objective
Names of Leaders: Lts. Young, D. H. and Lunt

Hour of Departure	Hour of Return	Altitude	Squadron	Date
13:15	17:15	3600 M	96th	9/14/18

Number of E.A. Seen: None Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: 140 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: 1 Allied:
unknown plane-4.35 southeast of Villecy-sur-Mad
Planes Seen to Have Gone Out of Control. E.A.: Allied:

Markings on E.A.:
In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:
Number of Bombs Dropped: 12-90 m/m Total Wt. 828 kilos
8 155 m/m
12 115 m/m—6 incendiary
Bursts were Observed at: In Vittonville and Arnaville; also several bursts among troops and horses in meadow East of Arnaville.
Remarks on Enemy-Aircraft Artillery: Fairly active and accurate
Remarks on Enemy Airplanes: None seen
Other Observations: One wagon train of six standing outside of Arnaville, wagon train of 15 going East between Bayonville and Arnaville. One 30 car train going East at Arnaville.

E. E. Evans
1st Lt. A.S.U.S.A.
Squadron Operations Officer

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Day Bombardment Group
September 14th, 1918

Summary of Operations

First Mission—left at 6:45 and returned at 8:25. Conflans was bombed by:

96th Squadron

Pilots:	Planes:	Observers:
Flight leader:		
Lt. D. H. Young	12	Lt. S. M. Lunt
Lt. B. F. Beverly	15	Lt. F. J. Newbury
Lt. C. P. Anderson	14	Lt. H. S. Thompson
Lt. C. P. Young	20	Lt. R. Anspach
Lt. H. Forshay	8	Lt. P. J. O'Donnell
Lt. P. E. Lakin	18	Lt. C. Douglass
Lt. N. C. Rogers	6	Lt. K. P. Strawn
Lt. W. B. Ten Eyck	7	Lt. J. H. Smith
Lt. B. C. Hopper	5	Lt. J. H. Kelly
Lt. R. C. Taylor	4	Lt N. A. Stuart

Planes number 12, 5 and 14 successively bombed the station, buildings and trucks at Conflans. All other planes returned to airdrome before reaching objective due to motor trouble.

20th Squadron:

Pilots:	Planes:	Observers:
Flight leader:		
Lt. Sellers	486	Lt. Payne
Lt. Howard	584	Lt. Parrott
Lt. Edwards	408	Lt. Endler
Lt. Mandell	445	Lt. Fiske
Lt. Potter	768	Lt. Shultz
Lt. Wiser	440	Lt. Christian
Lt. Baker	502	Lt. Goodall
Lt. Seaver	465	Lt. Stokes
Lt. Koepfgen	785	Lt. Willis
Lt. West	448	Lt. Frank

8 Planes bombed Conflans, cutting tracks at eastern end of railroad yards, and station.

11th Squadron

Pilots:	Planes:	Observers:
Flight leader: Lt. Tyler	764	Lt. Strauch
Lt.Gatton	507	Lt. Bird
Lt. Ring	238	Lt. Greene
Lt. Oatis	317	Lt. Guthrie
Lt. Comegys	521	Lt. Carter
Lt. Harter	334	Lt. Stephenson
Lt. Biggs	786	Lt. Greer

Conflans was also bombed by the 11th Squadron.

Second Mission—left at 11:00 and returned at 12:40

96th Squadron

Pilots:	Planes:	Observers:
Flight Leader: Lt. Beverly	15	Lt. Newberry
Lt. Gaylord	14	Lt. Cawston
Lt. C. P. Young	20	Lt. Anspach
Lt. Taylor	4	Lt. Stuart
Lt. Baker	5	Lt. Milner
Lt. Lakin		Lt. Douglass
Lt. Rogers	7	Lt. Strawn
Lt.Codman	12	Lt. Pressler
Lt. Forshay	8	Lt. O'Donnell
Lt. Bates		Lt. Hexter

Planes number 12, 20, 4 and 14 reached and bombed Vittonville and Arnaville.

20th Squadron (Third Mission)

Piloits:	Planes:	Observers:
Flight leader: Lt. Sellers	486	Lt. Payne
Lt. Edwards	408	Lt. Endler
Lt. Leach	448	Lt. Wilmer

Pilots:	Planes:	Observers:
Lt. Howard	584	Lt.
Lt. Mandell	445	Lt. Fiske
Lt. Seaver	502	Lt. Stokes
Lt. Tucker	704	Lt. Faulk
Lt. Wadsworth	544	Lt. Richardson
Lt. Koepfgen	440	Lt. Willis

Bombed troops and horses near Vittonville, big fires were seen at 16:30.

11th Squadron (Second Mission)

Pilots:	Planes:	Observers:
Flight leader:		
Lt. Tyler	764	Lt. Strauch
Lt. Gatton	507	Lt. Bird
Lt. Ring	236	Lt. Greene
Lt. Oatis	317	Lt. Guthrie
Lt.Comegys	521	Lt. Carter
Lt. Harter	334	Lt. Stephenson
Lt. Garlough	786	Lt. Payton
Lt. Maloon	529	Lt. Springer

Bombed and reached Vittonville and Arnaville.

Third Mission—left at 3:15 and returned to airdrome at 14:25

Pilots:	Planes:	Observers:
Flight leader:		
Lt. D. H. Young	12	Lt. Lunt
Lt. L. F. Turnbull	20	Lt. S. A. McDowell
Lt. W. B. Ten Eyck	4	Lt. J. H. Smith
Lt. B. C. Hopper	14	Lt. J. H. Kelly

Bombed wagon troop trains and horses seen along the roads.

11th Squadron

Pilots:	Planes:	Observers:
Flight leader:		
Lt. Chapin	367	Lt. Laird
Lt. Gatton	507	Lt. Bird
Lt. Munn	243	Lt. Ward
Lt. Porter	521	Lt. Patton
Lt. Slauson	252	Lt. Yates
Lt. Ring	233	Lt. Greene
Lt. Pearson	529	Lt. Perry
Lt. Biggs	334	Lt. Greer
Lt. Osmun	736	Lt. Edwards
Lt. Brewster	619	Lt. Jones

Returned without crossing line and dropping bombs.

20th Squadron (Second Mission)

Pilots:	Planes:	Observers:
Flight leader:		
Lt. Sellers		Lt. Payne
Lt. Howard		Lt. Parrott
Lt. Edwards		Lt. Endler
Lt. Mandell		Lt. Fiske
Lt. Leach		Lt. Wilmer
Lt. Mathews		Lt. Taylor
Lt. Stephen		Lt. Louis
Lt. Wadsworth		Lt. Richardson
Lt. Townes		Lt. Bunkley
Lt. Tucker		Lt. Faulk

Reached and bombed objectives. Wagon troop trains, and horses seen along the roads, in second raid just above the 20th reached and bombed Vittonville and Arnaville.

Visibility:

Fair in morning, very poor on account of clouds at noon and fair in afternoon.

Results:

Conflans tracks cut at eastern end of yards, one burst on roundhouse, one on station, numerous bursts on nearby buildings and southern portion of tracks in front of station. (96th, 20th and 11th.)

Dommary-Baroncourt, unobserved because of clouds (20th)
Etain. All bursts in center of town (96th)
Vittonville, 4 bursts in town (96th)
Arnaville, 6 bursts on six troop wagon trains and a corral of horses at Arnaville (96th)
Gorze, bursts in town and to the east (20th)
On these places there were a total of 6762 kilograms of bombs dropped during the day.

Railroad Movements:
1-60 car train entering Conflans from Briey at 8:10 (11th)
2-50 car train going north into Briey 8:10 (20th)
2-50 car train going north at Abbeville and Gondrecourt at 8:10 (20th).
1-50 car train going east at Joinville 8:10 (20th)
1-25 car train going north out of Mars-la-Tour 8:15 (11th)
2-100 car train going south into Mars-la-Tour 7:40 (96th)
2-100 car train going south into Chambley 7:40 (96th)
1-50 car train going north between Arnaville and Metz, at 16:10 (20th).
1-30 car train going east at Onville at 16:25 (96th).
1-30 car train standing on railroad bridge at Ars at 16:30 (96th).
About 250 cars in yards at Conflans at 7:35 (96th)
About 50 cars in yards at Chambley 16:30 (20th).

Hostile Airdromes: Nil

Anti Aircraft:
No activity at Mars-la-Tour, Puxieux and Batilly at 7:40 (96th)
Active and accurate near Conflans 7:30 (96th) One anti-aircraft active at 366.8-347.0, 12:00. 3 anti-aircraft active at 3711-2461.

Enemy Aircraft:
2 enemy aircraft attacked 3 planes of the 96th formation at 7:50 between Mars-la-Tour and Puxieux. They were not aggressive. 18 E.A. in rear. 7 E.A. attacked flight of the 11th between Conflans and Puxieux at 8:00. One E.A. shot down at Mars-la-Tour. One plane of the 11th missing. 4 biplane Fokkers attacked flight of the 20th between Pont-a-Mousson and Gorze at 16:10 without results. E.A. had red noses, white tails and pennant shaped red triangle behind cockpit.

Miscellaneous:
Large fire on tracks near Villecey-sur-Mad 8:00 (96th)
One enemy balloon in ascension just southeast of Chambley (20th).
One enemy balloon in ascension at 2718-2508. Large fire seen at Vittonville 16:30 (96th)
At 16:35 an unknown plane fell in flames crashing southeast of Villecey-sur-Mad. Witnessed by Lt. S. M. Lunt, (96th).

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Headquarters, First Pursuit Wing
Air Service, American E.F.
September 14th, 1918

Operations Report Number 14.

From 17 h 00 Sept. 13th to 17 h 00 Sept. 14th.

1. Atmospheric conditions: Excellent all day.

2. Enemy Air Service: Some patrols of Fokkers operating 4 or 5 kilometers in rear of the enemy's retreating lines attempted to interfere with our Army Corps Planes in their photography of the Hindenburg Line. Fokkers with red wings as far back as the cock pit and with the rest of the body white: Fokkers of dark color with red noses, white tails and a stripe running diagonally from the rear of the cock pit across the fuselage. Still other Fokkers painted black with a broad white band around the fuselage in front of the stabilizer; and others with violet bodies and white rudders were encountered during the day. In almost every case these E.A. were operating in patrols varying from 7 to 10 in size and at low altitudes from 1000 meters to 3000 meters.

Enemy activity was great in the morning before 9 h 00 and 15 h 00 in the afternoon.

Our pursuit pilots have requested confirmation of 17 E.A. brought down and our Day Bombardment Missions have requested confirmation of 2 E.A. brought down.

3. Activity of Our Pursuit Aviation: The 2nd and 3rd Pursuit Groups and G. C. 16 all engaged in the barrage of the sector, taking part in 33 combats.

The following pilots are missing:

From the 2nd Pursuit Group: Lts. Converse, Drew, Freeman, Brody, Kull and Hassinger.

From the 3rd Pursuit Group: Lts. Stevenson, Jones and Seidler.

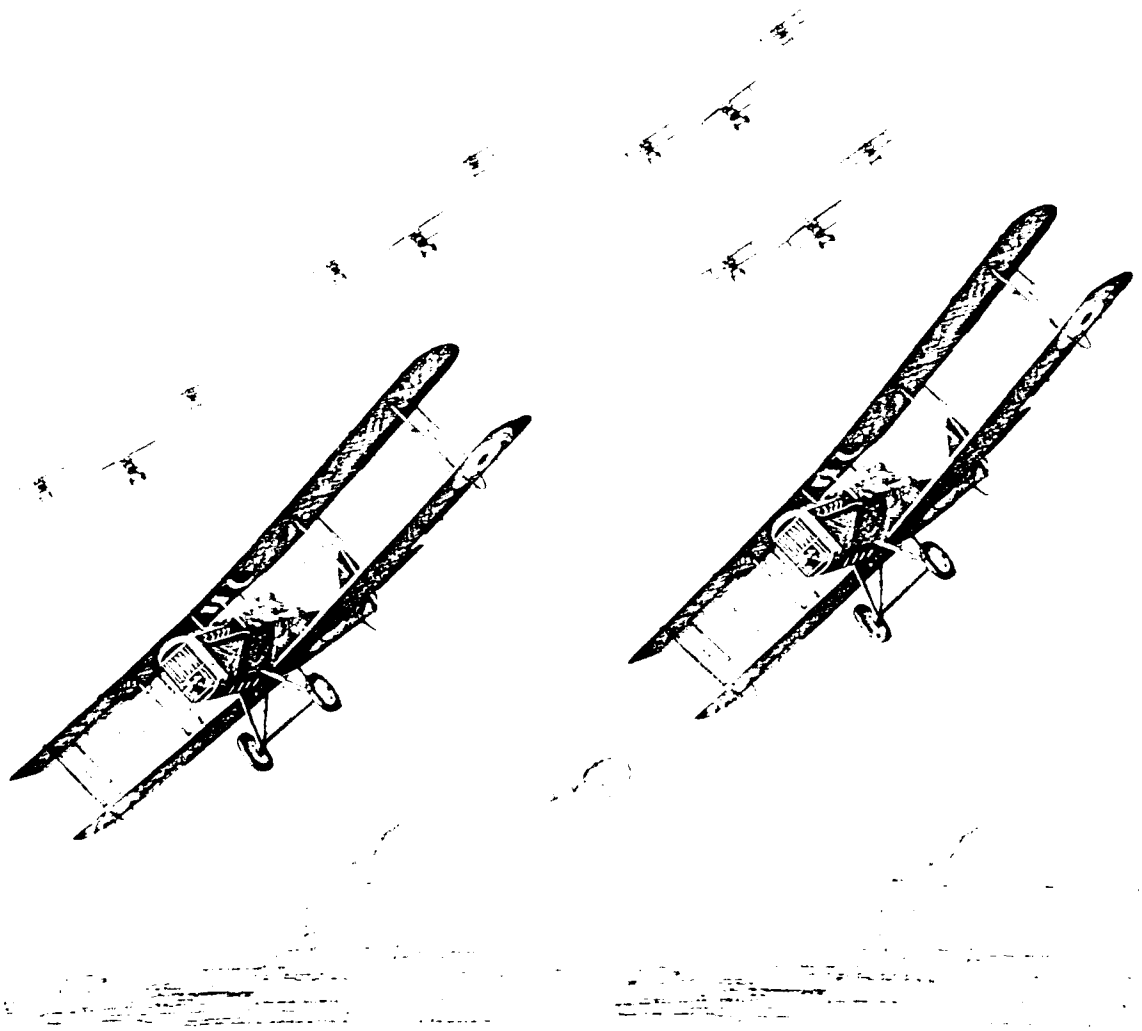
From G. C. 16: Lt. LeRoy and Sergeant Loriet.

Lt. Greenhalgh reported missing from the 3rd Pursuit Group yesterday has since returned.

4. Activity of our Bombing Aviation:4058 kilos of bombs were dropped in 9 bombing raids of Conflans, Dommary-Baroncourt, Etain, Gorze and Vittonville.

The 11th Aero Squadron returning from a bombing raid on Conflans was attacked by a formation of Fokkers and 2 of its planes (DH4's) have not returned. It is believed that one of these planes succeeded in reaching our side of the lines.

The Officers missing are: Lts. Schiedler and Schoemaker, pilots and Lts. Fayre and Ironer, Observer.



DH-4 aircraft.

Summary

	1st Day Bombdmt Group	G.C. 16	2nd Pursuit Group	3rd Pursuit Group	Total Pursuit
Sorties	77	54	105	123	282
Trials	0	0	13	15	28
Combats	2	7	11	15	33
Pilots on rolls	60	64	84	86	234
Pilots Available	38	64	75	80	199
Observers on rolls	61	—	—	—	—
Observers Available	41	—	—	—	—
Pilots missing	2	2	6	3	11
Observers missing	2	—	—	—	—
Confirmations requested	2	0	8	9	17
Total Planes	52	75	92	96	263
Available Planes	29	50	44	41	135
Planes Crashed	0	0	1	0	1
Planes lost in enemy's lines	1	2	1	0	3
Planes not returned	1	2	6	3	11
Total Flying Hours	74:33	92:45	188:13	127:35	408:33
Total Service Hours	74:33	92:45	182:38	124:15	399:30
Alerts	0	0	1	0	1
Patrols	0	10	10	5	25
Protection Patrols	0	0	2	2	4
Plates Taken, successful	4	—	—	—	—
Plates—unsuccessful	2	—	—	—	—
Special Missions	3	0	0	5	5
Bombing Raids	9	—	—	—	—
Bombs dropped	8-10 kilo by Pursuit. 96-8 kilo, 64-50 kilo, by the Day Bombardment Group. Total—4058 kilos.				

By order of Lieutenant Colonel Atkinson.

Philip J. Roosevelt
Captain, Air Service, U. S. A.
Operations Officer

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Headquarters Ninth Aero Service Squadron

Operations Report for September 14th, 1918.

Atmospheric Conditions
Night—Clouds and High winds
Day—Good
1. Reconnaissance.
1 Night—Toul—Pont-a-Mousson—Corny—Waville—Chambley—Essey. Visibility too poor for observation.
1 Day—St. Mihiel—Thiaucourt—Pont-a-Mousson, acquainting new pilots with sector.
2. Miscellaneous.
Planes—1 D. H. Liberty awaiting night equipment.
2 Breguets awaiting night equipment.
1 Breguet in reserve.
6 Breguets awaiting minor repairs.
3. Observation. Reported by B.I.O.
4. Summary.
Night sorties—1 Reconnaissance, 1—Attempt.
Day Sorties—9 (1 Reconnaissance, 8 Practice).
Service Hours—2 Hrs.
Total Hours—10 Hrs.
20 planes on hand, (19 Breguets, 1 D. H. Liberty), 10 available for duty.
10 pilots for duty.
7 Observers for duty.

Harold W. Merrill
1st Lt., 103/F.A.
Operations Officer

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Headquarters—24th Aero Squadron
First Army Observation Group

Operations Report for September 14th, 1918.

Atmospheric conditions: Visibility good throughout day. Cloudy between 10:00-14:00 o'clock.
1 Reconnaissance. Thiaucourt—Labeuville—Bianville—Dugny.

15:15-17:55. Altitude 300 M. Visibility fair. Observer Lt. Cousins: Pilot Lt. Hill.

2. Photographic. Nil.

3. Miscellaneous. 12 Salmson 2A2 planes being equipped and repaired. 1 Salmson returned from forced landing at Dugny.

4. Summary.

16 sorties.
1 visual reconnaissance.
3 protective flights.
1 special mission.
11 test flights.
Service hours—8 hrs 25 min.
Total hours—19 hrs 25 min.
22 planes (Salmson 2A2) on hand—10 available.
18 pilots—18 available. 13 observers—13 available.

John W. Cousins
1st Lt. Inf.
Operations Officer

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Headquarters 91st Aero Squadron

Operations Report for September 14, 1918.

Atmospheric conditions: Visibility good throughout the day. Cloudy between 10:00 and 14:00 o'clock.

1. Reconnaissance.

a. Vigneulles—Harville—Conflans—Metz—Mardigny. 17:15-18:50. Alt. 2500 m. Vis. Fair. Obs. Capt Wallis: Pilot, Lt Strahm. See Sec. 5 "Observation."

b. Harville—Mars-la-Tour—Metz—Dornot—Arnaville, 7:20-9:20. Alt. 5000 m. Vis. good. Obs. Lt. Schricker: Pilot, Lt. Powell. See "5".

c. Fresnes—Mars-la-Tour—Chambley—Arnaville—E of River to Pont-a-Mousson. 9:50-11:50. Alt. 4200 m. Vis. fair. Obs. Lt. Martin: Pilot, Lt. Coles. See Sec. 5.

d. Pont-a-Mousson—Metz—Pont-a-Mousson—Thiaucourt—Mars-la-Tour—Gorze—Pont-a-Mousson. 9:55-11:55. Alt. 2500 m. Vis. fair. Obs. Lt Jervey: Pilot, Lt Kelty. See Sec. 5.

e. Vigneulles—Mars-la-Tour—Ars-sur-Moselle—Cheminot. 11:20-13:30. Alt. 5300 m. Vis. fair. Obs. Capt. Wallis: Pilot, Lt Strahm. See 5.

2. Photographic.
a. Etain—Mars-la-Tour—Chambley—Thiaucourt. 14:20-16:20. Alt. 4000 m. Obs Lt. Lowry: Pilot, Lt. Kelty. 33 exp.
b. Vigneulles—Fresnes—Etain—Warcq—Labeuville—Xonville—Chambley—Gorze—Pagny—Pont-a-Mousson. 9:45-12:45. Alt. 42 [4200?] M. Vis. Fair. Obs. Lt Badham: Pilot, Lt. Kenney. 2 exp.
c. Chambley—Mars-la-Tour—Conflans—Ars—Pagny. 9:50-12:00 Alt. 4000 M.Vis. Fair. Obs. Lt. Hammond: Pilot, Lt. Diekama. 20 exp.
d. Moselle river to Metz. 9:55-11:55. Alt 4200 m. Vis. good. Obs. Lt. Lawson: Pilot, Lt Cook. 35 exp.
3. Adjustment of Artillery Fire. Nil.
4. Miscellaneous.
Plane (Salmson 2A2) No 9 wing being repaired.
10 being repaired.
14 control wires being changed.
5. Observations. Reported by B.I.O.
6. Summary
22 sorties
5 visual reconnaissance.
1 att. visual reconnaissance.
4 photo reconnaissance.
7 protective flights
3 test flights
Service hrs. 33:20
Total time 38:20
22 planes: on hand: 19 available.
15 Pilots: 14 available.
13 observers: 12 available

John H. Snyder, 2nd Lt. CARC
Operations Officer

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1st Aero Squadron
September 14, 1918

Summary of Operations

Reconnaissance. Xammes, Thiaucourt, Norroy, Rembercourt. 6:20-8:10. Altitude 1000 meters. Visibility good. Pilot Lieut. Richardson, Observer Lieut. Duckstein. Two planes from First Aero Squadron furnished protection.

Photography. One attempted photo mission by Pilot Lieut. DeCastro and Observer Lieut. Easterbrook but failed on account of motor trouble.

Photography. Xammes, St. Julien,Villecey, Bois de Grande Fontaine. 10:20-12:40. Altitude 3000. Visibility cloudy. Pilot Lieut. Michener, Observer Lieut. D'Amour. 48 Photos taken all of which were good. Some cloudy. Two planes from First Aero Squadron and eight planes from 2nd Pursuit Group furnished protection.

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12th Aero Squadror
September 14th, 191[illegible]

Summary of Operations

Reconnaissance: Thiaucourt—Rembercourt—Norroy. 16:25-18:30. Alt 400 M. Vis Fair. Pilot Lt. Morris, Observer Lt. Styles. 2 planes furnished for protection.

Adjustment of Artillery Fire: Norroy—Thiaucourt. 8:40-10:55. Alt. 1000 M. Vis Fair. Pilot Lt. Paradise, Observer Lt. Wright. 2 planes furnished as protection. Lt. Orr and Lt. Goodale while returning from this mission struck the balloon cable near Mamey and crashed to the ground. Both pilot and observer were killed.

2 Ferry flights.

1 Flight for protection for 1st Aero Squadron.

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50th Aero Squadror

Operations Report

September 14, 1918. 17:00 hr.-17:00 hr.

Atmospheric Conditions—Visibility: Good.

Reconnaissance.

1. Pont-a-Mousson, Pagny, Preny. 15:42-17:40. Alt. 800 M. Vis. Good. Pilot Lt. Goettler, Observer Lt. Brill. See intelligence report.

2. Pont-a-Mousson. 18:20-19:15. Alt. 1600 M. Vis. Poor. Pilot Lt Pickrell, Observer Lt. George. See intelligence report.

3 Norroy, Pagny, Thiaucourt,. Rembercourt. 5:55-7:40. Alt.

1500 M. Vis. Fair. Pilot Lt. Phillips, Observer Lt. French. See intelligence report.

4. Vieville, Norroy River, Pagny. 8:10-9:25. Alt. 1000 M. Vis. Good. Pilot Lt. Graham, Observer Lt. Lockwood. See intelligence report.

5. Pont-a-Mousson, Eply, Louvigny. 3:45 forced landing at 5:25. Alt. 300 M. Vis. Fair. Pilot Lt. Fitzsimmons, Observer Lt. Sain. See intelligence report.

6. Pont-a-Mousson, Eply. 8:25-10:20. Alt. 1000 M. Vis. Fair. Pilot Lt. Bud, Observer Lt. Bleckley. See intelligence report.

7. Pont-a-Mousson, Pagny, Villecey. 10:10-12:25. Alt. 1500 M. Vis. Good. Pilot Lt. Goettler, Observer Lt. Brill. See intelligence report.

8. Pont-a-Mousson, Eply, Cheminot. 12:07 13:30. Alt. 1300 M. Vis. Good. Pilot Lt. Hardin, Observer Lt. Dovre. See intelligence report.

9. Mardigny, Sillegny, Louvigny. 15:15-16:55. Alt. 1900 M. Vis. Good. Pilot Lt. Phillips, Observer Lt. George. See intelligence report.

Adjustments of Artillery Fire.

1. Pont-a-Mousson, Arnaville, River, Bois Grand Fontaux. 13:05-11:40. Alt. 1500 M. Vis. Good. Pilot Lt. Frayne, Observer Lt. Darrin. intelligence report. (Mission unsuccessful on account of Battalions not answering wireless.)

Infantry Contact Patrols.

1. Field. 16:40-16:55. Pilot Lt. Graham, Observer Lt. Dovre. Motor trouble.

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Office of the Chief of Air Service
Headquarters First Army Corps
American Expeditionary Forces
15 Sept. 1918

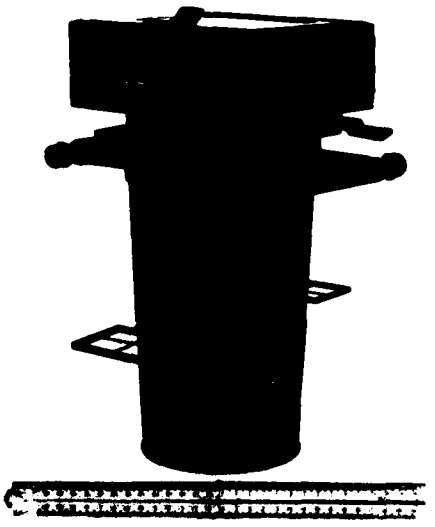
Summary for Operations for the day of 14 Sept. 1918. No. 5

Atmospheric Conditions: Favorable—Visibility good throughout the day.

A. Aviation.

I. Reconnaissances: 13 reconnaissances of Corps Sector carried out.

II. Infantry Contact Patrols: 1 Infantry contact patrol was carried out. For 90th Division—1 unsuccessful due to fact that panels were not displayed by the infantry. 1 attempted infantry contact patrol for 90th



An English type hand-held camera.

Division failed owing to motor trouble.

III. Photography: 3 missions. 2 attempted missions. 130 exposures (vertical) taken over enemy lines, 56 of which were good.

IV. Adjustment of Artillery Fire: 13 Artillery surveillance missions were carried out. 1 unsuccessful adjustment.

Observer Lt. Goodale and Pilot Lt. Orr, 12th Aero Squadron, while returning from an artillery surveillance mission struck the cable of our balloon near Mamey and crashed to the ground. Both pilot and observer were killed.

V. Miscellaneous:

14 flights for protection (1).
11 flights for protection (12).
2 ferry flights (12).
2 flights for testing purposes (214).

VI. Summary:

1st Aero Squadron:

23 Sorties: 4 reconnaissances; 3 photography missions; 2 attempted photography missions; 14 flights for protection.
23 Salmsons on hand—15 available for duty.
20 Pilots carried on rolls—18 available for duty.
18 Observers carried on rolls—12 available for duty.
Total time 36 hrs. 20 min. Service time 31 hrs. 00 min.

12th Aero Squadron:

17 Sorties: 3 reconnaissances; 11 flights for protection; 2 ferry flights; 1 artillery surveillance.
20 Salmsons on hand—18 available for duty.
19 Pilots carried on rolls—17 available for duty.
26 Observers carried on rolls—14 available for duty.
Total time 24 hrs. 20 min. Service time 23 hrs. 50 min.

50th Aero Squadron:

13 Sorties: 9 reconnaissances; 1 infantry contact patrol; 1 attempted infantry contact patrol; 1 artillery surveillance mission; 1 attempted adjustment.
14 D.H. on hand—5 available for duty.
16 Pilots carried on rolls—14 available for duty.
12 Observers carried on rolls—10 available for duty.
Total time 17 hrs. 30 min. Service time 17 hrs. 15 min.

208th Aero Squadron:

5 Sorties: 5 artillery surveillance missions.
10 Breguets on hand—7 available for duty.
8 Observers carried on rolls—7 available for duty.
10 Pilots carried on rolls—9 available for duty.
Total time 9 hrs. 30 min. Service time 9 hrs. 30 min.

214th Aero Squadron:

8 Sorties: 6 artillery surveillance missions; 2 test flights.
10 Breguets on hand—available for duty.
7 Observers carried on rolls—6 available for duty.
10 Machine gunners carried on rolls—1 available for duty.
Total time 14 hrs. 45 min. Service time 13 hrs. 45 min.

B. Aerostation:
13 daylight ascensions: 1 night ascension

1st Balloon Co.	14:00-18:30	4 hrs. 30 min.
2nd Balloon Co.	9:20-11:10	1 hr. 50 min.
	14:05-19:00	4 hrs. 55 min.
	19:33- 6:40	11 hrs. 15 min.
5th Balloon Co.	5:35- 9:20	3 hrs. 35 min.
	16:40-19:00	2 hrs. 20 min.

42nd Balloon Co.	7:26- 9:22	1 hr. 56 min.
	10:15-10:47	0 hrs. 32 min.
	11:34-11:44	0 hrs. 10 min.
	12:10-12:20	0 hrs. 10 min.
	11:47-11:51	0 hrs. 04 min.
	12:46-13:40	0 hrs. 54 min.
	13:53-19:00	5 hrs. 07 min.

Total time in air 37 hrs. 18 min.
Artillery adjustments: 8. Rounds fired: 17. Observed: 13
Balloon 5 shot down by an enemy plane at 9:10. The observers, Lts. Smith and Fox jumped with parachutes and descended safely.

By order of Major M. A. Hall C.A.S. 1st A.C.

Paul D. Meyers
2nd Lieut. C.A.C.
Operations Officer

99th Aero Squadron
September 16, 1918

Missions Carried Out

Pilot	Observer	Missions	Time Out	Time In	Total Time	Visibility
Eaton	Case	Courier	9:55 AM	10:30 AM	35	Good
McElroy	Kinnie	Reconnaissance	6:00 AM	7:53 AM	113	Good
Kahle	Hill	Photographic	9:50 AM	11:30 AM	100	Clouds
Edwards	Hayes-Davis	Protection	10:00 AM	11:20 AM	80	Clouds
Wickersham	Spencer	Protection	9:50 AM	11:50 AM	120	Clouds
Markham	Neel	Photographic	12:00 AM	2:10 PM	130	Good
Cadbury	Reilly	Protection	12:00 AM	2:10 PM	130	Good
Blumenthal	MacLachlan	Reconnaissance	1:50 PM	3:10 PM	80	Good
Castleman	Case	Reconnaissance	2:05 PM	3:10 PM	55	Good
McMurtry	Gaither	Reconnaissance	4:20 PM	5:00 PM	40	Good
Clark	Read	Protection	11:00 PM	11:45 PM	45	Good
Clark	Read	Protection	11:55 PM	12:55 PM	60	Good
			TOTAL		16:20	

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104th Aero Squadron
September 14, 1918

Summary of Reports

Reconnaissance mission, Lt. Reynolds, pilot, and Lt. Polley, observer. Located convoys of enemy troops; train movements; enemy batteries and hostile balloons. These officers were involved in a combat with four enemy planes and six other Allied planes. Result of combat unknown. Met considerable anti-aircraft fire. Motor trouble caused this plane to land at Dommartin on a German battery position just recently evacuated; landing O.K.; trouble corrected and plane returned to station. Lt. Clark, pilot, and Lt. Gilchrist, observer, made a recon-reconnaissance of Woel, Bois-de-Handeville[?], Lake Lachaussee, and St. Benoit. Sighted German planes, enemy balloons, and burning villages. One enemy plane at Puxieux, anti-aircraft battery at Lachaussee. Lt. Weeks, pilot, and Lt. Lawrence, observer, furnished protection to photographic plane of 99th Squadron. Lt. Jacobi, pilot, and Lt. Spell, observer, on special courier mission, made bad landing and crashed on French aviation field at Bar-le-Duc. 2nd Lt. Carl J. Oetzel and 1st Lt. Thomas W. Pond, A.S., USA, reported to squadron as observers. Total flying time for day: five hours twenty-five minutes. Lieuts. Houck,. Wallace, Weeks, after replacing propellers on planes at Amanty, arrived at this station. Cpl. A.C. Johnson, who was flying as passenger with Lt. Johnston from Luxeuil to Souilly, and previously reported "missing," is now known to have been recaptured from the enemy and lies wounded in a French hospital. No definite knowledge concerning Lt. Johnston, pilot.

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Headquarters Air Service
Fifth Army Corps
American Expeditionary Forces

Operations Report No. 39, 19:00 Sept. 13 to 19:00 Sept. 14, 1918

1. Atmospheric Conditions: Clear. Scattered clouds. Moderate winds. Visibility excellent. Slight ground haze in late afternoon.
2. Aviation:
   (a) Reconnaissance:
   1. During the day 17 missions were dispatched for reconnaissance and surveillance of the Corps sector. The entire sector

was under constant aerial surveillance from day break to sundown. Valuable information was gained as these missions penetrated the front to a depth of six to ten kilometers. This information was reported by wireless and confirmed by dropped messages at the P.C.'s of Army Corps and Divisions.

(b) Photography:

1. During the day the two photographic missions with a total of nine planes were dispatched. At ten o'clock a photographic mission of the corps area from Harville to Lachaussee was undertaken by Observer Lt. Hill and Pilot Lt. Kahle of the 99th Aero Squadron. This plane was attacked by from three to five enemy planes over Lachaussee and in the combat Lt. Hill was killed, a bullet piercing his heart. Lt. Kahle succeeded in bringing the plane back to the field. Although the photo magazine was badly damaged by gun fire thirteen good photos were obtained. A protection plane for this mission, Pilot Lt. Edwards, Observer Lt. Davis, was also attacked and was forced to land. Plane was slightly damaged by machine gun fire. Pilot and Observer were uninjured.

2. A second photographic mission, Pilot Lt. Markam and Observer Lt. Neel of the 99th Aero Squadron, took off at twelve o'clock and photographed the region immediately in advance of the Corps area. This mission was protected by a formation of four Salmson planes. They were attacked by two different enemy patrols during which a general defensive fight occurred. Lt. Neel fired three hundred rounds at a Fokker tri-plane scout and believes he succeeded in shooting it down. This happened at 13:00 o'clock over Chambley and confirmation is requested. Protection plane from the 88th Aero Squadron, Pilot Captain Littauer and Observer Lt. Boyd, was also attacked. The Observer was seriously wounded in foot and elbow and plane was forced to land within our own lines. Seventeen good photographs were taken.

(c) Adjustments: Nil.

(d) Infantry Contact: During the day's operation a plane of each division squadron was kept in alert for Infantry contact command. At eight o'clock the 15th French Division demanded their front line position. A mission by the 42nd French reported the line as St. Hilaire, Wadronville-en-Woevre, Saulx and on road at point 1750. No other adjustments were demanded during the day.

(e) Miscellaneous:

The 88th Aero Squadron under command of Capt. K.P. Littauer moved this date to Pretz-en-Argonne.

The 42nd French Squadron arrived in evening of Sept. 13th with station of Souilly Field.

During the day two planes were dispatched for courier service dropping messages and fresh photographs at P.C.'s of Army Corps and Divisions.

An attempted Artillery adjustment with P.C. Scott (Corps Artillery) by a plane of the 99th Aero Squadron failed on account of Artillery P.C. failing to answer wireless calls of the plane.

(f) General Impression of the Day: Marked increase in enemy aerial activity.

By order of Major Christie

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Headquarters Commander Army Balloons
First Army
September 14, 1918

Supplementary Daily Report Operations, Balloons First Army, September 13th and 14th, Noon to Noon

Balloon Wing First Army Corps

Ascensions:

2nd Co.

17:35-19:05. Obs Lt Dungan. Alt 700 M. Vis 18 Kilos.
9:20-11:00. Obs Lt Dungan. Alt. 700 M. Vis 15 Kilos.

5th Co.

16:05-17:30. Obs Lt Furber and Lt Bowers. Alt 500 M. Vis poor.
23:15-5:20. Obs Lt Lane and Sgt Cain. Alt 300 M. Vis poor.
5:35-9:10. Obs Lt Smith, Lt. Fox. Alt 1000 M. Vis 15 Kilos.

42nd Co.

13:25-14:15. Obs Lt Felt. Alt 300 M. Vis very poor.
7:26-9:22. Obs Lt Felt. Alt 600 M. Vis 10 Kilos.
10:15-10:47. Obs Lt Felt. Alt 600 M. Vis 12 Kilos.
11:34-11:44. Obs Lt Felt. Alt 600 M. Vis 12 Kilos.
11:47-11:51. Obs Lt Felt. Alt. 100 M. Vis 12 Kilos.

1st Co. No report received to time of report.

Observations:

1. Enemy infantry. Nil.
2. Enemy Artillery:

16:22. A.A.A. activity at Onville (B-5).
16:45. Shells midway between Norroy and Pont-a-Mousson (B-5).
17:37. Shells in Vieville-en-Haye (B-2)
18:26. Battery at 370.85-243.95 Firing on Vieville-en-Haye (B-2)
1:12. Continual shell fire on Pont-a-Mousson (B-5).
2:10. Increase in shell fire on Pont-a-Mousson and in direction of St. Jure (B-5)

3:11. High explosive shells landing in Pont-a-Mousson (B-5)
3:30. Artillery action very much more quiet (B-5).
5:47. Large calibre shells falling on Pont-a-Mousson (B-5).
6:00. Enemy shell fire in Bois de Ponce (B-5).
6:27. Heavy shelling in town of Cheminot (B-5).
7:35. Medium calibre gun firing from 374.100-245.950 Seen again at 8:02 (B-5).
7:40. Two Medium Calibre guns firing from 372.250-249.550 (B-5)
10:44. Shells near road running S.E. from Fey-en-Haye (B-2).
10:47. Battery in action in quarry at 375.300-248.000 (B-2).

3. Enemy Aeronautic Service:

17:10. Plane, identity unknown, descending near canal 376.243 Pagny-sur-Moselle (B-5).
15:34. Goin in ascension (B-5).
17:20. Biplane brought down east of Bezaumont, probably allied (B-5).
17:20. French plane No. 19, Spad 94, landed near Ville-au-Val. Plane damaged. Pilot unhurt (B-42)
17:25. Allied plane shot down by Fokker north of Ville-au-Val (B-42).
5:45. Enemy plane 4 Kilo east of balloon (B-5).
7:30. Goin Balloon in ascension (B-42).
8:05. Marieulles Balloon in ascension (B-42).
9:08. Four enemy planes approaching balloon (D.C.A.)
9:10. Balloon attacked and burned by enemy avion. Observers jumped and landed safely.
7:52. Enemy balloon seen on ground at 381.540-245.420 (B-5).
9:25. Enemy balloon in line over Waville (B-2).
9:30. Enemy balloon in line over Marieulles (B-2).
9:35. Balloon in line over Waville descended at 70.55-50.50 (B-2).

4. Circulation, Roads, Railroads.

6:35. One train east, one train west. Metz-Courcelles road 3K. East of Courcelles (B-5).
5:58. Train from Metz to Pournoy la Chetive (B-5).
7:00. Train Metz-Courcelles road southeast through Jury (B-5).
7:31. Train Metz-Courcelles road just leaving Metz (B-5).
7:54. Train Metz-Courcelles road southeast into Jury (B-5).
7:58. Train leaving Sez [?] direction of Metz (B-5).
10:13. Traffic intermittently between Les Gros Pois and St. Louis farm which is a center of traffic (B-2).
10:20. Train of about 20 cars running southwest from Rezonville to Flavigny (B-2).
10:25. Trucks on road running southwest from Farm-de-la-Grange-en-Haye (B-2)

5. Destruction, Explosions, Fires:
16:11 Large fire in Dampvitoux (B-5).
16:17. Large fire Back of Dampvitoux (B-5).
16:25. Large shells in Dampvitoux (B-5).
16:21. Numerous large fires N.E. Dampvitoux (B-5).
17:00. Shells in Bois Cheneaux at 73.0-40.6 (B-5).
17:01. Shells in Bois le Cote S.E. Vittonville (B-5).
17:38. Heavy smoke in Haumont, Dommartin, Dampvitoux and Charey (B-2)
18:00. Heavy explosions along Pont-a-Mousson-Metz road at La Vitree (B-2)
18:00. Shelling Chambley (B-2).
18:12. Fires and explosions at Dommartin and Dampvitoux (B-2).
18:45. Shelling road between Vilcey-sur-Trey and Villers-sous-Preny (B-2).
23:23. Large fire in direction of Jaulny. Large fire direction Charey (B-5).
23:25. Large fire direction of Apremont (B-5).
23:50. Fire in direction of Raucourt (B-5).
6:09. Smoke in region of Noveant (B-5).
6:45. Fires in region of Dampvitoux (B-5).
16:20. Large shells falling western edge of Pagny (B-5).
16:25. Large cal. shells falling on Dampvitoux (B-5).
17:00. Shells falling Bois de Cheneaux (B-5).
17:01. Shells falling in Bois la Cote southeast of Vittonville (B-5).
17:25. Large shells falling in Farm Ponce (B-5).
23:24. Four star signals direction of Montenoy (B-5).
23:37. Row of lights direction of Verny (probably aviation camp) (B-5).
23:40. Row of lights direction of Goin (probably aviation camp) (B-5).
23:41. Flash light in air for five minutes direction of Noveant (B-5).
23:45. Four star signals direction of Mailly (B-5).
23:48. Four star signals direction of Montenoy (B-5).
23:48. Four star signals at intervals in direction Mailly and Montenoy (B-5).
23:48. Occasional shell fires in direction of Xammes (B-5).
1:40. Flare in direction of Pagny (B-5).
2:55. Green flashes in direction Pagny several times (B-5).
3:40. Green Light again flashes (B-5).
5:25. White flare in direction of Louvigny (B-5).
(13th) 18:45 to 19:05. Shelling Vilcey-sur-Trey—Villers-sous-Preny road (B-2).

(14th) 10:44, shells bursting near road running southwest from Fey-en-Haye (B-2).

6. Trench Work, Shelters etc. Nil.

Adjustments of Artillery: Nil.

Remarks:

7:22. Three allied planes on ground at 788.328 not seen to land (B-5).

17:20. Plane thought to be allied fell east of Bezaumont (biplane) (B-5)

At 10:45 a Salmson No. 17 crashed into cable of balloon No. 2 while balloon was at 700 meters altitude. The danger signal was attached to the cable at 300 meters. The plane struck the cable at approximately 375 meters. It fell about 200 meters from the winch; both pilot and observer were killed.

John A. Paegelow
Major A.S., U.S.A.
Commanding Army Balloons, First Army

Balloon Wing Fourth Army Corps

General Impression of the day; Section active, attack still advancing meeting with more opposition this A.M.

Observations

1. Enemy Infantry. No report.
2. Enemy Artillery

1:10. Artillery active direction of Metz. (B. No. 69).

9:30. 115th F.A. at Bouillonville (B. No. 43).

3. Enemy Aeronautic Service

1:12 Enemy planes near balloon (B. No. 69).

8:57. Enemy Balloon in direction of Lachaussee (B. No. 10).

9:16. Enemy planes direction Montsec. 9B. No. 69).

10:03. Enemy balloon slightly left of Xammes (B. No. 10).

4.-5. Circulation Roads, Railroads, No Report.

6. Destructions, Explosions, Fires

18:20. Fires seen at Heudicourt, Haumont, Dampvitoux, Vigneulles (B. No. 43).

24:24. Explosion in Thiaucourt (B. No. 69).

24:41. Fire at Thiaucourt dying out (B. No. 69).

24:40. Woel burning (B. No. 69).

1:06. Big explosion in Thiaucourt, white flames (B. No. 69).

1:07. Explosion in Thiaucourt (B. No. 69).

1:08. Large cloud of dense smoke and bright light in Thiaucourt (B. No. 69).

1:09. Large explosion in Thiaucourt (B. No. 69).

1:43. Flames seen in vicinity of Thiaucourt, Beney, dump S. of St. Benoit, Nonsard, Heudicourt, Hattonchatel (B. No. 69).

9:28. Fire observed at Xammes, smoke in le Sejour Bois, No. of co. 357-247 (B. No. 10).
9:54. High explosives in woods S. of Limey (B. No. 10).
10:00. Fire still observed at Xammes (B. No. 10).
10:12. Enemy shells falling in woods S of Limey (B. No. 10).
10:21. Enemy shells falling on Xammes (B. No. 10).
10:24. Shells falling on Haumont (B. No. 10).
10:28. Bois dit la Chambrotte SE of Regnieville being continually shelled by heavy enemy artillery (B. No. 10).
11:23. Xammes shelled by enemy artillery and now fire started (B. No. 10).
11:36. Large fire observed at Haumont (B. No. 10).
8. Miscellaneous
24:20. Four star rockets in east (B. No. 69).
24:49. Search lights in direction of Chambley (B. No. 69).
24:57. Lights flashing time to time direction Chambley (B. No. 69).
24:59. Bombs dropped direction Metz (B. No. 69).
8. Miscellaneous
Traffic on road between Menil-la-Tour and Flirey clearing up.
89th Division moving to Euvezin.
43rd leaving position south of Flirey for new position in rear of 115th F.A.
3rd. Balloon at Maizerais this A.M. inflating balloon ready to operate this P.M.
Ascensions
B. No. 10—1—3.11 still up.
B. No. 43—1—.14
B. No. 69—3—2.21
Enemy Balloons: Balloon direction Vigneulles, balloon W. Xammes in ascension 18.15 for short period. Balloon direction Lachaussee in

2nd Colonial Corps

Ascensions:
B-20 18:05-19:40, 5:30-9 45, 10:30-11:30, 13:45, still up.
B-41, B-523 (No telephonic communications).
Enemy Artillery:
656[?] Anti-aircraft battery, active at 05:55 east of Latour-en-Woevre.
15:45 to 16:50 Anti-aircraft battery active at 60.73 near Mars-la-Tour.
Enemy Aeronautical Service: Enemy balloons in the following directions in ascension:
Seuzey-Conflans.
Between Vionville and Rezonville.

Deuxnouds-Manonville-au-Passage.

At 15:20 Balloon burning in direction of Deuxnouds-Jeandelize.

Circulation:

From 7:05 to 11:05 four trains on the Conflans-Metz railroad.

From 7:05 to 11:05 five trains on the Conflans-Chambley railroad.

Destructions, Explosions, Fire:

Fire in Haumont at 18:30.

Fire in Haumont, Ferme-de-Champ-Fontaine and south east of Haumont.

Smokes and Signals: At 6:30 Smoke was observed rising near Le Bois-le-Sejour at 74:08.

Balloon 53 in reserve at Vignot

12:15 P.M. Fourth Corps. Sept. 14, 1918. Between 9:14 and 11:00 A.M. the following report:

3rd Balloon Company at Saizerais—now being inflated.

43rd Balloon Company at Bois de Hazelle—on its way to Euvezin, being held by the 115th Artillery at Bayonville, can not move on account of this congestion of traffic.

Paegelow

11:45 A.M. Fourth Corps. American plane Salmson 17 collided with cable of Balloon No. 2 this A.M. Plane fell to ground 200 meters away. Balloon was at Alt. of 700 meters and marker at 300 when accident occurred. Plane hit cable at 375 meters. Both Pilot and Observer in plane were killed.

Paegelow

Balloon 52 in reserve at Vignot.

13:05 P.M. Fourth Corps. Sept. 14, 1918. Col. Kilhorn C of S 89th Division directs: Expedite movement Mort Mare woods. No precedence over rations and Division Headquarters trucks. Division moving to Euvezin.

8:50 A.M. 1st Army Corps. Sept. 14, 1918. Balloon Wing, Balloon No. 5 (1 Kilometre north of Dieulouard) just burned by Boche. Balloon was up all night, and registered on batteries since daylight.

Paegelow.

Headquarters Commander Army Balloons
First Army

Supplementary Daily Report Operations, Balloons First Army, Sept. 13, 14.

Balloon Wing Fifth Army Corps
From 19:00 o'clock to 19:00 o'clock

Observations:

1. Enemy Infantry:

9:18. Infantry action south of Vigneulles and St. Benoit road (B-6).

15:55. one column about one and one half K in length from Les Baraques S.W. toward Dampvitoux at 67.0-51.2 (B-6).

2. Enemy Artillery:

7:10. Enemy AAA active near Fresnes-en-Woevre (B-8).

7:15. Enemy AAA active east of Fresnes (B-8).

7:40. Enemy AAA active east of Fresnes (B-8).

8:47. Large calibre shells between Vigneulles and Hattonville (B-6).

8:55. Enemy battery in action at 64.6-51.6 (B-6).

9:04. Enemy shells in St. Louis Fme (B-6).

11:10. Shells falling Fresnes, small calibre unable to locate battery (B-7).

11:15. Shells falling near Bal 7 and red cross hospital Fontaine—High explosives medium calibre 3470-5776 (B-7).

11:25. Shells fall about 400 meters back of B-7 near Sommedieue (B-7).

11:47. Shell bursts near B-7 north of Sommedieue (B-7).

12:40. Enemy shell at 54.0-40.0 (B-6).

13:45. Small cal. shells falling in region Z 4089 (B-7).

15:05. Large cal. shells falling in region Etain (B-7).

16:20. Shells burst vicinity 41.2-60.3 (B-8).

16:21. Shells burst vicinity 41.2-60.3 (B-8).

16:23. Shells burst vicinity 41.3-60.4 (B-8).

16:29. Shells burst large cloud of black smoke 43.6-65.1 (B-8).

16:30. Medium Calibre shells fall region U 4055 (B-7).

16:45. Shrapnel bursts over valley co-or. 70.6-45.5 1½ K. S.W. over Charey (B-6).

16:55. Three sharpnel bursts direction Rembercourt, probably over ravine 1½ K. S.W. of Charey (B-6).

17:05. H.E. time fuse explodes in direction and near Woel (B-6).

3. Enemy Air Planes:

6:38. Enemy planes dropped three white stars north of Rupt-en--Woevre (B-8).

9:00. One plane shot down and one in nose dive, about 10 K E of Sommedieue (B-7).

11:15. One enemy reconnaissance plane, about 2 K. N. of Sommedieue for about 30 minutes regulating fire on balloon 7 and village of Sommedieue. Plane signalled with machine guns (B-7).

11:35. Enemy plane near Vieville (B-6).

11:44. Enemy plane near Vieville (B-6).

15:20. Flaming object, evidently plane, brought to earth near Woel (B-6).

16:35. Plane with black smoke descending direction Charey (B-6).

17:10. Five enemy planes about 15 K. E. of Sommedieue, traveling S.E. (B-7).

4. Circulation, Railroads:

7:30. Train traveling from Buzy to Parfondrupt (B-12).

7:59. Trains at following points: one north of Pareid, one north of Buzy, one between Buzy and north end of Bois de Pareid (B-8).

8:10. Train vicinity of Dommary going S.E. (B-8).

9:26. Train out of Chambley towards Conflans (B-6).

6. Destructions, Explosions, Fires:

8:14. Heavy smoke from towns N.E. of Bois de Saulx (B-8).

8:30. Fires in Haumont, Fme de Champ Fontaine 57.0-48.2 (B-6).

10:15. Smoke on S.E. slope of hill 45.0-53.5 Carte-de-Eparges (B-6).

10:34. Smoke over Beney (B-6).

10:35. Bombs falling on railroad station E of Vieville (B-6).

12:45. Scattered puffs of smoke issuing from Bois de Creue and Bois de Nonsard (B-6).

14:09. Dense smoke and explosions along S.E. edge of woods at 66.2-43.7 (B-6).

14:21. Fire in Dommartin (B-6).

14:59. Continuous smoke in region Z 4089 (B-7).

15:20. Flaming object emitting black smoke, evidently plane, brought to earth in direction of Woel (B-6).

16:35. Plane with black smoke descending, direction Charey (B-6).

16:45. Smoke along west edge of woods Fond de Chenois (B-6).

17:03. Heavy smoke in Maizeray evidently an explosion (B-8).

17:10. Large volume of continuous smoke in Maizeray (B-7).

17:15. Fire in Maizeray (B-6).

17:45. Large explosions at St. Jean-le-Buzy (B-8).

8. Miscellaneous: 13:45 American plane of 88th Sqdn makes forced landing at Amblonville Fme (B-8).

Enemy Batteries Spotted: Location co-ord. 4151 number of pieces and calibre unknown, time 7:55 to 8:15 no bursts within our lines observed (B-8).

John A. Paegelow
Major, A.S., U.S.A.
Commander Army Balloons, First Army

Fifth Corps, Sept. 14, 24:00

Ascensions:

B-6
8:22-9:05. Obs Lt Taylor. Alt 500 M. Vis 20 Kilos.
9:15-9:28. Obs Lt Taylor. Alt 325 M. Vis 15 Kilos.
10:22-17:25. Obs Lt Taylor. Alt 450 M. Vis 15 Kilos.

B-7
8:52-12:00. Obs Lts Smith, Fortna. Alt 1000 M. Vis 20 Kilos.
13:07-19:00. Obs Lts Burt, Haigg. Alt 800 M. Vis 18 Kilos.

B-8
5:50-9:42. Obs Lts Ross, Temple. Alt 800 M. Vis 8 Kilos.
10:15-14:27. Obs Lts Ross,. Temple,. Alt 675 M. Vis 14 Kilos.
14:38-19:00. Obs Lt Holland. Alt 800 M. Vis 11 Kilos.

B-12
7:16-8:38. Obs Pvt R. F. Scott, Alt 500 M. Vis 15 Kilos.
12:15-12:28. Obs Pvt R. F. Scott, Maj Jouett. Alt 500 M. Vis. Poor.

Enemy Balloons:
Boinville, Hingry, Mangiennes, Harville.
Hingry burned at 15:30.

Headquarters Commander Army Balloons
First Army
September 14, 1918

Memorandum for All Concerned:

Following are changes in balloon positions 4th Corps:
3-B. 58.0-26.0
9-B. 57.5-44.6
10-B. 61.0-31.2
43-B. 60.8-35.8
69-B. 57.5-34.5

John A. Paegelow
Major, A.S., U.S.A.
Commander Army Balloons, First Army

Headquarters Commander Army Balloons
First Army

Locations of Balloons in First Army

September 14, 1918

7th Co.	Corps	1 kilo. N. Sommedieue
12th Co.	Army	1½ kilos E. of Rattentout
8th Co.	Divisional	3 Kilos N. of Mouilly
93rd Co.	Divisional	St. Remy
6th Co.	Divisional	Dommartin
20th Co.	Corps	Vigneulles
52nd Co.	Divisional	N.E. of Bois-de-Creue
41st Co.	Army	Nonsard
53rd Co.	Divisional	Vignoit (Reserve)
9th Co.	Divisional	Richecourt
5th Co.	Divisional	Maizerais
69th Co.	Corps	Bois-au-Jury
43rd Co.	Divisional	3 Kilos N. of Flirey
10th Co.	Army	Bois-de-la-Hazelle
38th Co.	Army	Lironville
1st Co.	Divisional	Bois-de-la-Haut
2nd Co.	Corps	Bois-de-la-Lampe
11th Co.	Army	Mamey
5th Co.	Divisional	1 Kilo N.E. Jezainville
42nd Co.	Divisional	Ville-au-Val

Paegelow

A balloon windlass mounted on a truck with a caterpillar adapter.

—340—

Information Section
Air Service, First Army
September 14, 1918

Reports Received

Report from GB-2 French Army, 14th September 7:30. Night reconnaissance. Bad atmospheric conditions, low clouds, raining since 12 p.m. Several planes are obliged to land owing to bad weather. One team Capt de Lesseps and Lt Knight performed with great difficulty a reconnaissance over Vigneulles—Mars-la-Tour—Conflans. Bombed Conflans station (440 kilos). Shell exploded in the middle of the station which was very active at that time. All the stations in the Moselle Valley are much lit up. Thionville, Metz, Briey, Conflans very much lit up. Heavy traffic on railroads. Railroad stations north of Battle Field (area of Longuyon) are very active. Numerous lights are on the road to the rear of battle field. Seemed to go east to west. General impression: enemy movements from north to south and east to west. Nearly no AAA.

Reports from First Observation Wing, 14th September 9:15. Lieutenant Wade reports convoy at Z-5 N-0 on road southwest of Preny at 8:10 headed north. The trucks were stationary at the time. Convoy extends from A-5-N-0 to N-5-H-0.

Reports from Aerial Division, 14th September 9:45. Pilot of French Aerial Division reports seeing an American Salmson 2A2—1143 quite smashed on ground between Spada and Lamorville. Corpse of aviator covered with blanket. Twenty meters further a parachute lying on ground.

Report from Fourth Corps Observation Group, 14th September 9:55.

Back area villages smoking; not in flames. Hangars at 604-460 have been burned and destroyed. A.A.A. activity over Dommartin at 6:20. Organized shell holes at 611-445, 601-433 and between 621-438, and on the line east and west through 438 (north of Xammes). Double line of shell holes in communicating trench. This line runs from Bois de Beney to a little east of Xammes. Works have been built in the following points: 620, 452, 450 [?] 617, 448. These are not well defined. Inf. did not respond to the observer's signal. While flying at 25 meters over Marimbois Farm and Dommartin was fired on by enemy machine guns from the ground. Troops observed in Sap trench leading from Marimbois 50 meters to the south (could not identify these men, but presumed they were enemy.) Piles of wreckage including several trucks at 614, 458, 614, 464. Mission returned at 7:20.

Mission which also returned at 7:20—Sector very calm. Friendly troops digging trenches at 612, 443, 612, 441, 615, 438, 621, 437.

Observed two doubtful machines over Charey, at 6:22. 89th Division panels at Bouillonville. American panels of 115th Field Artillery, 2nd Batt. at 619, 409. One bi-place north of Haumont at 6:25, but was not aggressive. Three columns of smoke at M8 K2. Feeble A.A.A. over Bois de Chaufour, 6:20 to 8:10 territory, Xammes-Preney-Norroy, altitude 1000 meters, vis fair. Convoy at R5 HO No. This convoy was on the road that runs Southwest of Preny and was headed north. It was not moving at this time. No artillery activity observed. Fire at Haumont, and Dampvitoux; both of these towns burning quite freely. No troops were seen anywhere on the roads.

Plane left at 5:30. As far back as Conflans. Very little activity on the roads. Saw American troops at Etang Lachaussee. Saw the French on the west of the same Lake, moving up artillery and troops.

Report from First Pursuit Group. 14th September 11:35. One combat in region of Hannonville and Hennemont. Considerable anti-aircraft and machine gun fire in the region of Parfondrupt and Hageville. One combat in region of Waville at 8:10 with two Fokkers. One enemy plane brought down. Had red wings, red nose light gray fuselage, striped tail. Same pilot encountered 5 Fokkers in region of Lachaussee. They turned and ran. One combat with 5 E.A. of Rumpler and Halberstadt type in region of Harville. Confirmation of one requested.

Report from First Pursuit Group, 14th September 11:50. Balloon at Bionville reported in earlier report, destroyed by pilots of 147th Squadron.

Report from First Pursuit Wing, 14th September 12:00. Three raids (bombing) 6:25 to 8:00. 1st Raid between Conflans, Metz and Chambley, full of E.A. but not many west of Chambley-Conflans R.R. Report signs of withdrawal from Conflans and direction of Briey: two 150 car trains going north from Conflans at 7:53, one 150 car train going south into Chambley at 7:40; one 200 car train in station at Chambley headed north. 2nd Raid: reached Conflans about 8:15. Attacked by nine Fokkers without result. Report circulation: two 50 car trains going north from Conflans to Briey: one 25 car train going north to Mars-la-Tour. Third Raid: Report one 60 car train going from Conflans to Briey at 8:10; one 25 car train going north out of Mars-la-Tour at 8:15. They were attacked by 9 Fokkers. Two of our planes have not returned. Two E.A. seen going down out of control. One of our planes seen to land in enemy's lines. Large fire just south of Metz, within four of five kilometers of that city. E.A. very active and aggressive. Three attacked one of our patrol of 14.

Report from First Observation Wing, 14th September 12:20. The 318th Squadron (French Corps) had just returned from mission which started at 10:40. They went five kilometers beyond the Hindenburg line from Chambley to Latour-en-Woevre. Report no activity, no signs of enemy troops. Saw trenches and barbed wire entanglements:

trenches deserted. No machine gun or AAA was encountered.

General Ragueneau no longer commands the French Mission. Colonel Linard is now in charge.

Report from 225th Squadron, French, 14th September. Two mounted machine guns on the road from Avillers to Woel. Nobody on the main road going from Fresnes-en-Woevre to Thiaucourt. Nobody from Fresnes to St. Benoit. Woel was flown over at low altitude and appeared to be unoccupied. St. Maurice filled with American troops. Two fires at Villy Baraques [?]. Fires at Haumont and in the woods. Fires on the road going from Lake Lachaussee to Haumont. Two Camions seen in St. Benoit.

Report from First Observation Wing, 14th September. The 318th Squadron (French Corps) had mission five kilometers beyond the Hindenburg line from Chambley to Latour-en-Woevre. Report no activity; no signs of enemy troops. Saw trenches and barbed wire entaglements; trenches deserted. No machine gun or A.A.A. fire was encountered.

Barbed wire entanglements in the area that for four years had been known as "No-Man's Land" at the St. Mihiel salient, 14 September 1918.

Reports from Eighth Army Headquarters, French, 14th September 15:15. An army reconnaissance patrol sent out between 11 and 12:00 had noticed considerable activity, much above the average, on the railroad Metz-Sarrebourg. From other sources—observatories—information is being brought in since an hour that six hitherto unreported sausage balloons have been located between the Moselle and the village of Foville.

Report from Independent Force, R.A.F., 14th September 17:54. IFB 108, 14. Bomb raid report no train movement in area Metz-Courcelles-Saarburg. Metz-Sablons full of rolling stock. Addressed GOC repeated CAS and G-2 1st American Army.

Report from Corps Observation Wing, 14th September 17:52. Report photo protection plane ten twelve to twelve twenty this morning. Bayonville no signs of railroad movement. Forty or fifty cars in the yard. No trains between Bayonville and St. Julien. No movements along Dampvitoux—Charey road, nor Charey—St. Julien road. Big gun firing in woods north of Rembercourt. Fires in towns north and west of Jaulny. Forty-eight photos taken, forty eight successful.

Report from First Pursuit Group, 14th September 19:20. Pilot of the 27th Squadron brought down one balloon at 15:45 in the vicinity of Etain. Returned with confirmation. One of our pilots brought down one Fokker in the vicinity of Etain. Saw it crash to the ground and a few minutes later attacked an Albatross which he saw go down in flames. French Balloon Company 61 of the 2nd French Army at Dugny confirms both of these planes. Pilot of the 95th Squadron saw a balloon brought down in flames at 15:00 in the vicinity of Jonville.

Report from First Pursuit Group, 14th September. Reconnaissance over Hindenburg line. Visibility was poor. Cloudy and rainy. Flying at an altitude of 100 meters. They could see practically nothing but observed that the Hindenburg line was occupied. A.A.A. active, but behind the lines it was raining, and they were unable to see any activity.

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Headquarters, Air Service, First Army
American Expeditionary Forces

Operations Report Number 15
19:00 Sept. 13, 19:00 Sept. 14th, 1918.

1. Atmospheric Conditions. Clear except for a few scattered clouds; moderate wind; visibility excellent; slight ground haze in the afternoon.

2. Enemy Aerial Activity. From an early hour it became apparent that the enemy had very materially augmented his aerial forces, which consisted largely of Fokker and Pfalz pursuit Planes. During the morning, enemy aerial activity was particularly active between Pont-a-

Mousson and Lachaussee. Later in the day, this activity was extended over the region between Metz, Conflans and Chambley. Enemy aviation was continuously employed in formation of from seven to fifteen planes, but our pilots reported that toward the end of the day, enemy pursuit aviation showed a great reluctance to engaging in combat, withdrawing in many cases immediately on sighting our patrols.

Much confusion was caused among enemy balloons which were attacked continuously throughout the day, and three and probably four enemy balloons were destroyed.

Anti-aircraft fire lacked definite cohesion, but was extremely active in the region between Metz, Conflans and Chambley.

3. Activity of Our Own Aviation.

(a) Pursuit. The First Pursuit Group carried out a total of 16 patrols during the course of the day, attacking enemy pursuit patrols, resulting in a total of 21 combats. In the course of these combats, at least two enemy planes were destroyed, and four enemy balloons.

The First Pursuit Wing executed 29 patrols in the course of the day, engaging the enemy in thirty-three combats, as a result of which our pilots are believed to have destroyed or forced down out of control a total of seventeen planes. As a result of the continuous patrols by this wing, the enemy pursuit was forced to operate at least five to six kilometers back of its own lines, which afforded our Corps Observation a free field in which to operate. In addition, planes of this wing brought back very valuable information concerning the progress of our own troops and the disposition and movements of enemy troops.

The French Aerial Division carried out a total of 34 patrols engaging the enemy in 10 combats, as the result of which seven enemy planes were destroyed, and another probably brought down out of control.

(b) Observation. The entire sector was under constant aerial surveillance from dawn to sun-down, and valuable information concerning the location of our own advancing troops and the disposition of enemy troops was reported. These missions penetrated the front to a depth of from 6 to 10 kilometers, and in many cases, information of extreme value was reported by wireless and confirmed by dropped messages to P.C. of Army Corps and Divisions. In addition to the visual surveillance of the sector, a considerable number of photograph missions were taken. This work was carried out with equal success by all Corps Air Service and resulted in advising the Army Command intimately throughout the day as to the progress of the attack.

Important work was also done by Corps Observation during the course of the day in establishing liaison with the infantry, resulting in a number of cases in establishing for Divisional P.C.'s the location of their respective advanced lines.

The Army Observation Group carried out six successful deep reconnaissance missions over the area Metz, Conflans, reporting movements of the enemy in the rear areas. In addition to the above reconnaissance missions four successful photographic missions were made in the course of which 157 plates were exposed, and brought back valuable information concerning conditions along the main railroad arteries. During the course of six missions, eight combats were reported, as the result of which it is believed that at least one enemy plane was destroyed.

(c) Bombardment. Ten very successful bombing raids were carried out by the First Day Bombardment Group, in the course of which bombs were dropped with marked accuracy on the following points—Dommary-Baroncourt, Etain, Conflans, Gorze, Vittonville and Arnaville. Good bursts were observed on all the above, and in addition the railroad bridge at Corny, the railroad junction at Arnaville and concentrations of troops in the village of Gorze were bombed with marked accuracy. In the course of these raids, a total of six tons of bombs were dropped, and combats were reported, resulting in the probably destruction of at least one, and probably two enemy planes.

The French Aerial Division carried out six bombing raids on troop concentrations, railroad junctions and enemy dumps, dropping a total of 20 tons of bombs in the course of the day.

During the night of the 13th-14th, night flying machines of the Independent Force, R.A.F., made several attempts to bomb the railroads at Metz and Courcelles and the Airdrome at Frescaty, Boulay and Buhl. On account of the weather conditions, Courcelles was the only objective reached at which point 42-112# and 21-25# bombs were dropped on the railroad.

Day bombing planes of the Independent Force, R.A.F., made 4 Bombing raids, dropping a total of 5½ tons of Bombs on Metz-Sablon, and Airdromes at Buhl, Ehrange and Boulay. Many direct hits were observed on the roundhouse at Metz, Railroad Triangle, and the railroad lines and gas works adjacent. Direct hits were also made on hangars at Buhl and Boulay. In the course of these missions, a number of enemy planes were engaged in combat, and at least one was driven down out of control, and another fell in flames. One British plane failed to return.

During the night of the 13th-14th, the French Night Bombardment Group, in spite of adverse weather conditions, dropped approximately a ton of bombs on Conflans, but atmospheric conditions made observation of the results impossible.

(d) Balloons. Balloons closely followed the advance of the artillery and at a late hour were establishing their positions and perfecting liaison on the new front.

Operations Report No. 15 (Cont'd)

Airplanes		French Aerial Division	Pursuit		Bombardment		Observation		Corps Observation Wing			
			1st Group	1st Wing	1st Army Day Group	Fr Night Group	1st Army Group	Heavy Artillery Group	1st Corps	4th Corps	5th Corps	2nd Fr C.A.C.
Sorties		335	110	282	77	4	38	25	54	63	31	10
Trials			15	28			14	8	2	9	4	
Combats		10	21	33	2		8		1		1	
Pilots	On Roll	669	79	234	60		33	42	73	63	63	41
	Available	470	75	199	38	28	32	34	67	56	53	37
	Missing	7	1	13	2		1					
	Wounded											
	Killed	2										
Observers	On Roll	248			61		26	35	58	43	50	29
	Available	177			41	36	25	32	49	40	48	25
	Missing	7			2		1					
	Wounded										1	
	Killed								1		1	
Enemy Planes	Con.	7										
	Uncon.	1	6	17	2						1	
Planes	Total	678	100	263	52		44	42	78	73	67	39
	Available	440	65	135	29	33	29	39	52	71	34	32
	Crashed			1	2		1		1			
Total Hours	Flying		124:33	408:33	74:33		57:45	35:00	71:46	64:13	48:35	20:00
	Service		116:11	399:30	74:33		41:45		67:15	57:18	48:05	20:00
Exercises												
Target Practice												
Alerts			1	1								
Patrols		30	10	25								
Protections			3	4			11		22	11	9	1
Voluntary Patrol		4	5									

Reconnaissances	Visual				7		26	20	16	6
	Photo				4		3	6	2	1
	Night									
Plates Taken	Suc			4	62		48	132	30	
	Unsuc			2	53			25		
Adjustments						11	1			
Rounds	Fired						100			
	Observed									
Cartridges fired		9700	2274	1770						
Infantry Liaison								9	1	
Special Missions			5	2	1			8	4	
Ferry Flights										
Bombing Raids		6		9	1					
Bombs Dropped	50 Kg.			64						
	20 Kg.									
	10 Kg.		8							
	Kilos	20000			300					
	8 Kg			96						
	9 Kg			10						

Balloons	American	French
Ascensions	20	2
Hours of Flight	32:00	3:30
Adjustments	1	
Rounds		
Fired	14	
Observed	10	

William Mitchell
Colonel, A.S., U.S.A.
Chief of Air Service, First Army

By Thomas S. Bowen
Major, A.S., USA
Operations Officer

Plane Situation, First Army
Sept. 14, 1918

Station	Group	Squadron	On hand yesterday	Lost	Received	On hand to-day	Due on Order	Available for duty	Type	Spad 13	Salmson 4	DH 4s B	DH 4s Ob	Breg. B	Breg. Ob.
Toul	2nd Pursuit Group	13	25	0	0	25	0		Spad	25					
		22	25	0	0	25	0			25					
		49	25	0	0	25	0			25					
		139	24	1	1	24	1			25					
	1st Corps Observation	1	22	1	0	21	1		Salmson		21				
		12	20	0	4	24	0				24				
Gondreville	Army Observation Group	24	24	0	0	24	0				24				
		91	24	0	0	24	2				24				
Vaucouleurs Field No. 1	3rd Pursuit Group	28	25	1	1	25	0		Spad	25					
		93	25	3	3	25	0			25					
		103	25	3	1	23	2			23					
		213	25	1	1	25	0			25					
Ourches	4th Corps Observations Group	8	19	0	1	20	4		DH 4				20		
		90	22	0	2	24	0		Salmson		24				
		135	20	3	0	17	0		DH 4				17		
Amanty	Night Recon. Day Bombing	9	18	0	0	18	7		Breg						18
		96	19	0	1	20	5							19	
Bicqueley	1st Corps Observation Group French	50	16	0	2	18	6		DH 4				18		
Souilly	5th Corps Observation Group	88	18	0	0	18	0		Salmson		18				
		99	24	2	0	22	0				22				
		104	24	0	0	24	0				24				

Rembercourt	1st Pursuit (218th Park) (Flight C, 648 Supply)	27	25	3	0	22	0	Spad	22					
		94	25	2	0	23	0		23					
		95	25	1	0	24	1		24					
		147	25	0	0	25	0		25					
		11	21	0	1	22	1		22		22			
		20	22	0	3	25	0		25		25			
Total			612	20	21	613	30		339	181	47	55	19	18

Airplane Gas and Oil Report
Air Service First Army
Date Sept. 14, 1918

Report from Equipment Department

Station	Kind	Gallons on hand yesterday	Gallons Delivered	Gallons Received	Gallons on hand today
First Air Depot	Fighting Spirits	19,990			19,990
	Gasoline	46,831	11,147	4,000	39,684
	Castor Oil	22,926	1,550	2,347	23,723
	BB Oil	19,552	1,850	3,200	20,902
Rembercourt	Fighting Spirits	3,721			3,721
	Gasoline	50,402			50,402
	Castor Oil	7,353			7,353
	BB Oil	36			36
Souilly	Fighting Spirits				
	Gasoline	5,945			5,945
	Castor Oil	10,969			10,969
	BB Oil				

Report from Equipment Department (Cont'd)

Station	Kind	Gallons on hand yesterday	Gallons Delivered	Gallons Received	Gallons on hand today
Toul	Fighting Spirits	747			747
	Gasoline	11,827	346	2,030	10,310
	Castor Oil	30			30
	BB Oil				
Mobile Park No. 1	Fighting Spirits	5,386			5,386
	Gasoline	16,905			16,905
	Castor Oil	4,550			4,500
	BB Oil				

U.S. troops advance through the St. Mihiel salient.

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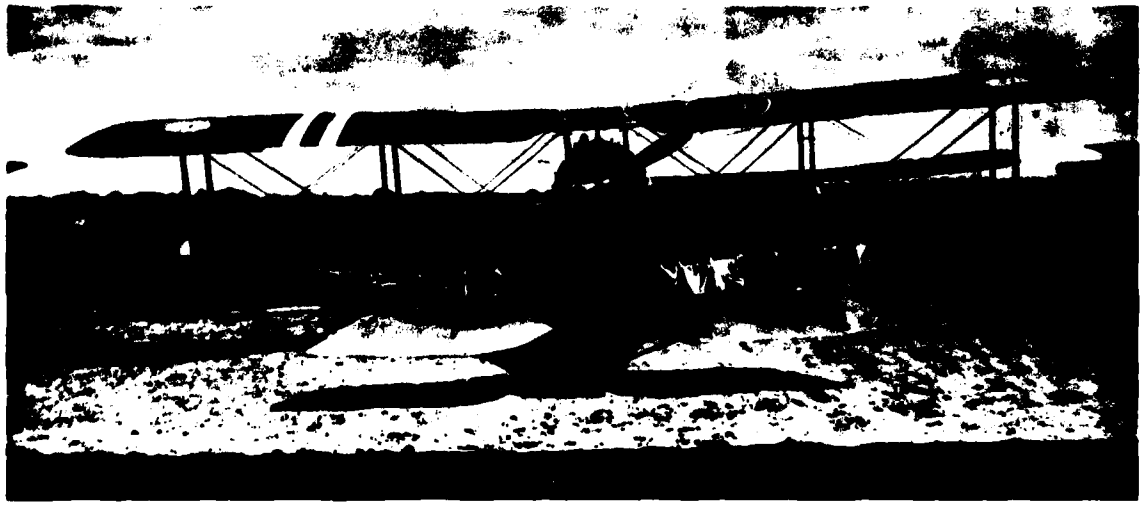
Air Service
First Army

Hostile Movements, Changes and Conduct

September 14th—At an early hour it became apparent that the enemy had materially augmented his aerial forces. They consisted mainly of Fokker and Pfalz pursuit planes. During the morning enemy aviation was very active between Pont-a-Mousson and Lachaussee. Later in the day this activity was extended over the region between Metz, Conflans and Chambley. Enemy aviation was continually employed in formation of from seven to fifteen planes, but our pilots reported that towards the end of the day enemy pursuit aviation showed a great reluctance to engage in combat, withdrawing in many cases immediately on sighting our patrols. Enemy planes carried out two reconnaissances over the extreme right of our Sector. Anti-aircraft fire was very active throughout the day. A number of hostile balloons were up early in the day, two of which were destroyed.



An aircraft of the 91st Aero Squadron damaged by anti-aircraft fire

Orders

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First Army, A.E.F.
Ligny-en-Barrois, September 14, 1918

Field Orders
No. 12

1. The enemy has made a considerable aeroplane concentration near Conflans. There has been considerable railroad activity today on the lines leading south through Mars-la-Tour, Conflans and Chambley, indicating a possible enemy concentration. An intercepted message stated he will counterattack tonight near Rembercourt. Our patrols have crossed the Hindenburg Line in numerous places. The French Second Army has occupied the towns of Wadonville, Saulx, Fresnes, Manheulles, Avillers, Riaville, Pintheville, and St.-Hilaire. The army corps report further capture of enemy officers, soldiers, guns and material.

2. This army will continue to consolidate the present line, establish an outpost line about 2 kilometers to the front and push strong reconnaissance in advance of the outpost line to maintain contact with the enemy.

3. No change in the orders for the air service. Program already established will be continued.

. . . . . .

By command of General Pershing:

H. A. Drum
Chief of Staff

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Headquarters Air Service First Army
American Expeditionary Forces
September 14, 1918

Battle Orders No. 4.

1. The 1st Army has won the victory and the enemy has been driven back at all points. Our patrols are in contact with him along the Hindenburg Line. His aviation has been greatly reinforced and is

disposed mainly around his strategical centers, such as Metz, and Conflans, in order to protect them from our bombing attacks. Our aviation completely dominates the whole area.

2. The 1st Army will continue to exploit its victory on the whole front. The line now extends from—Norroy—Villers-sous-Preny—Jaulny—Xammes—St. Benoit—Woel—Doncourt—St. Hilaire—Marcheville—Riaville—Ville-en-Woevre—Blanzee—Abucourt to Bezonvaux.

3. OUR AVIATION WILL FORM A STRONG BARRAGE OVER THE WHOLE POSITION, SO AS TO ENTIRELY STOP HOSTILE RECONNAISSANCE AND PROTECT OUR OBSERVATION AVIATION AND TROOPS.

4. (a) The ordinary missions of the Corps air services will be carried out. Special protection will be given for photographic missions up to a depth of 10 kilometers.

(b) Missions of the Army Observation Group (Reynolds) will remain the same as formerly prescribed. Special attention will be paid to movement of hostile units.

(c) The missions of the Army Artillery Group (Block) will be the same as before.

(d) The 1st Pursuit Wing (Atkinson) will cover the front to a depth of 5 kilometers in the enemy's territory between the same front as prescribed in Battle Orders No. 3. The offensive against any bodies of enemy aviation encountered will be taken at every opportunity. Protection will be furnished to important photographic missions of the Corps air services.

The 1st Bombardment Group (Dunsworth) will attack objectives in our front, to be announced on the morning of the 15th, inst.

The right flank of the first pursuit Wing will be protected by the 1st Brigade (French Aerial Division) and the aerial defenses of the 8th French Army.

Close liaison will be maintained by the 1st Pursuit Wing (Atkinson) with both of these and the Army Corps so as to keep track of the exact position of the troops.

(e) The 1st Pursuit Group (Hartney) will cover the same front as prescribed in Battle Orders No. 3 to a depth of 5 kilometers into the enemy's country. Protection will be furnished to the Corps air services for important photographic missions. The offensive will be taken against enemy aerial forces whenever the opportunity offers.

The left flank will [be] protected by the pursuit aviation of the 2nd French Army and by the 2nd Brigade of the (French) Aerial Division.

Close liaison will be kept with both of these and the Army Corps air service so as to keep track of the position of the troops.

(f) The Night Bombing and Reconnaissance Wing (Villome) will execute the night reconnaissance provided for. The station of Conflans will be attacked during the night of September 14th, 15th, with all available forces.

(g) The French Air Division (Vaulgrenant) will cover the right flank of the 1st Army from Pont-a-Mousson southeast to Chambrey. Strong patrols will be maintained on that line so as to stop any hostile air reconnaissance or attack. The left and left front of the 1st Army will be covered from a point on the line directly east of Verdun to Lachaussee. The front will be cleared of all enemy aviation and balloons. The day bombardment aviation will be held in reserve for action when opportunity offers.

5. The Equipment Section will hold itself ready to insure the supply and movement of any units required.

6. The 1st Army dropping ground for messages and the 1st Army landing ground remain the same as in paragraph 6, Battle Orders No. 1. The 1st Day Bombardment Group will provide a detail of four command airplanes to take station at Maulan beginning at 7:00 AM, September 15th.

7. Reports will reach the Chief of Air Service at Headquarters, Air Service First Army, Ligny-en-Barrois.

A liaison officer from each Corps Air Service, each Wing or independent group of the Army Air Service and the French Aerial Division, will report at the Headquarters C.A.S., 1st Army at 21.00 H each day to receive orders.

A liaison officer for the Night Bombardment Wing (Villome) will report at the Headquarters, C.A.S., 1st Corps, at 14:00 H each day to receive orders.

Wm. Mitchell

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First Pursuit Group
Operations Office
Sept. 14th, 1918

Operations Order
Number 128.

1. The following schedule of Operations is announced as effective for tomorrow Sept. 15th, 1918.

2. The 1st Army will aim at their new objectives throughout the day, and the Air Service will be on the offensive along the entire line of the sector which will be Chatillon-sous-les-Cotes to Etang-de-Lachaussee, both included. The object being to destroy all enemy air service, to attack his troops on the ground where ordered and to protect our planes and ground troops.

3. This Group will maintain a barrage against hostile aviation; Observation aviation will be protected and hostile balloons will be attacked opposite the front of the 5th Corp.

4. The following patrols will be maintained throughout the day:

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to Etang-de-Lachaussee
27th	5 h 45 to 7 h 15, 10 h 45 to 12 h 15, 15 h 45 to 17 h 15.
95th	7 h 00 to 8 h 30, 12 h 00 to 13 h 30, 17 h 00 to 18 h 30.
94th	8 h 15 to 9 h 45, 13 h 5 to 14 h 45, 18 h 00 to darkness.
147th	9 h 30 to 11 h 00, 14 h 30 to 16 h 00.

5. Each patrol will consist of two (2) echelons of six (6) planes each with the exception of the second set of patrols, that is from 10 h 45 to 16 h 00 which will be of four (4) planes each. The patrols of the lower echelon will operate from an altitude of 2500 meters to 3500 meters, and the patrols of the upper echelon from an altitude of 3500 to 5500 meters.

6. In addition to the above a mobile reserve of one flight will be maintained throughout the day commencing at 9 h 00. The 94th Squadron will hold its flight on alert while the 27th is on patrol and vice versa, and the 95th Squadron will hold its flight on alert while the 147th Squadron is on patrol and vice versa.

7. The 27th and 95th Squadrons will report for liaison duty at this office at 10 h 00, at least one officer and transportation will be furnished by each Squadron and upon completion of their mission a written report will be rendered to the Group Operations. The 94th and 147th will report at 14 h 00 under the same conditions.

8. These orders may be changed before midnight if special orders are received from the C.A.S. 1st Army.

By order of Major Hartney

Romer Shawhan
1st Lt. A.S.S.C.
Group Operations Officer

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First Pursuit Group
Operations Office
Sept. 15th, 1918

Operations Order
Number 129.

1. Paragraph 4 of Operations Order #128 is hereby cancelled.

2. The following squadrons will perform the mission indicated below:

MISSION	REGION	ALTITUDE
Patrol	St. Benoit-en-Woevre to Wadonville-en-Woevre	3800 meters

3. This patrol will consist of at least two planes, and they must not advance beyond this line under any circumstances. A third plane will be in readiness and warmed up to insure this number.

95th Squadron from 13 h 00 to 13 h 30
94th Squadron from 13 h 15 to 14 h 45
147th Squadron from 14 h 30 to 16 h 00

4. The 94th Squadron will hold ten planes on alert from 13 h 00 to 14 h 30.

The 147th Squadron will hold ten planes on alert from 14 h 30 to 15 h 45.

5. 15 h 45—95th Squadron, ten planes, proceeds in two echelons (a) 2500 to 3500 meters (b) 3500 to 5500 meters via Verdun, Etain to patrol sector Etang-de-Lachaussee to Fresnes.

16 h 00—94th Squadron, ten planes, proceed in two echelons (a) 2500 to 3500 meters, (b) 3500 to 5500 meters via Verdun, Etain to patrol sector Etang-de-Lachaussee to Fresnes.

16 h 15—147th Squadron, ten planes, proceed in two echelons (a) 2500 to 3500 meters, (b) 3500 to 5500 meters via Verdun, Etain to patrol sector Etang-de-Lachaussee to Fresnes.

16 h 20—27th Squadron, twelve planes, preceeding two echelons (a) 2500 meters, (b) 3500 meters, via St. Mihiel, Varviney, Chaillon, Creue to patrol Woel, Etain, with specific mission of destroying all enemy balloons visible attacking between 17 h 00 and 17 h 15. These balloon locations are as follows:

a) Tronville, between Mars-la-Tour and Chambley, 3 balloons.
b) Villers-sous-Paried—1 balloon.

6. Echelons of each squadron must keep close liaison.
7. Formations must keep extra tight.
8. Synchronize all watches.
9. Patrols for the remainder of the day will be 18 h 00 to darkness including the available planes of the 94th and 147th Squadrons in echelons of five (5) patrolling the region Chatillon-sous-les-Cotes to Etain-de-Lachaussee.

By order of Major Hartney

Romer Shawhan
1st Lt. A.S., S.C.
Group Operations Officer

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Operations Office
27th Aero Squadron, A.S.
1st Pursuit Group
Amer, E.F.
Sept. 14, 1918

Operations Order
No. 125.

1. The following schedule of Operations is announced as effective for tomorrow Sept. 15, 1918. The 1st Army will attack with their new objectives in view throughout the day. This Group will maintain a barrage against hostile aviation, observation aviation will be protected and hostile balloons will be attacked opposite the front of the 5th Corps.

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to Etang-de-Lachaussee
TIME	5 h 45 to 7 h 15. 10 h 45 to 12 h 15. 15 h 45 to 17 h 15

2. All pilots whose machines are serviceable will report to the Operations Office 20 minutes before time scheduled for first patrol, for final instructions. Lieut. Roberts will be the patrol leader.

3. In addition to the above patrols "B" Flight will be on alert from 13 h 15 to 14 h 45 and "C" Flight from 18 h 00 until dark.

4. These orders may be changed before mid-night.

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95th Aero Squadron
September 15, 1918

Operations Order
No. 103.

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to Etang-de-Lachaussee

7 h 00 to 8 h 30	Second and Third flights
12 h 00 to 13 h 30	First flight
17 h 00 to 18 h 30	Second and Third flight

Alerts

9 h 30 to 11 h 00	Second flight
14 h 30 to 16 h 00	Third flight

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Headquarters, First Pursuit Wing
Air Service, American E.F.
September 14th, 1918

Operations Order
Number 15.

1. Information of the enemy: No change in the line from the Western Flank of the Army as far as Jaulny. East of Jaulny our line has advanced to the southern edges of Vandieres. East of the Moselle we have taken Lesmenils, Cheminot and Eply.

The enemy pursuit air service acting in patrols of 7, 9 and 10, was extremely active east of Charey before 9 h 00 and after 16 h 00.

2. Plan of Operations: The Army will organize its new positions.

We will maintain our pursuit barrage and every effort will be made to create an area, 5 kilometers in rear of the enemy's line in which it will be safe for our Corps Observation to work.

The Day Bombardment Aviation will be held in reserve after 8 h 00 for the attack on such objective as may be designated.

3. First Pursuit Wing:

(a) The sector of the Wing is from the line Vigneulles—Lachaussee—Puxieux to the Moselle River. All patrols will cover the entire sector of the Wing.

(b) The 2nd Pursuit Group: will cover the front of the Army from 9 h 00 to 12 h 45.

(c) The 3rd Pursuit Group: will cover the front of the Army from 16 h 00 to dark.

G. C. 16: will cover the front of the Army, from daylight until 9 h 15 and from 12:30 to 16 h 30.

(d) Alerts will consist of 2 squadrons and will be used to furnish urgent protection for Army Observation Group.

The 2nd Pursuit Group: will maintain 2 squadrons on alert from 6 h 30 to 3 h 00 and from 12 h 30 to 16 h 30.

The 3rd Pursuit Group: will maintain 2 squadrons on alert from 9 h 00 to 12 h 00 and from 16 h 30 to 19 h 30.

By order of Lieut. Colonel Atkinson,

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

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Headquarters
2nd Pursuit Group 1st Pursuit Wing
Operations Office
September 15, 1918

Operations Order
No. 59

1. Information of the enemy. No change in the line from the Western Flank of the Army as far as Jaulny. East of Jaulny our line has advanced to the southern edge of Vandieres. East of the Moselle we have taken Lesmenils, Cheminot and Eply.

2. The Sector of the Group is from the line Vigneulles-Lachaussee Puxieux to the Moselle River. All patrols will cover the entire sector of the Group.

3. Mission.

a) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our corps observation aviation to work.

b) To prevent all enemy planes from crossing our lines.

c) Low patrols will attack all enemy balloons in ascension within the sector.

4. All patrols at 2500 to 3500 meters will be made along a line five to seven kilometers in advance of the line of battle. All patrols at 3500 to 5500 meters will be made along the line six to nine kilometers in advance of the line of battle.

5. The following schedule of alerts and patrols will be in effect September 15th.

13th Squadron

9:00-11:00	Patrol entire squadron along sector altitude 3500 to 5500
12:30-16:30	Entire squadron on the alert.

22nd Squadron

6:30- 9:00	Entire squadron on the alert.
10:45-12:45	Patrol entire squadron along sector altitude 2500-3500

49th Squadron

9:00-11:00	Patrol entire squadron along sector altitude 2500-3500
12:30-16:30	Entire squadron on the alert.

139th Squadron

6:30- 9:00	Entire squadron on the alert.
10:45-12:45	Patrol entire squadron along sector altitude 3500-5500

6. Squadron on alerts to have pilots at the hangars and all available machines lined up ready to take-off at a moment's notice during the period on alert.

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

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Operations Office[a]
13th Aero Squadron
Sept. 15th, 1918

Flying Order
No. 47

1. The sector of the Group is from the line Vigneulles, Lachaussee, Puxieux to the Moselle River. All patrols will cover the entire sector of the Group.

2. Mission.

(a) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our corps observation aviation to work.

(b) To prevent all enemy planes from crossing the lines.

(c) Low patrol will attack all enemy balloons in ascension within the sector.

4.[b] All patrols at 2500 meters will be made along a line five to seven kilometers in advance of the line of battle. All patrols at 3500 meters will be made along the line six to nine kilometers in advance of the line of battle.

5. The following schedule will be in effect for September 15th, 1918.

9:00 to 1:00 Patrol entire squadron along sector altitude 3500 to 5500 meters.

12:30 to 16:30 Entire squadron on the alert.

By order of Captain Biddle.

Sydney Gross
1st Lieut. A.S.U.S.A.
Operations Officer

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Operations Office
22nd Aero Squadron
2nd Pursuit Group
September 15, 1918

Operations Orders
No. 24.

1. The sector of the group is from the line Vigneulles—Lauchaussee —Puxieux to Moselle River.

2. Mission. To create an area of 5 kilometers in front of our advancing line.

To prevent all enemy planes from crossing our lines.

Low patrols will attack all enemy balloons in ascension in this sector.

All patrols at 2500-3500 Meters will be made along a line 5 to 7 kilometers in advance of the line of battle. All patrols 3500-5500 meters will be made along lines 6 to 9 kilometers in front of line of battle.

6:30 -9:00 Entire Squadron on the alert.

10:45-12:45 Patrol, Entire squadron along sector, Alt. 2500-3500 Meters.

By order of Capt. Bridgman

George B. Gillson
2nd Lt. A.S. U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 15th, 1918

Operations Order
No. 48.

1. Information of the enemy: No change in the line from the Western Flank of the army as far as Jaulny. East of Jaulny, our line has advanced in the southern edges of Vandieres. East of the Moselle, we have taken Lesmenils, Cheminot and Eply.

The enemy pursuit air service acting in patrols of 7, 9, and 10, was extremely active east of Charey before 9:00 and after 16:00.

2. Plan of Operations: The Army will organize its new positions.

We will maintain our Pursuit barrage and every effort will be made to create an area, 5 kilometers in the rear of the enemy lines, in which it will be safe for our corps observation to work.

3. The sector of the Group is from the line Vigneulles—Lachaussee —Puxieux to the Moselle River. All patrols will cover the entire sector of the Group.

4. The 93rd and 103rd Squadrons will hold all available planes on alert from 9:00 to 12:30 to furnish such protection as the Army Observation Group and the Corps Observation Squadrons may require.

By order of Major Thaw

R. Soubiran,
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 15th, 1918

Operations Order
No. 49

1. The 93rd Squadron will furnish 2 or more planes mounted with 11 mm guns and 5 protection planes for the purpose of attacking and destroying enemy balloons located at:
   1. 2 kilometers east of Gorze.
   2. 1½ kilometers southeast of Gorze.
2. The 103rd Squadron will furnish 1 plane mounted with 11 mm guns and 5 protection planes for the purpose of attacking and destroying enemy balloon located at:
   1. 1 kilometer southeast of Chambley.
3. These two Squadrons will cooperate in these attacks and arrange to leave the airdrome together.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 15th, 1918

Operations Order
No. 50.

1. The 28th Squadron will furnish 5 planes to protect two DH. 4's (Libertys) of the 135th Squadron. They will fly over this airdrome and await protection at 1000 meters. No rocket will be fired. Patrol will be made at 3000 meters and will take the following route: Thiaucourt, northwest along the lines for a distance of about 8 kilometers. Protection planes will fly close to the planes of the 135th Squadron.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 15th, 1918

Operations Order
No. 50-a

1. Supplementing Paragraph No. 4, Operations Order Number 48, the 28th Squadron will hold on alert all available planes from 10:15 to 12:30, this date.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 15th, 1918

Operations Order
No. 51.

1. Supplementing Operations Order Number 48, these Headquarters, the following schedule of patrols is in effect today:

16:00-17:45 2 patrols, 1 for lower tier and one for upper tier. All available planes, 213th Squadron.

17:30-19:30 Upper tier, all available planes, 93rd Squadron.

17:30-19:30 Lower tier, all available planes, 28th Squadron.

2. Patrols will make every effort to remain out for the full period scheduled.

3. All available planes of the 103rd Squadron will be on alert from 16:30-19:30, to furnish urgent protection for Army Observation Group and Corps Observation Squadrons.

By order of Major Thaw

R. Soubrian
Captain, A.S., U.S.A.
Operations Officer

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Third Pursuit Group
Operations Office
September 15th, 1918
18:30

Operations Order
No. 52.

1. The 103rd Squadron will send out immediately all available planes to patrol the lines between Lachaussee and Rembercourt. Altitude 3000 meters.

2. A counter-attack is now in progress in the region of Jonville, and the patrol will keep this region under close observation, but will not cross the limits of our sector, that is, go beyond Lachaussee unless absolutely necessary.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

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103d Aero Squadron

Flying Orders for September 15th, 1918.

All available planes will be held on alert from 9.00 to 12.30 to furnish such protection as the Army Observation Group and the Corps Observation Squadrons may require.

Flying Orders for September 15th, 1918. (Balloon Attack).

Lieut. Tobin of this Squadron will leave immediately in a plane mounted with 11 m/m guns and accompanied by five protection planes for the purpose of attacking and destroying an enemy balloon located at about 1 kilometer southeast of Chambley.

Flying Orders for September 15th, 1918.

All available planes will be on alert from 16.30 to 19.30 to furnish urgent protection for Army Observation Group and Corps Observation Squadrons.

Flying Orders for September 15th, 1918 (Special Mission) Issued 18.30

All available planes will leave immediately and patrol the lines between Lachaussee and Rembercourt. Altitude 3000 meters. A counter-attack is now in progress in the region of Jonville, and the patrol will keep this region under close observation, but will not cross the limit of our sector, that is go beyond Lachaussee unless absolutely necessary.

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Operations Office
213th Aero Pursuit Squadron
September 15th, 1918

Operations Order
Number 18.

1. Information of the enemy: No change in the line from the western flank of the Army as far as Jaulny. East of Jaulny our line has advanced to the southern edges of Vanderies. East of the Moselle we have taken Lesmenils, Cherminot and Eply.

The enemy pursuit air service acting in patrols of 7, 9 and 10, was extremely active east of Charey before 9:00 and after 16:00.

2. Plan of Operations: The Army will organize its new positions.
We will maintain our pursuit barrage and every effort will be made to create an area, 5 kilometers in the rear of the enemy's lines in which it will be safe for our Corps Observation to work.
3. The sector of the Group is from the line Vigneulles—Lachaussee —Puxieux to the Moselle River. All patrols will cover the entire sector of the Group.

By order of Lieut. Hambleton

E. N. Hunt
1st Lieut. A.S., U.S.A.
Operations Officer

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Operations Office
213th Aero Pursuit Squadron
September 15th, 1918

Operations Order
Number 19.

1. Supplementing Operations Order Number 18, the following schedule of patrols is in effect today:
16:00-17:45 2 Patrols, 1 for lower tier and one for upper tier. All available planes.
2. Patrols will make every effort to remain out for the full period scheduled.

By order of Lieut. Hambleton

E. N. Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

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Headquarters, 20th Aero Squadron
First Day Bombardment Group
A.P.O. 703 A.E.F., France
[Sept. 15, 1918]

Operations Order
No. 5

The following named officers will stand by at 5:00 a.m. Sept 15, 1918, for a bombing mission to be designated later.

Their position in the formation will be as follows:

1
Lt Sellers
Lt Parrott (486)

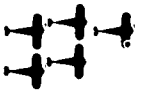
3 2
Lt Howard — Lt. Edwards
Lt Payne (584) — Lt Endler (408)

5 4
Lt West — Lt Wiser
Lt Richardson (785) — Lt Christian (445)

7 6
Lt Wadsworth — Lt Mathews
Lt Richardson (785) — Lt Taylor (707)

9 10 8
Lt Baker — Lt Harris — Lt Stephens
Lt Goodell (502) — Lt Forbes (792) — Lt. Louis (546)

E A Parrott
1st Lieut A.S., U.S.A.
Operations Officer



—364—

Headquarters, 20th Aero Squadron
First Day Bombardment Group
A.P.O. 703, A.E.F., France
September 14 [15th?], 1918

Operations Order
No. 6

The following named officers will stand by at 2:15 p.m. September 15th, 1918 for a bombing mission to be designated later.

Their positions in the formation will be as follows:

1
Lt Sellers
Lt Parrott (486)

3 2
Lt Mandell Lt Seaver
Lt Fiske (445) Lt Stokes (442)

5 4
Lt Townes Lt Leach
Lt Bunkley (792) Lt Wilmer (408)

6
Lt Koepfgen
Lt Hicks (546)

Charles H Konantz
2nd Lieut A.S., U.S.A.
Operations Officer

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Operations Office
96th Aero Squadron
Sept 15, 1918

Operations Order No 63

The following pilots and observers will stand by at 4:45 A.M. for raid at 5:00 A.M. Pilots and observers will be standing by machines at 5:00 A.M.

Position Pilot Flight leader	Observer	Plane No.
1 Lt Anderson	Lt H S Thompson	12
2 Lt Beverly	Lt Newbury	15
3 Lt Bates	Lt Pressler	14
4 Lt Young C P	Lt Hexter	20
5 Lt Rogers	Lt Strawn	8
6 Lt Elliott	Lt Ellis	4
7 Lt Baker	Lt Milner	5

E E Evans Operations Officer
1st Lt A S U S A

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Operations Office
96th Aero Squadron
Sept 15, 1918

Operations Order No 64

The following pilots and observers will stand by at 2:00 P.M. for raid at 2:15 P.M.

Position Pilot Flight leader	Observer	Plane No
1 Lt Gaylord	Lt Lunt	14
2 Lt Codman	Lt Stuart	12
3 Lt Hopper	Lt Kelly	5
4 Lt Lakin	Lt Douglas	20
5 Lt Forshay	Lt O'Donnell	15
6 Lt Rogers	Lt Strawn	4
7 Lt Baker	Lt Milner	1

E E Evans Operations Officer
1st Lt A S U S A

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Headquarters 91st Aero Service Squadron

Missions for Sept. 15, 1918.

Reconnaissance.

	Special Itinerary at 4:45	
Lt Snyder	Lt Kelty	16
Lt Seymour	Lt Douglass	18
	Special at 10:00	
Lt Lowry	Lt Guilbert	11
Lt Jannopoulo	Lt Van Heuvel	15
Lt Richardson	Lt Baker	18 (old)
Photography		
	Itinerary outlined in White at 7:45	
Capt Wallis	Lt Strahm	19
Lt Mangan	Lt Lambert	1
	Itinerary outlined in Red at 7:45	
Lt Hammond	Lt Diekema	3
Lt Badham	Lt Kenney	5
Protection		
	Itinerary outlined in White at 7:45	
Lt Schricker	Lt Powell	12
	Itinerary outlined in Red at 7:45	
Lt Martin	Lt Coles	15
Lt Lee	Lt Delana	17

By order Major John N. Reynolds.

John H. Snyder, 2nd Lt. A.S.
Operations Officer

Maj. John N. Reynolds, pilot in the 91st Aero Squadron, hands photo plates to 1st Lt. J. H. Snyder, following a reconnaissance flight. A motorcyclist waits to rush them to a field studio.

The motor cycle driver, Pvt. P. J. Pool, delivered the plates to Sgt. A. G. Campbell for processing in the improvised field lab.

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Headquarters 4th Observation Group
Sept. 14th, 1918

Operations Order #15.

The 90th and 135th squadrons will make a reconnaissance of their respective divisional fronts as soon after day light as possible on the morning of September 15th. Especial attention being paid to the position of the infantry of the U.S. Troops.

The 8th Squadron will make a reconnaissance of the region listed below.

Dampvitoux—Chambley Road.

Towns of: Charey, Dommartin, Lachaussee, Hageville and St. Julien.

Only the 90th and 135th squadrons will keep an alert, the alert consisting of two planes one of which must be photo plane.

Other missions will be assigned later.

By order of Maj. J. T. McNarney

Jack Phinizy
Lt., C.A.C.
Operations Officer

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Operations Office
Observation Group Fourth Army Corps
Sept. 15, 1918

Memorandum for all Squadron Commanders:

There will be an afternoon reconnaissance by all the Squadrons of this Group. Protection will be furnished by each squadron. Planes will be on lines from 5:30 to 6:30 P.M.

This command will be repeated by day-light tomorrow morning.

By order of Maj. J. T. McNarney:

Jack Phinizy, 1st Lt., C.A.C.
Group Operations Officer

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Headquarters
90th Aero Squadron
Observation Group—Fourth Army Corps
Sept. 15, 1918

Reconnaissance

Observers	Pilot	Plane No.	Time
Lt. Walden, D.M.	Lt. Lee, M.G.	15	5:30
Lt. Tillman, F.A.	Lt. Greist, E.H.	1162	7:30

Lieut. Hart will be in charge of the field.
Lieut. Shuss will report as Officer of the Day at 6:00 P.M.
Lieut. Vinson will be Squadron Censor Officer.
19 pilots—19 available.
14 observers—13 available. One on liaison duty within the Corps.
3 M.G. observers—3 available.
24 Salmsons—24 available.
1 Spad—1 available.

By order of Lt. Gallop

Morton B. Adams, 1st Lt.
Chief Observer

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Headquarters
90th Aero Squadron
Observation Group—Fourth Corps
Sept. 15, 1918

Reconnaissance—(Afternoon Schedule)

Observer	Pilot	Plane No.	Time
Lt. Sullivan, A.P.	Lt. Bovard, J.M.	11	3:30
Protection:			
Lt. Vinson, F.L.	Lt. Rohrer, L.E.	13	3:30
Lt. Francis, W.L.	Lt. Cowle, H. H.	3	5:30
Protection:			
Lt. Parr, A.E.	Lt. Broomfield	20	5:30

By order of Lt. Bishop

Morton B. Adams, 1st Lt.
Chief Observer

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Headquarters
90th Aero Squadron
Observation Group—Fourth Army Corps
Sept. 15, 1918

Reconnaissance

Observer	Pilot	Plane No.	Time
Lt. Lowe, W. O.	Lt. Kinsley, W.E.	10	5:30
Protection:			
Lt. Bogle, H.C.	Lt. Young, J.S.	19	5:30

Lt. Lee will be in charge of the field.
Lt. White will be Post Censor Officer.
18 Pilots—18 Available.
14 Observers—13 Available. One on liaison duty within the Corps.
3 M.G. Observers—3 Available.
23 Salmsons—22 available. One ready by Sept. 17th.
1 Spad—1 available.

By order of Lt. Schauffler,

Morton B. Adams, 1st Lt.
Chief Observer

—373—

Office of the Chief of Air Service
Headquarters First Army Corps
American Expeditionary Forces
15 Sept. 1918

Operations Order
No. 2

1. Operations order No. 1, these headquarters, dated 14 Sept. 1918, is hereby amended as follows:
2. The 78th Division relieves the 5th Division on the night of 16/17 Sept. 1918 (not 15/16 Sept. 1918).
3. The 5th Artillery Brigade, in addition to holding its present sector, will take over the sector now held by the 2nd Artillery Brigade, night 17/18 Sept. 1918.
4. The assignment of Aero Squadrons and Balloon Companies to their new Divisions will take effect from the following dates and hours:

1st Aero Squadron and 1st Balloon Company assigned to 78th Division from 10:00 hours to 16 Sept. 1918 (P.C. 78th Division will be at Loge Mangin).

12th Aero Squadron and 2nd Balloon Company assigned to 90th Division from 10:00 hours 17 Sept. 1918.

50th Aero Squadron and 42nd Balloon Company assigned to 82nd Division (only) from 10:00 hours 17 Sept. 1918.

5. Until the dates and hours indicated in par. 4, the squadron and balloon companies will operate with the Division and Artillery formations to which they were assigned on 10 Sept. 1918.

6. The 12th Aero Squadron will continue liaison with the 5th Division after it leaves the lines, and will arrange and carry out infantry contact patrol exercises and artillery panel exercises with it as long as this Division remains in 1st Army Corps.

7. All provisions of Operations Order No. 1, these headquarters, dated 14 Sept. 1918, which are not amended by the present order hold good.

M.A. Hall
Major, Air Service, U.S.A.
C.A.S., 1st A.C.

Reports

—374—

11th Balloon Company
American E.F. France
15 September, 1918

From: C.O. 11th Balloon Company
To: C.A.S. (Balloon Section) (thru Military Channels)
Subject: Report of Enemy Aeroplane Attack.

1. Enemy plane sighted in Southeast, 12:25, September 15, 1918 attacked first balloon on our right southeast, balloon hauled down rapidly, barrage put up by French anti-aircraft guns "Anson." Plane then attacked this company's balloon flying low over hill from southeast, made slight dip, opened fire on balloon which did not burn, putting sixteen holes in fins, nine holes through gas bag and nine holes through ballonet, banked to right flank of balloon leaving position in northwesterly direction setting fire to two next balloons this company's right.

2. Observer received no order to jump, balloon did not burn, observer remained in basket.
3. Balloon ascends at 16:30.

Charles E. Barber
1st Lieut. Air Service

—375—

Headquarters, 27th Aero Squadron, A.S.
Operations Office, 1st Pursuit Group
Sept. 15th, 1918

Atmospheric conditions—clear.

1)—1 Patrol. 5 h 50 to 7 h 40, 11 planes. Lts. Hudson, Wilson, Vasconcells, Dawson, Hewitt, Lennon, Lyman, Clapp, Roberts, Stout and Luke. Alt. 3500 to 5000 meters. For results see reconnaissance report of Lt. Roberts.

2)—1 Patrol. 10 h 45 to 12 h 05, planes. Lts. Stout, Clapp, Vasconcells, White, Rucker, Luke, Donaldson and Hoover. For results of this patrol see reconnaissance report of Lts. Luke and Hoover. Alt. 3500 meters.

1)—1 Trial Flight. 14 h 05 to 14 h 50. 1 plane. Lt. Donaldson. Testing.

1)—1 Sortie. 13 h 35 to 14 h 00. 1 plane. Lt. McKimmon ferried a new machine from Vavincourt.

3)—1 Patrol. 16 h 20 to 18 h 00. 12 planes. Lts. Nicolson, Hewitt, Rucker, Lennon, Grant, Stout, Hoover, Wehner, Dawson, Luke, Donaldson and White.

Summary

a)	Sorties	33
b)	Trials	1
c)	Combats	4
d)	Pilots available	19
e)	Pilots total	19
i)	Enemy planes unconfirmed	3
j)	Total planes	25
k)	Available planes	15
l)	Total flying hours	53'
m)	Total service hours	51'50"
o)	Patrols	3
s)	Planes dropped	1
t)	Planes received	1

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27th Aero Squadron
September 15, 1918

Combat and Reconnaissance Reports

Lt. J. F. Wehner reports: Left airdrome after formation expecting to pick them up on the front. I was instructed to attack enemy balloons with Lt. Luke, so I stayed at a low altitude. Saw formation coming north so I flew over towards the Hun lines to pick up a balloon. Attacked a Hun balloon N.E. of Verdun and S.W. of Spincourt, at about 17 h 10 bringing it down. I was forced to pull off immediately as a formation of five Hun planes were trying to cut me off, and my guns were empty. The Hun planes were both Fokker and Albatross. I maneuvered down towards Chambley where the Huns left me, after seeing a formation of French Spads approaching. I fired approximately 100 rounds in to balloon.

Lt. Joseph F. Wehner reports: Left airdrome 15 minutes after the patrol and flew East expecting to pick them up near Verdun. I did not see the formation so I flew towards a Hun balloon at Etain which Lt. Luke and I were detailed to straff. When about a mile away I saw the balloon go up in flames, so I headed towards a second balloon further south, flying at an altitude of 1500 meters. There was considerable A.A. fire near the place where the balloon had burned. Changed my direction hoping to pick up Lt. Luke. Saw him near Rouvres heading back to our lines pursued by seven or eight planes of the Fokker and Albatross type. Peaked at them opening up with both guns. Shot at several in the rear of the Hun formation. Brought down a Fokker near Warcq, which was on Lt. Luke's tail. It fell off into a spiral, sideslip and then spun to the ground, crashing. Then I shot at an Albatross also on Lt. Luke's tail. It turned and started towards the ground in a steep dive. The rest of the Hun planes pursued us to our lines and then turned back. Two confirmations requested.

Lt. Ivan A. Roberts reports: Patrolled Chatillon to Etang-de-Lachaussee. Visibility very good. Tows [Towns?] along the Orne river burning. Patrolled for an hour on a line from Etain to Chambley. Observed considerable artillery action. Sighted 2 E. A. 800 meters above us over Etang-de-Lachaussee. Balloon S. E. of Etain up again. Shot 100 shots at balloon from high altitude.

Lt. W. J. Hoover and Lt. Frank Luke report: Patrol to attack balloon at Etain. Only three machines left of patrol by the time we reached Etain. Then Lieut. Clapp dropped out on account of engine trouble. Balloon was pulled down. Archie very accurate above balloon. We were followed the entire time by six Fokkers. They had at least 500 meters altitude on us, but did not attack.

Lt. W. J. Hoover reports: Flew to Mars-la-Tour. No balloon up, so patrolled to Etain for another. Lt. Luke left the formation to attack the balloon South of Boinville. Saw the balloon go up in flames and drop just South of Boinville. Patrolled the lines three times, followed up and down by 7 Fokkers, higher and in Germany. On the way back I saw the wood North of the Three Fingered Lake being heavily shelled, also the town of Fresnes and the other little towns near this place and along the ridge. I did not notice any movement of troops.

Lt. K. S. Clapp reports: Owing to darkness, only artillery action could be observed. Could not observe any troop movements. Saw a

French soldiers watch the destruction of an observation balloon.

little artillery action E. of Verdun but it was not excessive. There was much greater activity in the direction of Conflans. Lieut. Wehner of this patrol fired about 100 rounds at an enemy battery, which was in action.

Lt. Frank Luke reports: I left formation and attacked an enemy balloon near Boinville in accordance with instructions and destroyed it. I fired 125 rounds. I then attacked another balloon near Bois d'Hingry, and fired 50 rounds into it. Two confirmations requested.

Lt. Frank Luke reports: Patrolled to observe enemy activity. Left a little after formation, expecting to find it on the lines. On arriving there I could not find formation, but saw artillery firing on both sides, also saw a light at about 500 meters. At first I thought it was an observation machine, but on nearing it, I found it was a Hun balloon, so I attacked and destroyed it. I was archied with white fire and machine guns were very active. Returned very low. Saw thousands of small lights in woods north of Verdun. On account of darkness coming on I lost my way and landed in a French wheat field at Agers at about 21 h 30. Balloon went down in flames at 19 h 50.

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94th Aero Squadron, Operations Office
Sept. 15th, 1918

Nothing Supplementary to Report.

1. Voluntary Patrol Etain, Hadonville and Pagny. One (1) Plane. Lieut. Rickenbacker. 7 h 16 to 8 h 50. See Lieut. Rickenbacker's reconnaissance report.

2. Protection Patrol Chatillon-sous-les-Cotes. Nine (9) planes. Lieut. Jeffers, P.L. 8 h 49 to 10 h 21. Lieuts. Palmer, Eastman, Cates, Cook, Sparks, Zacharias, Sherry, and Chambers. Lieut. Sherry landed with motor trouble on 94th Airdrome at 9 h 05, and Lieut. Chambers also at 9 h 40. Altitude reached 4000 meters. No results. See Reconnaissance reports of Lieuts. Jeffers, Sparks, Palmer and Eastman.

3. Patrol Etang-de-Lachaussee. Two (2) Planes. Lieuts. Chambers and Samson, 12 h 56 to 14 h 25. Lieut. Samson landed with motor trouble on Field of 94th Airdrome at 13 h 28. Lieut. Chambers reports that he saw two (2) formations (Boche) of six (6) planes each but did not attack. No results. Altitude reached 5300 meters.

4. Patrol

Upper Echelon, Etang-de-Lachaussee—Fresnes, Six (6) Planes. Lieut. Jeffers, P.L. 15 h 47 to 17 H 22. Lieuts. Cook, Sparks, Palmer, Snow and Zacharias.

Lower Echelon, Etang-de-Lachaussee—Fresnes. Six (6) Planes. Lieut. Cates, P.L. 15 h 47 to 17 h 22. Lieuts. Sherry, Eastman, Crocker, Kaye, and Scroggie. Lieuts. Snow, Zacharias, Eastman and Kaye, landed with motor trouble at 16 h 19. See reconnaissance report of Lieut. Jeffers. Altitude reached 4000 meters. No results.

(a)	Sorties	24
(b)	Trials	0
(c)	Combats	1
(d)	Pilots Available	19
(e)	Total Pilots	20
(f)	Pilots Missing	0
(g)	Pilots Wounded	0
(h)	Enemy Planes Confirmed	0
(i)	Enemy Planes Unconfirmed	1
(j)	Total Planes	24
(k)	Available Planes	14
(l)	Total Flying Hours	29 h 17
(m)	Total Service Hours	29 h 17
(n)	Alerts	0
(o)	Patrols	2
(p)	Protection Patrols	1
(q)	Voluntary Patrols	1
(r)	Special Missions	0
(s)	Planes Dropped	0
(t)	Planes received	0

J. L. Davitt, 2nd Lieut. AS, USA

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94th Aero Squadron
9/15/18

Reconnaissance Report

Airplane Type: Spad
Motor Type: Hispano-Suiza
Max. Altitude: 4000 m
Mission: Voluntary Patrol.
Weather: Good.
Pilot: Lieut. Rickenbacker.
Time out: 7 h 45
Time in: 9 h 00

Lt. Rickenbacker Reports: Encountered six (6) E.A. with regular camouflage at 8 h 10 in the region of Bois de Waville and the Bois de Bayonville after having flown up and down the sector with them parallel with the lines at about the same altitude. Then returning over the

above mentioned region this patrol piqued on four Spads, one of which I noticed to go down in a vrille. I saw my opportunity to pique on the last man of the E.A. patrol, which was a Fokker type. I got several good bursts into the cockpit and noticed the E.A. to go down flopping from side to side out of control. The encounter started at 4500 meters and ended at 2000 meters. At the time that I piqued I noticed nine (9) E. A. flying from the direction of Metz over Ars-sur-Moselle. Confirmation requested.

J. L. Davitt
2nd Lieut. AS, USA
Operations Officer

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94th Aero Squadron
9/15/18

Reconnaissance Report

Time out: 8 h 49
Time in: 9 h 53.
Max. Altitude: 3800
Mission: Protection Patrol.
Pilot: Lieut. Eastman.

Lieut. Eastman Reports: Observed a long series of fires in the region N.E. of Verdun. Was straggling behind our formation on account of low R.P.M. of motor, when over the region of Jonville and St. Hilaire, at 3800 meters, four enemy Fokkers approached us from above in the rear. Unable to maintain position in our formation and the enemy planes bearing down on my air plane, I immediately piqued sharply with four enemy air planes in pursuit and firing to about 1500 meters. The enemy withdrew. Noticing a number of bullet holes in my elevator and elsewhere, I returned to the home field.

J. L. Davitt
2nd Lieut. AS, USA
Operations Office

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94th Aero Squadron
9/15/18

Reconnaissance Report

Time out: 8 h 49
Time in: 10 h 21
Max. Altitude: 4200
Mission: Protection Patrol.
Pilot: Jeffers, Palmer, Sparks.

Lieut. Jeffers Reports: Patrol left field at 8 h 49 and lay over field at Rumont from 8 h 50 to 9 h 05. One plane taxied out, but none left field. Patrol then went to Lake Lachaussee and waited from 9 h 20 to 9 h 35, but saw no Salmsons. Patrol then continued on regular route and was attacked in region of Jonville-St. Hilaire by nine (9) Fokkers at 9 h 55 from an altitude of 5000 meters. Patrol at this time was at 4200 meters. Five (5) Fokkers attacked and four stayed above patrol to protect. The rear of patrol was attacked and I turned, climbing above attackers, into the sun. The attackers pulled off after following about 400 meters and shooting at a distance from 300 m. They then turned under their own protection, which left the region of the lines. Patrol then continued and returned at 10 h 20. No Salmsons were observed doing observation in sector of Patrol. Three (3) Allied planes were doing observation in region of Ville en Woevre-Grimaucourt sector.

Lieut. Palmer Reports: Woel is burning. Also fires in the region of Chambley. We were flying at an altitude of 4200 meters, when nine (9) E.A. were observed seven or eight hundred meters above us. Five of them attacked the rear of our formation, in the region of Jonville-St. Hilaire. Was unable to engage in combat as they kept the altitude above us and immediately turned back into Germany after piquing once.

Lieut. Sparks Reports: Five (5) E.A. seen in region of Jonville and St. Hilaire. Two (2) at 3500 meters and three (3) at 4800 meters, who fired several bursts at me from distance of 300 meters. No hits. Followed me for about 500 meters.

J. L. Davitt
2nd Lt., AS, USA
Operations Officer

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94th Aero Squadror
9/15/18

Reconnaissance Report

Time out: 15 h 47
Time in: 17 h 22
Max. Altitude: 3500
Mission: Patrol
Weather: Good
Pilot: Lt. Jeffers, patrol leader, Lt. Cook, Sparks, Palmer, Snow, Zacharias, Cates, Sherry, Eastman, Crocker, Kaye, and Scroggie.

Lt. Jeffers Reports: Patrol left field at 15 h 47. Lower echelon flew at 3500 meters and upper echelon at 4800 meters. No enemy aircraft were sighted near lines. Five planes were sighted back in Germany. They were too far away to discern and there was no barrage near them. Column of smoke about 1000 meters in height was observed between Ornel and Frameux. The height to which this column ascended I was unable to ascertain as it was misty in that direction. This column of smoke was discernable for over five (5) minutes.

J. L. Davitt
2nd Lieut. AS, USA
Operations Officer

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Headquarters 95th Aero Squadron
Operations Office
Sept. 15, 1918

Report of Operations

1) Patrol 7 h 00 to 8 h 35: 12 planes; altitude 3500 meters; line—Chatillon to Etang de Lachaussee; Lts. Buckely, McLanahan, Weatherhead, Holden, Knowles, Butz, Hall, Eoff, Curtis, Heinrichs, Proudfit, Taylor; Lt. Eoff returned immediately with motor trouble; patrol sighted one enemy plane too far away to attack.

2) Patrol 11 h 50 to 13 h 35; 2 planes; altitude 3800 meters; line—St. Benoit-sur-Woevre to Watronville; Lts. Knowles and Gravatt; Lt. Gravatt sighted an enemy balloon at Xonville.

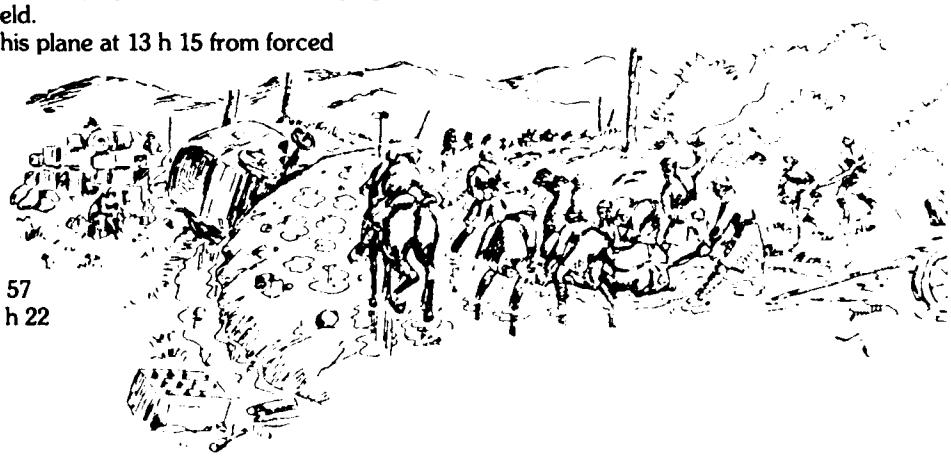
3) Patrol 15 h 40 to 17 h 20; 10 planes; altitude 3500 meters; Line—Etang-de-Lachaussee and Fresnes by way of Verdun and Etain; Lts. McLanahan, Curtis, Sewall, Knowles, Gravatt, Eoff, Heinrichs, Hall, Taylor, and Proudfit; Lt. Proudfit landed immediately with motor trouble; patrol observed two enemy balloons, one in small woods N.E. of Chambley, the other near St. Jean les Suzy; Lt. Gravatt reports seeing 2 trenches with barbed wire entanglements in front, from Lachaussee to Jonville to Harville, to Maizeray; one E.A. biplace sighted which disappeared immediately into enemy territory.

1) Special Mission 11 h 05 to 11 h 15; 1 plane; Lt. Sewall; ferrying new plane from Vavincourt to field.

Note—Lt. Curtis brought back his plane at 13 h 15 from forced landing of Sept. 13.

Summary

a) Sorties 27
b) Trials 2
d) Pilots available 20
e) Total pilots 20
j) Total planes 25
k) Available planes 22
l) Total flying hours 33 h 57
m) Total service hours 32 h 22
o) Patrols 3
r) Special missions 1
s) Planes dropped 0
t) Planes received 1



Edward Butts Jr.
1st Lt. AS USA
Operations Officer

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Operations Office
147th Aero Squadron
American E.F.
September 15th, 1918

Daily Report No. 99 Dawn to 18 h.30

1. Patrol, 8 planes, Lieuts. Brotherton (leader), Jones, O'Neill, Simonds, Muther, K. L. Porter, Willard and Love. Altitude 3,500 meters. Visibility very good. Mission. Patrol lines between Chatillon-sous-les-Cotes to Etang-de-Lachaussee. Time 9 h. 30 to 11 h. 20.

Lieut. Brotherton reports sighting 20 E.A. planes at about 10 h.15 north of Pont-a-Mousson at an altitude of 3,500 meters. Many groups of Allied planes seen. Three E.A. balloons are located about 5 kilometers N.W. of Mars-la-Tour and all very close to other in a group. Many fires observed from Briey, Conflans and Chambley.

Lieut. O'Neill reports observing 11 E.A. at 10 h.00 to 10 h.15 North of Conflans at an altitude of 3,000 meters and parallel to lines. Observed three E.A. two-seaters in region of Jonville at about 10 h.45 at an altitude of 1,000 meters. Little activity along lines. Town of Allamont under shell fire. Cities along Moselle River, Briey and region E. and N. still burning, as was reported last evening.

Lieut. Muther reports observing 6 E.A. going N.E. parallel to lines in vicinity of Conflans at about 10 h.15, flying at an altitude of about 4,000 meters. Many small fires along Moselle River. One enemy balloon observed in vicinity of Villers-sous-Pareid.

Lieut. E. A. Love has not yet returned from this patrol, nor has word been heard of his whereabouts.

2. Protection patrol, 5 planes, Lieuts. Jones (leader), Willard O'Neill, Simonds and Brotherton. Altitude 3,000 meters. Visibility good. Mission: Protection for five Salmsons from the 99th Squadron. Route: Followed Hindenberg Line going Northwest. Starting at Lachaussee and going as far as Fresne-en-Woevre. Time: 14 h. 15 to 15 h. 36. Mission successful. Nothing to report.

3. Voluntary patrol, 1 plane, Lieut. Dowd. Time: 15 h.50 to 15 h.55. Mission: Go after E.A. sighted in vicinity of airdrome. Lieut. Dowd was forced to return immediately as he was having engine trouble. Nothing to report.

Summary

a)	Sorties	14
b)	Trials	0
c)	Combats	0
d)	Pilots available	18
e)	Total pilots	21
f)	Pilots missing	1
g)	Pilots wounded	0
h)	Enemy planes confirmed	0
i)	Enemy planes unconfirmed	0
j)	Total planes	25
k)	Available planes	18
l)	Total flying hours	16 h.30
m)	Total service hours	15 h. 45
n)	Alerts	0
o)	Patrols	1
p)	Protection patrols	1
q)	Voluntary patrols	0
r)	Special missions	0

s) Planes dropped 0
t) Planes received 0

By order of Lieut. James A. Meissner

George J. Brew
1st Lieut., Air Service, U.S.A.
Operations Officer

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147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Very good
Mission: Patrol
Route Actually Followed: Chatillon-sous-les-Cotes, Etange-de-Lachaussee, Chambley, and vic. Pont-a-Mousson
Names of Pilots on Patrol and Leaders: Lts. Brotherton (leader), Jones, O'Neill, Simonds, K. L. Porter, Love & Willard

Hour of Departure	Hour of Return	Altitude	Squadron	Date
9h.30	11 h.20	3500 to 4500 meters	147th	Sept. 15

Number of E.A. Seen: 20 Time: 10 h.15
Number of E.A. Encountered:
None Time:
Type: Unknown Altitude: 3500 meters
Region: North of Pont-a-Mousson Combats:
Number of Rounds Fired: None Confirmation Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:
Detailed Reports of Pilots and Other Observations:

About 20 E.A. planes were sighted at about 10 h.15 north of Pont-a-Mousson at an altitude of about 3500 meters. Many groups of Allied

planes were seen. Three E.A. balloons were located about 5 kilometers N.W. Mars-la-Tour and very close together in a group. Many fires observed from Briey, Conflans, and Chambley.

W. E. Brotherton
2nd Lt. Air Service, USA

Observed 11 E A. at 10 h.00 to 10 h.15 north of Conflans flying at an altitude of 3000 meters and parallel to lines. Observed three E.A. two-seaters in region of Jonville at about 10 h.45 at an altitude of 1000 meters. Little activity along lines, town of Allamont under shell fire. Cities along Moselle River, Briey an region E. and N. still burning, as I reported last evening.

R. A. O'Neill
2nd Lt. Air Service, USA

About 6 E.A. sighted going N.E. parallel to lines in vicinity of Conflans at about 10 h.15 flying at an altitude of about 4000 meters. Many small fires along Moselle River.

One enemy balloon observed in vicinity of Villers-sous-Pareid.

W. P. Muther
1st Lt. Air Service, USA

George J. Brew
1st Lt. Air Service, USA
Squadron Operations O

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First Pursuit Group
Operations Office
Sept. 15th, 1918

Report of Operations.

1. Atmospheric conditions. Sky clear all day, getting hazy towards evening.

2. Enemy Aerial Activity.

(a) Airplanes. Considerable activity all along the lines of this sector throughout the day, many patrols encountered especially in formations of nine (9). Especially active in the left.

(b) Balloons. Several balloons reported in ascension. Planes were immediately dispatched to destroy them, but were only successful in seeing them hauled to the ground.

(c) A.A.A. Rather active and accurate in the vicinity of Etain, and in the vicinity of Etang-de-Lachaussee.

3. Activity of our own aviation.

(a) 1 Patrol. 5 h 50 to 7 h 40, 11 planes 3500 meters to 5500 meters. Chatillon to Etang-de-Lachaussee. 27th Squadron. See reconnaissance report attached.

1 Patrol. 7 h 00 to 8 h 35, 12 planes, altitude 3500 meters. Chatillon to Etang-de-Lachaussee. 95th Squadron. Nothing to report.

1 Patrol. 9 h 30 to 11 h 20, 8 planes, altitude 3500 to 4500 meters Chatillon to Etang-de-Lachaussee. 147th Squadron. See Reconnaissance report attached. Lt. Love has not yet returned.

1 Patrol. 10 h 45 to 12 h 05, 8 planes, altitude 3500 meters. Chatillon to Etang-de-Lachaussee. 27th Squadron. See reconnaissance report attached.

1 Patrol. 11 h 50 to 13 h 35, 2 planes, altitude 3800 meters. St. Benoit-sur-Woevre to Watronville. Nothing to report.

1 Patrol. 12 h 56 to 14 h 25, 2 planes, altitude 5300 meters. Chatillon to Etang-de-Lachaussee. 94th Squadron. Nothing to report.

1 Patrol. 15 h 40 to 17 h 20, 10 planes, altitude 3500 meters. Etang-de-Lachaussee and Fresnes by the way of Verdun and Etain. 95th Squadron. Nothing to report.

1 Patrol. 15 h 47 to 17 h 22, 12 planes, altitude 4000 meters. Etang-de-Lachaussee and Fresnes by the way of Verdun and Etain. 94th Squadron. See reconnaissance report attached.

1 Patrol. 16 h 20 to 18 h 00, 12 planes, altitude 3000 meters. Woel, Etain. 27th Squadron. See reconnaissance report attached.

(b) 1 Protection Patrol, 8 h 49 to 10 h 21, altitude 4000 meters. Xonville, Hattonville, Jonville, St. Hilaire. For 2nd. Corps (French). 94th Squadron. See reconnaissance report attached.

1 Protection Patrol. 14 h 15 to 15 h 35, altitude 3000 meters. Lachaussee to Fresnes-en-Woevre. For the 99th Squadron. 147th Squadron. Nothing to report. Mission successful.

(c) 1 Voluntary Patrol. 7 h 16 to 8 h 50, 1 plane, altitude 3000 meters. Chatillon to Etang-de-Lachaussee. 94th Squadron. See reconnaissance report attached.

1 Voluntary Patrol. 15 h 50 to 15 h 55, 1 plane, altitude 1000 meters. E.A. sighted in vicinity of airdrome. 147th Squadron. Nothing to report.

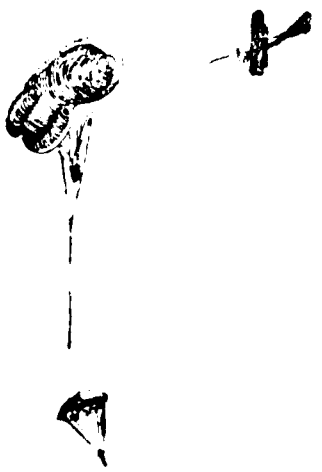
4. Miscellaneous Lt. Cook of the 94th Squadron reported as missing in our operations report of the 10th of Sept. returned in the airdrome yesterday Sept. 14th.

Group Summary.

(a)	Sorties	98.
(b)	Trials	3.
(c)	Combats	5.
(d)	Pilots Available	76.
(e)	Total Pilots	80.
(f)	Pilots missing	1.
(g)	Pilots wounded	0.
(i)	Enemy planes Uncon.	4.
(j)	Total Planes	99.
(k)	Planes Available	64.
(l)	Total flying hours	132 h 44.
(m)	Total service hours	129 h 14.
(o)	Patrols	9.
(p)	Protection Patrols	2.
(q)	Voluntary Patrols	2.
(s)	Planes dropped	1.
(t)	Planes received	1.

	27th	94th	95th	147th
Pilots on hand	19	20	20	21.
Pilots Available	19	19	20	18.
Planes on hand	25	24	25	13.
Planes Available	15	14	22	18.

Romer Shawhan
1st Lieut. A.S.U.S.A.
Group Operations Officer



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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: Patrol

Route Actually Followed: Toul, Beaumont, Pont-a-Mousson, Corny, Puxieux, Vaux, Pont-a-Mousson, Corny, Toul.

Names of Pilots on Patrol and Leaders: Lieut. Stovall (Leader), Guthrie, Hays, Armstrong, McAteer, Bartron, Seerley, Este, Richards, Brewer, Elliott, Major Spatz, Lieuts. Brodie, Stiles, Howe, Billard, Captain Riddle

Hour of Departure	Hour of Return	Altitude	Squadron	Date
9:00	11:00	5200	13th	Sept. 15

(1) (9) (7)

Number of E.A. Seen: 17 Time: 9:00—10:10—10:20

Number of E.A. Encountered: 14 Time: 9 at 10:10 and 5 at 10:30

Type: Fokkers, monoplace Altitude: 5000 meters

Region: at 10:10 Vaux, at 10:30 Corny Combats: 10

Number of Rounds Fired: 970 Confirmations Requested: 4

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: 4 Allied:

Planes Seen to Have Gone Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled To Share in Confirmation:

Lieut. Hays, Stovall, Brewer, and Major Spatz.

Detailed Report of Pilots and Other Observations:

Captain Biddle was leading patrol but left on account of motor trouble. Lieut. Stovall took lead. Lieuts. Elliott, McAteer, Brodie, Armstrong, Billard, Guthrie, Este left patrol on account of motor trouble.

At 10:10 patrol encountered 9 Fokkers biplane region of Vaux. Our altitude 5200 meters. E.A. altitude 5000 meters. Lieut Hays fired 400 rounds at close range on one E.A. Lieut. Guthrie 45 rounds at same E.A. E.A. seen to go down out of control. Confirmation requested.

Lieut. Brewer fired 50 rounds at one E.A. No confirmation.

Lieut. Stovall fired 75 rounds at from 75 to 30 meters at each of three different E.A. One was seen to have gone down out of control. Confirmation requested.

Maj. Carl Spaatz (on early photo taken as a 2d Lt.) rose in rank to become USAF's first Chief of Staff in 1947. (After World War I he added an "a" in the spelling of his name.)

Major Spatz dove on two different E.A. firing 50 rounds at close range at each. One seen to go down out of control. Confirmation requested.

Second Combats. Lieut. Stovall returned to meeting place over Pont-a-Mousson and was joined there by Major Spatz. Returned to enemy lines at Corny and encountered 5 Fokkers altitude 4600 meters. Our altitude 4800 meters. Lieut. Stovall attacked one Fokker at range of 75 to 50 meters firing 100 rounds. No confirmation requested. Major Spatz remained above to protect against 2 Fokkers at altitude of 5000 meters. Individual pilots reports of combat with this report.

Wm. H. Stovall
1st Lieut. A.S.U.S.A.

At 10:10 near Vaux at 5000 meters I saw one brown Fokker and 9 red Fokkers in the distance of 5000 meters. The brown Fokker tried to lead me under the other 9 Fokkers but I pulled off and he then came back under me again. I opened fire and kept him from going under the other 9 Fokkers following him down to 1000 meters in a slow spiral firing all the time until I got nearly under the 9 Fokkers. I pulled off and when he was last seen he was going down in a straight nose dive. Confirmation requested.

Frank K. Hays
2nd Lieut. A.S.U.S.A.

When patrol encountered 9 Fokkers at 10:10 over Vaux, Fokkers with red wings and varicolored fuselages peaked vertically toward me below and fired about 50 rounds. Had to pull up and never saw the Fokker again. Right after this peaked on another Fokker from above and behind and both guns refused to fire. Pulled up, cleaned jams and then became separated from patrol and almost over Metz. Started for our lines climbing to about 5500 meters. Saw formation of 7 Fokkers, green and dark colored with black crosses. Piqued on one of them and fired about 100 shots at close range. Observed some tracers make direct hits. Was then fired at by one of the other Fokkers and pulled up towards our lines. This was about over Rembercourt at 10:30. Saw plane going straight down, but had to pull up and did not see anything more. Confirmation requested.

L. Brewer
1st Lieut. A.S.U.S.A.

Patrol encountered 5 Fokkers. Dove on one Fokker and fired about 50 rounds. No result. Gun jammed. Fixed guns and dove on another. Fired about 50 rounds. Tracers seen to enter pilot's seat.

Plane seen to fall out of control. Left fight to fix jams. Lost patrol. Returned to lines. Met plane #15. Returned over lines with this plane. Encountered 7 Fokkers at Corny at 10:30. Plane 15 dove on 5 Fokkers. I remained at altitude to observe two Fokkers above the 5 Fokkers. Maneuvered for position and altitude, with no result so returned to airdrome.

Carl Spatz
Major, A.S. Army

After passing Pont-a-Mousson was forced to turn back due to inability to attain altitude of patrol. Circled Pont-a-Mousson from 9:45 to 10:10 when I patrolled to line west of Thiaucourt picking up two formations but never penetrating far enough into lines, since I had been out

nearly an hour and a half. A Spad patrol passed over my head north of Thiaucourt, region Charey, Dampvitoux and turned to find 8 Fokkers peaking on me, all 3600 meters. No rounds fired. I gained lines west of Pont-a-Mousson and continued towards field. Sighted a biplace east of river at 9:40 out of sector.

E. F. Richards
1st Lieut. A.S.U.S.A.

At 10:10 dove on red Fokker as Lieut. Stovall dove on brown one. Put one burst around him and pulled up to regain height and position. Pressure system gave out so I headed for Pont-a-Mousson on Nourrice. Circled for a minute with two other Spads but combat was going to low altitude. Continued to Pont-a-Mousson. There picked up lone straggling French Spad patrol and pressure returning, flew with them to Joinville. Here pressure system quit again so dove for home.

D.W. Howe
1st Lieut. A.S.U.S.A.

Saw one biplane Fokker painted brown at about 10:10 over Vaux. 5200 meters. Leader attacked and myself followed, firing three bursts of about 15 shots each. Looking up saw formation of about 9 Fokkers with red front end of fuselage and wings and white tails. Pulled up to gain altitude and attack with rest of patrol, when leak started in water tank and engine heated to 100 degrees. Was forced to return to field.

M. K. Guthrie
1st Lieut. A.S.U.S.A.

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: Protection for Salmson #5 1st Aero Sqdn.

Route Actually Followed: Toul—Pont-a-Mousson—Eply—Louvigny—Lorry—Preny—Toul.

Names of Pilots on Patrol and Leaders: Lt. Sperry (leader) Lts. Little, Agar, Tyndall, Kimber, Beane, Tucker, Hudson, La Force, Capt. Bridgman.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
9:25	11:30	5000 M	22nd	Sept. 15.

Number of E.A. Seen: Twenty Time: 9:50-11:00
Number of E.A. Encountered: None Time:
Type: Fokkers Altitude: 5200 M
Region: Preny-Lorry Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Pilot of Salmson made a sudden turn while some boche were chasing us and I lost him. I knew his route so I patrolled it until 11.15. I saw one plane on the ground south of Pont-a-Mousson apparently in good condition, character undetermined. Salmsons returned safely, our mission successful.

Fokkers were black and grey with white stripes. Saw numerous fires presumably Vandieres and Preny.

J. A. Sperry
1st Lt. A. S. U.S.A.

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Headquarters 2nd Pursuit Group
1st Pursuit Wing

Report of Operations #79

From 17 h 00 Sept 14th to 17 h 00 Sept 15th, 1918.

1. Patrols
    1. Pont-a-Mousson, Norroy, Prexieur-Maux, Norroy
    9 h 00-11 h 05
    2000-3000 meters
    17 planes 13th
    Combat. See pilot's report.

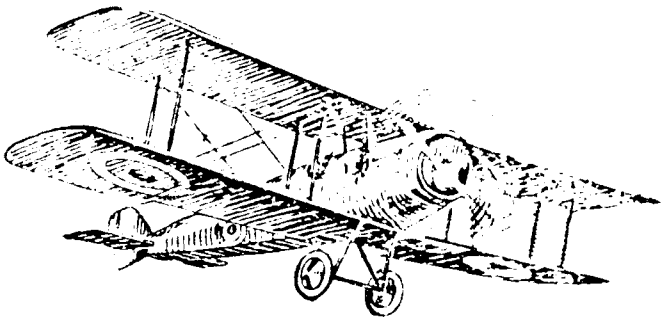
2. Toul, Pont-a-Mousson, Lachaussee, Toul
   9 h 02-11 h 00
   3000-5200 meters
   14 planes 49th
   See pilots' report
3. Nancy, Vuxieux, Ancy, Dampvitoux
   10 h 43-12 h 40
   4000 meters
   10 planes 139th
   Nothing to report
4. Toul, Arnaville, Toul
   9 h 51-11 h 05
   5000 meters
   1 plane 49th
   Saw 4 Rumplers. Unable to reach them.

II. Protections
1. Toul, Pont-a-Mousson, Epley, Flavigny, Preney
   9 h 25-11 h 30
   5000 meters
   11 planes 22nd
   Saw 20 EA mostly Fokkers. Mission accomplished.

III. Alerts
None

IV. Trials
1. 13 h 50-14 h 30
   1 plane 49th
   Testing
2. 17 h 37-17 h 50
   1 plane 49th
   Testing
3. 18 h 05-18 h 30
   1 plane 49th
   Testing
4. 18 h 30
   4 planes 13th
   New planes arriving
5. 19 h 10-19 h 20
   1 plane 13th
   Testing
6. 9 h 01-10 h 00
   1 plane 49th
   Testing
7. 11 h 13-11 h 15
   1 plane 49th
   Testing

8. 11 h 15-11 h 30
   1 plane 22nd
   Testing
9. 12 h 40
   1 plane 139th
   New plane arriving
10. 11 h 10
   1 plane 13th
   New plane arriving
11. 14 h 10
   1 plane 22nd
   New plane arriving
12. 15 h 55-16 h 00
   1 plane 49th
   Testing



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28th Aero Pursuit Sqdn.
Third Pursuit Group
Operations Office
Sept. 15th, 1918

Daily Operations Report

Protection Patrols.

1. 12:35 to 14:35. 6 planes, 28th Sqdn. Route: Vaucouleurs, Lachaussee, Thiaucourt, Lachaussee, Vaucouleurs. Altitude 3500 meters. Lts. Merrick, Greenhalgh, Smith, Allein, Bell, Moriarty. Mission: To furnish protection for two Liberties from the 135th Squadron. Mission successful. See reconnaissance report. Flying time 12:00.

Special mission:

10:45 to 11:25. One plane, 28th Squadron. Mission to attack enemy balloon N.E. of Chambley. Mission successful. Lt. Turnure. No balloons observed in ascension. Flying time 1:40.

Trials:

1. 17:15 one new plane #7625 from Colombey-les-Belles
2. 18:30 one new plane #7609 from Colombey-les-Belles
3. 10:50 to 11:15 one plane testing.
4. 12:35 to 12:40 one plane testing.
5. 13:00 to 13:15 two planes testing

Summary:

Sorties	13
#No. Pilots available	22
Total planes	26
Available planes	11
Total flying hours	15:10
Total service hours	13:40
Protection patrols	1
Special missions	1
#No. Pilots assigned	22
Trials	6

#Number not including Commanding Officer.

By order of Lt. Jones

A.B. Hill, 2nd Lt. A.S. U.S.A.
Operations Officer

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28th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: Protection for 135th Squadron.

Route Actually Followed: Vaucouleurs, Lachaussee, Thiaucourt, Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lt. Merrick. Pilots: Lts. Bell, Moriarty, Greenhalgh, Allein and Smith.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:35	14:35	3500 meters	28th	9/15/18

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:
Mission accomplished.

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28th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good
Mission: Patrol
Route Actually Followed: Vaucouleurs, Void, St. Mihiel, Fresnes, Arnaville, Vaucoulers.
Names of Pilots on Patrol and Leaders: Lt. Cassady. Pilots: Lts.Jones, Hardy, Merrick, Merrill, Greenhalgh, Turnure, Bell, Moriarty, Jebb, Philbrick.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
17:25	19:25	2500 to 3500 meters	28th	9/15/18

Number of E.A. Seen: 4 and 7 Time: 18:10 and 18:25
Number of E.A. Encountered: 4 Time: 18:10
Type: Fokker Altitude: 3500 meters
Region: Mars-la-Tour Combats: 1
Number of Rounds Fired: 25 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control E.A.: Allied:
Markings on E.A.:
In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:
At 18:10 at altitude of 3000 meters over Mars-la-Tour saw four Fokkers flying at 3500 meters. Lt. Cassady climbed to attack and fired 25 rounds at the leader. He pulled into a stall, viraged and got on Lt. Cassady's tail. Fokker then climbed gaining height faster than our Spads and fled back into Germany.

At 18:25 saw formation of seven other Fokkers.
Lt. Jones landed en panne at Second Pursuit Group. Lt. Philbrick en panne at Boncourt.
Lts. Moriarty, Greenhalgh and Bell returned with motor trouble.

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93rd Aero Pursuit Squadron
Third Pursuit Group
Operations Office
September 15th, 1918

Daily Operations Report

I. Special Missions
1. 10:25—12:05 9 planes, 93rd Squadron, Route: Vaucouleurs—Pont-a-Mousson—Rembercourt—Thiacourt—Vaucouleurs—Altitude: 3500 meters. See Reconnaissance report. Lt. Wright, D'Olive, Fuller, Carruthers, Evans, Ball, Lindsley, Merz and Harding.
2. 14:05—15:20 3 planes 93rd Squadron. Route: Vaucouleurs—Pont-a-Mousson—Rembercourt—Gorze—Lorry—Pont-a-Mousson—Vaucouleurs. See Reconnaissance report. Lts. D'Olive, Patterson, Fuller.

II. Trial Flights
1. 17:30-18:00 1 plane, Lt. Fuller, testing.
2. 18:00 1 new plane arrived from Colombey-les-Belles
3. 11:00-11:25 1 plane Lt. Rummell, testing.
4. 16:50-16:35 1 plane Lt. Barry, testing.
5. 12:40 1 plane Lt. Merz, arrived from forced landing Orches.

III. Summary

Sorties	17
Trials	5
*Pilots available	20
Total planes	25
Available planes	15
Total flying hours	10:15
Total service hours	9:00
Special Missions	2
*Pilots assigned to Squadron	21

*Not including Commanding Officer

By order of Major Huffer

Earl W. Martin
2nd Lt. A.S., U.S.A.
Operations Officer

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: To attack and destroy balloon 1 kilometer south Chambley.

Route Actually Followed: Vaucouleurs—Pont-a-Mousson—Rembercourt—Thiaucourt—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Wright, D'Olive, Fuller, Carruthers, Evans, Ball, Lindsley, Harding, and Merz.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
10:25	12:05	5500 M	93rd	Sept. 15th,-18

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Special mission to attack and destroy enemy balloon one kilometer south of Chambley failed due to the facts:

1. The leader and two others had spark plug and gun trouble.
2. The deputy leader had broken water pump.

Two planes had gun trouble.

Three planes, none mounted with 11 mm guns for balloon attack, made a patrol, but nothing to report.

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: To attack and destroy balloon near Lorry.

Route Actually Followed: Vaucouleurs—Pont-a-Mousson—Rembercourt—Gorze—Lorry—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. D'Olive, Patterson, and Fuller (Lieut. Tobin, 103rd Squadron, accompanied this patrol)

Hour of Departure	Hour of Return	Altitude	Squadron	Date
14:05	15:20	2500 M	93rd	Sept. 15th -18

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Protected by the patrol, Lieut. Tobin, 103rd Squadron, attacked a balloon in the region of Lorry. At this time, the other pilots observed five machines above them about 1500 meters, which after several minutes, they recognized as Spads. While watching it they lost sight of Lieut. Tobin and the balloon and saw neither afterwards. (See also Lieut. Tobin's Report, 103rd Squadron.)

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Fair

Mission: Patrol

Route Actually Followed: Vaucouleurs—Pont-a-Mousson—Louvigny —Corny—Chambley—Charey—Thiaucourt—Pont-a-Mousson— Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Rummell, Wright, Case, Hartman, Merz, Cox, Evans, Ball, Fuller, and Lindsley.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
17:30	19:15	4000 M	93rd	Sept. 15th-18

Number of E.A. Seen: 11 Time: 18:15

Number of E.A. Encountered: 8 Time: 18:15

Type: Fokker Altitude: 4500 meters

Region: Charey Combats: One

Number of Rounds Fired: 400 Confirmations Requested: One

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: 1 Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Lieuts. Wright and Lindsley

Detailed Report of Pilots and Other Observations:

Lieutenants Wright and Lindsley report the following: At 18:15 in the region of Charey east of Lake Lachaussee our patrol encountered eight or more Fokker D.7 planes painted black. Lieut. Rummell leading turned towards the Boche who had an advantage in altitude. From then on there was a general fight in which Lieuts. Evans, Case, Rummell, Lindsley and Wright took part. Lieut. Wright was able to get in fifty shots with each gun at a range of approximately 150 meters. Another Boche being on his tail prevented continuance of attack, as he pulled away the enemy plane seemed to be out of control. Lieut. Lindsley followed him down for several hundred meters firing at close range. The E.A. was last seen about 150 meters from the ground rolling out of control in a fast half turning nose dive. Lieut. Lindsley followed no further for he believed his help needed above. In a few minutes more the E.A. retreated into Germany to the north.

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Operations Office
103rd Aero Pursuit Squadron, S.C.
Third Pursuit Group
1st Pursuit Wing, 1st Army
September 15th, 1918

Daily Operations Report

I. Special Missions.

1. 10.20-12.05—9 planes, 103rd Squadron, Route, Vaucouleurs—Pont-a-Mousson—Vaux—Chambley—Hadonville—Pagny—Vaucouleurs. Altitude, 2500 Meters. See reconnaissance report. Captain Rockwell, Lieutenants Tobin, Ponder, Pyne, Hunter, Irving, Waddell, and Monroe, and Captain Soubiran.

2. 14.20-15.45—1 plane, 103rd. Squadron, Route, Vaucouleurs—Pont-a-Mousson—Lorry—Vandieres—Marly-aux Bois—Vaucouleurs. Altitude, 400 Meters. See reconnaissance report. Lieut. Tobin.

II. Trial Flights.

1. 17.25—1 plane arrived from Colombey-les-Belles Lieut. Kirtland, #4570.

2. 17.35—1 plane arrived from Colombey-les-Belles Lieut. Cauffman, #7644.

3. 16.10-16.25—1 plane. Lieut. Cannon, testing.

4. 16.45—1 plane arrived from forced landing at Toul Lieut. Waddell.

III. Summary

Sorties	14.
Trials	4.
Pilots Available	18.
Total planes	25.
Available planes	10.
Planes crashed	1.
Planes not returned	3.
Total Flying Hours	14.40
Total Service Hours	13.40
Special Missions	2.
#Pilots assigned to Squadron	22.

#Not including the Commanding Officer.

By order of Captain Rockwell,

H. V. Bell
1st. Lieut. A. S. U. S. A.
Operations Officer

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103rd Aero Squadron

Reconnaissance Report

Visibility Near Lines:

Mission: Special Mission to attack balloon 1 kilometer S.E. of Chambley.

Route Actually Followed: Vaucouleurs—Pont-a-Mousson—Chambley—Hadonville—Pagny—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Capt. Rockwell, Capt. Soubiran, Lieutenants Tobin, Ponder, Pyne, Hunter, Irving, Wardwell, and Monroe.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
10:20	12:05	2500 M.	103d	Sept. 15, 1918.

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude:

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lieut. Tobin reports: Between 10.40 and 11.30 there were no balloons in ascension in the region of Chambley.

Lieut. Ponder reports: Saw two Fokker monoplace machines flying toward the lines south of Briey and two more enemy planes flying south just north of Metz. All four planes turned and flew back into Germany.

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103rd Aero Squadron

Reconnaissance Report

Visibility Near Lines:

Mission: Special Mission to attack balloon at Lorry.

Route Actually Followed: Vaucouleurs—Pont-a-Mousson—Lorry—Vandieres—Marly-aux-Bois—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieut. Tobin.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
14:20	15:45	400 M.	103rd	Sept 15th, 1918.

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lieut. Tobin reports: Saw no balloon at Lorry. Attacked balloon at Marly-aux-Bois at 15.22, altitude 400 meters. Forced observer to jump. Fired about 150 rounds and it was then pulled down to 150 meters. Saw some of my incendiaries hit the balloon but it did not take fire.

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Third Pursuit Group
Operations Office
213th Aero Pursuit Squadron
September 15th, 1918

Daily Operations Report

I. Trials
1. 17:05-17:15 1 plane, Lt. Ogden, arriving new.
2. 17:25-17:35 1 plane, Lt. Munn, arriving new.
3. 8:05- 8:35 1 plane, Lt. Hambleton, testing.

II. Summary

Sorties	3
Trials	3
*Pilots available	20
Total planes	26
Available planes	14

Total flying hours	50 minutes
*Pilots assigned to squadron	22

*Not including Commanding Officer

By order of Lt. Hambleton

E. Norman Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

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213th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: Patrol

Route Actually Followed: Vaucouleurs, St. Mihiel, Pont-a-Mousson, Fresnes, Chambley

Names of Pilots on Patrol and Leaders: Lts. Grey, W. F. Loomis, H. S. Loomis, Hoffman, McAlpin, Richardson, Ogden, Gaillard, Hambleton

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:15	18:15	2500 M	213th	Sept 15th, 1918

Number of E.A. Seen:	Time:		
Number of E.A. Encountered:	Time:		
Type:	Altitude:		
Region:	Combats:		
Number of Rounds Fired:	Confirmations Requested:		
Planes Seen to Have Gone Down in Flames.		E.A.:	Allied:
Planes Seen to Have Crashed on Ground.		E.A.:	Allied:
Planes Seen to Have Gone Down Out of Control.		E.A.:	Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Lt. Grey reports seeing enemy balloon go down in flames in region of Allamont at 17:00 o'clock.

Lt. Hambleton reports seeing a machine go down in flames in region of Chambley at 17:10.

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 15th, 1918

Operations Report Number 41

I. Protection Patrols

1. 12:35-14:35. 6 planes, 28th Squadron, Route: Lachaussee, Thiaucourt, Lachaussee, Thiaucourt, Lachaussee, Thiaucourt. Altitude 3500 meters. See Reconnaissance report.

II. Special Missions

1. 10:25-12:05. 8 planes, 103rd Squadron, 1 plane, Captain Soubiran, Headquarters, 1 plane, Lieut. Turners, 28th Squadron. Route: Pont-a-Mousson, Chambley, Pagny. Altitude 2500 meters. See Reconnaissance report.

2. 10:25-12:05. 9 planes, 93rd Squadron. Route: Pont-a-Mousson, Rembercourt, Thiaucourt. Altitude 3500 meters. See Reconnaissance report.

3. 14:05-15:20. 3 planes, 93rd Squadron, 1 plane, 103rd Squadron. Route: Pont-a-Mousson, Rembercourt, Gorze, Lorry, Pont-a-Mousson. Altitude 2500 meters. See Reconnaissance report.

W. Thaw
Major, A.S., U.S.A.
Commanding

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 15th, 1918

Form Number 1 Pursuit

	28th	93rd	103rd	213th	Hdq.	Total
Sorties	13	17	14	3	1	48
Trials	6	5	4	3		18
Pilots enrolled	22	21	22	22		87
Pilots available	22	20	18	20		80

	28th	93rd	103rd	213th	Hdq.	Total
Pilots killed						
Pilots missing						
Pilots wounded						
Enemy planes confirmed						
Enemy planes unconfirmed						
Total Planes	26	25	25	26	1	103
Available planes	11	15	10	14	1	51
Planes crashed			1			1
Planes lost in enemy lines						
Planes not returned			3			3
Total flying hours	15:10	20:00	18:10	:40		54:00
Total service hours	13:40	18:45	17:10			49:35
Exercises						
Target practice						
Alerts						
Patrols						
Protection patrols	1					1
Special Missions		2	1			3
Bombing raids						
Bombs dropped						

Pilot Lieut. Fish, 213th Squadron, unofficially reported to be in hospital with wounds. Lieut. Fish was previously reported missing.

W. Thaw
Major, A.S., U.S.A.
Commanding

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11th Aero Squadron

Raid Report

Visibility: Very Good
Objective: R. R. Between Onville, Arnaville
Route Actually Followed: Moselle river
Number of Teams Participating:
Names of Leaders:

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11:00	13:00	10.000	11	Sept 15th

Number of E.A. Seen: Seven Time: 12:10
Number of E.A. Encountered: Time:

Type: Austrian | Altitude: 10.000
Region: Onville | Combats:
Number of Rounds Fired: | Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 8 Type: 155 M/m 50 kilos
Bursts Were Observed at: Midway between Onville and Arnaville very close. South of R.R. Highway.
Remarks on Enemy-Aircraft Artillery: Quite active but not accurate
Remarks on Enemy Airplanes: Looked like Spads Muddy brown color
Other Observations: Congested truck traffic on road near objective and way from Arnaville to Metz. Many observation balloons.

Clair B. Laird
2nd Lieut. A.S.U.S.A.
Squadron Operations Officer

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11th Aero Squadron

Raid Report

Visibility: Good
Objective: Longuyon
Route Actually Followed: Neufchateau, Bar-le-Duc, Obj and return
Number of Teams participating: 9 teams started
Names of Leaders: Lt. Chapin (pilot) Lt. Laird (obsr)

Hour of Departure	Hour of Return	Altitude	Squadron	Date
15:10	17:05	14.000	11	Sept 15

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude:
Region: Combats:
Number of Rounds Fired: 1,000 Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 8 Type: 155 M/m 50 kilos
Bursts were Observed at: None observed
Remarks on Enemy-Aircraft Artillery: Few. Had altitude but not range
Remarks on Enemy Airplanes:
Other Observations: Fired at Observation balloons near Damvillers.

Clair B. Laird
2nd Lt. A.S.U.S.A.
Squadron Operations Officer

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20th Aero Squadron

Raid Report

Visibility: Very Good
Objective: Bayonville
Route Actually Followed: Nancy, Pont-a-Mousson, Bayonville Thiaucourt, Toul, Amanty
Number of Teams Participating: 10 teams left the field. 4 reached the objective
Names of Leaders: Lieut. C. G. Sellers (P) 1st Lt. E. A. Parrott (O) leaders.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11:05 a.m.	12:40 p.m.	11000 ft.	20	Sept 15/18

Number of E.A. Seen: Nine Time:
Number of E.A. Encountered: Nine Time:
Type: Fokker Altitude: 11000
Region: Avrainville [?] Combats: One
Number of Rounds Fired: 42 Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 16-50 kgs Type: 155m/m Demol. Total: 800 kilos

Bursts were Observed at: One burst cut road leading south from Bayonville.

Remarks on Enemy-Aircraft Artillery: Heavy and accurate from Bayonville to Avrainville.

Remarks on Enemy Airplanes:

Other Observations: 10 planes left field—1 plane crashed. Lieut. C. C. Stephens killed and Lieut. J. J. Louis seriously injured. Four planes reached the objective. All others returned or were accounted for.

Charles H. Konantz
2nd Lieut., A.S., U.S.A.
Squadron Operations Officer

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20th Aero Squadron

Raid Report

Visibility: Very Good

Objective: Longuyon

Route Actually Followed: Amanty, Bar-le-Duc, Verdun, Longuyon, Verdun, St. Mihiel, Amanty

Number of Teams Participating: One team [six] started and six [one] reached the objective.

Names of Leaders: 1st Lieut. C. G. Sellers, (P) 1st. Lt. E. A. Parrott, (0) Leaders.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
15:15	17:15	14000 ft	20	Sept 15/18

Number of E.A. Seen: 1 Time: 16:55

Number of E.A. Encountered: 1 Time: 16:55

Type: Biplane | Altitude: 12000 ft.
Region: | Combats:
Number of Rounds Fired: 200 | Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 4-50 kg Type: 155 m/m Demol. Total: 200 kilos

Bursts were Observed at: On the hill east of Yards, Longuyon

Remarks on Enemy-Aircraft Artillery: Fairly heavy and accurate between Verdun and Longuyon

Remarks on Enemy Airplanes: Enemy Airdrome southwest of Longuyon fairly active. Tee out and 5 or 6 planes on the ground.

Other Observations: One train on the track leading Northwest from Longuyon.

Charles H. Konantz
2nd Lt. A.S., U.S.A.
Squadron Operations Officer

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96th Aero Squadron

Raid Report

Visibility: Good

Objective: Arnaville

Route Actually Followed: Toul, Pont-a-Mousson, Arnaville, Toul, Amanty.

Number of Teams Participating: 7. 6 reached the lines

Names of Leaders: Lt. Anderson—Thompson, H.S.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11:00	13:00	4200 M	96th	9/15/18

Number of E.A. Seen: 9 Time: 12:15

Number of E.A. Encountered: 9 Time: 12:15

Type: Fokkers | Altitude: 4000 Meters

Region: East of Arnaville | Combats: 1

Number of Rounds Fired: 520 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 12-90 m/m
8 115 m/m long
10-155 m/m
6 incendiary
36 bombs—Weight—828 kilos

Bursts Were Observed At: Eastern portion of Arnaville

Remarks on Enemy-Aircraft Artillery: Fairly active and accurate

Remarks on Enemy Airplanes: 9 attacked East of Arnaville but not very persistent. Probably Fokkers, color greenish brown.

Other Observations: Landing T in open field at 3700-2427; 3 camions on road between Champey and Vittonville; one train South below Arnaville

E. E. Evans
1st Lt. A.S., U.S.A.
Squadron Operations Officer

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96th Aero Squadron

Raid Report

Visibility: Fair

Objective: Longuyon

Route Actually Followed: Ligny, Bar-le-Duc, Verdun, Longuyon, Verdun, Bar-le-Duc, Amanty

Number of Teams Participating: 6. 4 reached the objective

Names of Leaders: Lts. Gaylord and Lunt

Hour of Departure	Hour of Return	Altitude	Squadron	Date
15:00	17:10	4200 M	96th	9/15/18

Number of E.A. Seen: 7 Time: 16:30

Number of E.A. Encountered: Time:

Type: Altitude:
Region: South of Longuyon Combats:
Number of Rounds Fired: 600 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 10 115 m/m
8 115 m/m 24 bombs 660 kilos
6 incendiary

Bursts Were Observed At: On Eastern edge of yards and buildings to the East of yards.

Remarks on Enemy-Aircraft Artillery:

Remarks on Enemy Airplanes: Did not get close enough to distinguish type.

Other Observations: 1-50 car train going South into Longuyon at 16:15. 1-25 car train standing on southern edge of yards at 16:15. 650 cars in yards at Longuyon. 2 trucks going North into Longuyon 16:15. Landing T and seven machines on field at Longuyon; 2 machines took off at 16:20. No activity on Sorbey Field.

E. E. Evans
1st Lt. A.S., U.S.A.
Squadron Operations Officer

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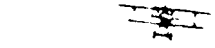
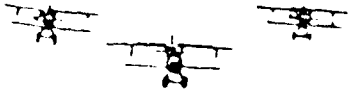
Day Bombardment Group
September 15th, 1918

Summary of Operations

The following mission left at 11:00 o'clock to bomb Arnaville and returned at 13:00 o'clock. First Mission:

Pilots:	Planes:	Observers:
Flight Leader (96th) Lt. C.P. Anderson	12	Lt. H.S. Thompson
Lt. B.F. Beverly	15	Lt. F. J. Newbury





Lt. E.E. Bates	14	Lt. W.S. Pressler
Lt. C.P. Young	20	Lt. A.N. Hexter
Lt. N.C. Rogers	8	Lt. Strawn
Lt. R.P. Elliott	4	Lt. A.C. Ellis
Lt. E.D. Baker	5	Lt. J.K. Milner

Plane #8 did not leave the airdrome.

Flight Leader (20th)

Lt. Sellers	486	Lt. Parrott
Lt. Edwards	408	Lt. Endler
Lt. Howard	584	Lt. Payne
Lt. Wiser	445	Lt. Christian
Lt. West	448	Lt. Frank
Lt. Mathews	707	Lt. Taylor
Lt. Wadsworth		Lt. Richardson
Lt. Stephens	546	Lt. Louis
Lt. Baker	402	Lt. Goodell
Lt. Harris	792	Lt. Forbes

Planes #486, 584, 445 and 402 were the only planes to reach the objective. Plane #546 crashed on field when leaving.

Flight leader (11th)

Lt. Hopper	507	Lt. Strauck
Lt. Gatton	595	Lt. Bird
Lt. Munn	157	Lt. Ward
Lt. Brewster	619	Lt. Jones
Lt. Allsopp	334	Lt. Root
Lt. Harter	735	Lt. Stephenson
Lt. Oatis	821	Lt. Guthrie
Lt. Pearson	243	Lt. Perry
Lt. Slausen	253	Lt. Yates
Lt. Malcom	238	Lt. Springer

Planes #507 and 595 reached objective.

Second Mission left at 15:15 o'clock to bomb Longuyen, returned at 17:05.

Pilots:	Planes:	Observers:
Flight leader (96th)		
Lt. Gaylord	14	Lt. Lunt
Lt. Codman	12	Lt. Stuart
Lt. Hooper	5	Lt. Kelly
Lt. Lakin	20	Lt. Douglass
Lt. Forshay	15	Lt. O'Donnell
Lt. Rogers	4	Lt. Strawn
Lt. Baker	1	Lt. Milner

Planes #14, 5, 20 and 15 reached and bombed Longuyen.

Lt. Sellers pilot and Lt. Parrott observer went in formation with the 96th squadron and reached the objective.

Flight leader (11th)		
Lt. Chapin	518	Lt. Laird
Lt. Munn	157	Lt. Ward
Lt. Gatton	593	Lt. Bird
Lt. Harter	786	Lt. Stephenson
Lt. Stahl		Lt. Archer
Lt. Slausen	764	Lt. Yates
Lt. Brewster	619	Lt. Jones
Lt. Allsopp	243	Lt. Root
Lt. Porter	252	Lt. Patton
Lt. Osmun	507	Lt. Edwards
Lt. Comegys	334	Lt. Carter
Lt. Biggs	529	Lt. Greer

Not all of these planes reached the objective.

Visibility: Fair

Results:

Corny, bursts in eastern edge of the town. 732 kilograms were dropped on objectives, 12:00 (96th)

Bayonville, bursts on road to east of town. 1200 kilograms were dropped (96th)

Longuyon; bursts on eastern edge of yards and among the buildings. Total weight of bombs dropped was 3192 kilograms 12:60 [16:12?] (96th, 11th and 20th)

Railroad Movements:

1-5 car train going south into Longuyon 16:15 (96th)

1-35 car train standing at southern edge of yards at Longuyon; 16:15 (96th).

Two engines with steam up on yards at Longuyon 16:15 (96th).

About 650 cars in yards of Longuyon 16:15 (96th).

Hostile Airdromes:

Landing "T" in open field at 3700-2425 11:50 (96th).

Landing "T" and 7 machines on field at Longuyon. Two machines took off at 16:20 (96th)

No activity at Sorbey (96th)

Anti-Aircraft:

Active and accurate south of Metz 12:00 (11th)

Active and accurate at Etain and north of Verdun 16:10 (96th).

Enemy Aircraft:

9 unidentified E.A. attacked flight of 96th at 12:00 over Arnaville. Attack not pressed and without results. 6 E.A. followed formation at distance from Longuyon to lines north of Verdun 16:25 (96th, 20th and 11th).

One unidentified E.A. going east over Azannes 16:35 (96th).
16 planes (Pfalz and Spads) in combat over Charey 16:30 (96th)

Miscellaneous:

One balloon in ascension at 3800-2448, 12:10 (11th)
One balloon in ascension near St. Julien 15:30 (96th)
One balloon in ascension at 3725-2460 12:10 (11th)
Large cloud of yellow smoke from explosion at Norroy (96th).

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Headquarters, First Pursuit Wing
Air Service, American E.F.
Sept. 15, 1918

Operations Report No. 15

From 17 h 00 Sept 14th to 17 h 00 Sept. 15th.

1. Atmospheric Conditions: Excellent all day.

2. Enemy Air Service: Many large patrols of Fokker airplanes operated in the forenoon over the sector of the Wing, attempting to break through our barrage. They engaged in severe combats whenever encountered, especially in the forenoon.

Escadre No. 1: operating on our right reports that it brought down long range reconnaissance planes attempting to escape; one in the region of Luneville and one in the region of St. Die.

3. Activity of our Pursuit Aviation: All 3 Pursuit Groups operated in the barrage of the sector, taking part in 21 combats. In addition, 2 photographic missions into the enemy's rear areas were given protection. Enemy balloons were attacked and several of them were hauled to the ground.

Lieutenant Fish reported missing in Operations Report No. 13 is unofficially reported as wounded and in a hospital in Flirey.

4. Activity of Our Bombing Expeditions: Our Bombing Planes engaged in 6 raids on Gorze, the roads on both sides of the Moselle, leading to Metz, and Longuyon where bombs were dropped in the railroad yard. Valuable observations of the enemy's movements were also obtained.

A total of 4456 kilograms of bombs were dropped on various objectives.

Lieutenant Stephens, 20th Aero Squadron was killed. Observer Lieutenant Louis extremely seriously injured in a crash while attempting to leave the airdrome.

Summary

	1st Day Bombdmt Group	G.C. 16	2nd Pursuit Group	3rd Pursuit Group	Total Pursuit Group
Sorties	53	66	68	88	222
Trials	0	0	12	18	30
Combats	2	11	10	0	21
Pilots on rolls	56	60	92	87	239
Pilots Available	33	60	76	80	216
Observers on rolls	61	—	—	—	—
Observers Available	36	—	—	—	—
Pilots Killed	1	—	—	—	—
Pilots missing	0	2	0	0	2
Enemy Planes unconfirmed	0	1	4	0	5
Total Planes	56	72	98	103	273
Available Planes	28	50	56	51	157
Planes Crashed	4	1	0	1	2
Planes lost in enemy's lines	0	2	0	0	2
Total Flying Hours	54:08	110:35	108:25	40:20	259:30
Total Service Hours	54:08	110:45	105:36	35:45	242:06
Patrols	0	12	4	0	16
Protection Patrols	0	0	1	1	2
Rounds fired	1160	—	—	—	2150
Special Missions	0	0	0	3	3
Bombing Raids	6	—	—	—	—
Bombs dropped: 4456 Kilograms.					

By order of Lieut. Col. Atkinson,

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

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Headquarters Ninth Aero Squadron

Operations Report for September 15th, 1918.

Atmospheric Conditions
Night—Fair partly cloudy.
Day—Good
1. Reconnaissance.
Night—1 attempt; weather conditions unfavorable. 1 successful
Itinerary: Toul—Pont-a-Mousson—Mets—Conflans—Mars-la-Tour.
Day—4 Sorties, acquainting new pilots with sector.
2. Miscellaneous.
Planes—1 D. H. Liberty awaiting night equipment.
2 Breguets awaiting night equipment.
1 Breguet in reserve.
3 Breguets awaiting repairs.
3. Summary.
Night sorties—19 (1 attempt, 1 Rec., 17 practice night hops)
Day sorties—9 (4/rec. 5 practice)
Service hours—3 hrs.
Total hours—12½
20 planes on hand (19 Breguets, 1 D. H. Liberty), 10 available for duty.
Pilots 10, available 7
Observers 7, available 5
4. Observation. Reported by B.I.O.

Harold W. Merrill
1st Lt. 103 F.A.
Operations Officer

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Headquarters- 24th Aero Squadron
First Army Observation Group

Operations Report for September 15th, 1918.

Atmospheric conditions: Visibility good throughout day.
Reconnaissance. St. Mihiel -Mars-la-Tour—Ancy—Pagny.
10 19 00 (Sept. 14th). Alt., 4000 M. Visibility good: observer Lt. [illegible], pilot Lt. Hill

2. Photography. Vandelainville—Batilly, 13:00-15:00. Altitude 4400 M. Visibility good: observer Lt. Cousins; Pilot Lt. Hill, 36 plates exp. 30 good.

3. Miscellaneous. 15 Salmson 2A2 planes being repaired, equipped etc.,

4. Summary.

12 Sorties.
1 visual reconnaissance.
1 photo reconnaissance.
3 protective flights
6 attempted protective flights.
1 test flight.
Service hours—10:50
Total hours—20:00
21 Salmson 2A2 planes on hand—6 available.
12 observers—12 available. 17 pilots—17 available.

John W. Cousins
1st Lt. Inf.
Operations Officer

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1st Aero Squadron
September 15, 1918

Summary of Operations

Reconnaissance. Haumont, Villecey sur Mad. 18:15-19:10. Altitude 700. Visibility poor. Pilot Lieut. Erwin, Observer Lieut. Baucom. See Intelligence report.

Reconnaissance. Pont-a-Mousson, Jaulny. 7:55-8:45. Altitude 1500 meters. Visibility fair. Pilot Lieut. Garside, Observer Capt. Gibson. See intelligence report. One plane from First Aero Squadron furnished protection.

Reconnaissance. Pont-a-Mousson, Thiaucourt. 17:10-18:30. Altitude 2000 meters. Visibility good. Pilot Lieut. Michener, Observer Lieut. Henry. See intelligence report. Forced to land at Saizerais. One plane from 1st Aero Squadron furnished protection.

Photography. Buxieres, Louvigny, Lorry, Vittonville, Champey, Vandieres, Preny. 15:10-17:30. Altitude 3000 meters. Visibility fair. Pilot Lieut. Erwin, Lieut. Baucom. 34 photos taken, none of which were good. Attacked by one enemy bi-place plane, over Bois des Grande Fontaine, at 16:30. One plane from First Aero Squadron furnished protection.

1st Lt. William P. Erwin, pilot, 1st Aero Squadron.

Photography. Xammes, St. Julien, Bois de Grande Fontaine. 15:10-17:10. Altitude 2800 meters. Visibility fair. Pilot Lieut. Michener, Observer Lieut. D'Amour. 48 photos taken none of which were good. One plane from the First Aero Squadron furnished protection.

Photography. Buxieres, Lorry, Vittonville, Champey, Vandieres, Preny. 9:00-10:45. Altitude 2600 meters. Visibility good. Pilot Lieut. Erwin, Observer Lieut. Baucom. 34 photos taken all of which were good. Protection furnished by 2nd Pursuit Group.

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12th Aero Squadron
September 15th, 1918

Summary of Operations

Reconnaissance: Thiaucourt—Arnaville. 15:10-17:35. Alt. 1600 M. Vis Poor. Lt Muller, Pilot, Observer Lt. Read. Attacked by four enemy planes in vicinity of Arnaville. 1 plane as protection.

Reconnaissance: Pont-a-Mousson—Thiaucourt 5:45-6:47. Alt 1000 M. Vis Fair, Pilot Lt Gregory, Observer Lt Hyman, 1 plane as protection.

Reconnaissance: Hageville—Preny 5:45-7:30. Alt 500 M. Vis Good. Pilot Lt Thayer, Observer Lt McClurg.

Adjustment of Artillery Fire: Vandieres—Charey 14:00-16:00. Alt 1000 M. Vis Fair. Pilot Lt Smith, Observer Lt Keeley. 1 protection plane.

Infantry Contact Patrol: Villers-en-Haye—Thiaucourt—Rembercourt. 17:00-19:15 Alt 300-600 M. Vis Good. Pilot Lt Schnur, Observer Lt Bowman. Front line failed to show panels in answer to rocket. 3 planes furnished as protection. Messages dropped at Bn and Regt Hds.

2 flights for testing purposes.

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50th Aero Squadron

Operations Report

September 15, 1918. 17:00 hr. - 17:00 hr.

Atmospheric Conditions—Visibility: Good.
Reconnaissance.

1. Norroy, Tauly, Vandieres. 15:30-17:05. Alt 2000 M. Vis Good. Pilot Lt. Bird, Observer Lt. Sain. See intelligence report.

2. Pont-a-Mousson, Thiaucourt, Vandieres. 16:45-18:50. Alt 1500 M. Vis Good. Pilot Lt Thomson, Observer Lt Bolt. See intelligence report.

3. N. to Arry, W. to Silligny [?]. 6:00-8:10. Alt 2000 M. Vis Good. Pilot Lt Thomson, Observer Lt Darrin. See intelligence report. (Combat with three Albatros planes.)

4. Longeville, Eply, Vittonville, Boncieres [?]. 7:53-9:30. Alt 1800 M. Vis Good. Pilot Lt Anderson, Observer Lt Dovre. See intelligence report.

5. Vandieres, Thiaucourt, Pagny. 7:55-9:40. Alt 2000 M. Vis Good. Pilot Lt Frayne, Observer Lt Lockwood. See intelligence report.

6. Norroy, Villers, and N.W. 10:30-12:00. Alt 2000 M. Vis Good. Pilot Lt Goettler, Observer Lt Sain. See intelligence report.

7. Pont-a-Mousson, Mardigny, Louvigny. 10:30-12:00. Alt 1800 M. Vis Good. Pilot Lt Phillips, Observer Lt George. See intelligence report.

8. Pont-a-Mousson, Eply. 13:05-14:30. Alt 200 M. Vis Good. Pilot Lt Slater, Observer Lt Bleckley. See intelligence report (Combat with one enemy plane.)

9. Pagny, Bois Grand Fontaux, Arnaville. 15:05-17:10. Alt 2000 M. Vis Good. Pilot Lt Frayne, Observer Lt Darrin. See intelligence report.

10. Norroy, Pagny, Rembercourt, Villecy. 13:00-15:00. Alt 1500 M. Vis Good. Pilot Lt. Pickrell, Observer Lt French. See intelligence report.

11. Pont-a-Mousson. 16:50-18:15. Alt 2500 M. Vis Good. Pilot Lt Hardin, Observer Lt Brill. See intelligence report.

12. Field. Pilot Lt Hardin, Observer Lt Brill. Landed on account of wireless and motor trouble.

13. Norroy, Thiaucourt. 15:00-16:45. Alt 200 M. Vis Good. Pilot Lt Goettler, Observer Lt McCurdy. See intelligence report.

Adjustment of Artillery Fire

1. Pilot Lt Thomson, Observer Lt Lockwood. 15:07. Attacked by Allied plane, motor trouble, forced landing.

Infantry Contact Patrol

1. Vandieres, Vilecy. 17:17-19:00 Alt 500 M. Vis Fair. Pilot Lt. Fitzsimmons, Observer Lt Dovre, 90th Division Headquarters did not ask for any infantry work when plane reached line.

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Office of the Chief of Air Service
Headquarters First Army Corps
American Expeditionary Forces
16 Sept. 1918

Summary of Operations for the day of 15 Sept. 1918. No. 6.

Atmospheric Conditions: Favorable—Visibility good.

A. Aviation.

I. Reconnaissances: 20 reconnaissances of Corps Sector were carried out. Observer Lt. Darrin and Pilot Lt. Thomson, 50th Aero Squadron, were attacked by three enemy planes (Albatros) in the vicinity of Lorry at 7:30 A.M. Neither pilot nor observer injured.

II. Infantry Contact Patrols: 1 Infantry contact patrol was carried out. For 2nd Division—Partially successful—infantry displayed but two panels, the location of which was reported to Div. P.C.

Observer Lt. Duckstein and Pilot Lt. Richardson, 1st Aero Squadron, attacked an enemy plane which had previously brought down two of our balloons but did not succeed in bringing it down.

III. Photography: 1 Mission: 34 exposures (vertical) taken over enemy lines, all of which were good.

IV. Adjustment of Artillery Fire: 8 Artillery surveillance missions were carried out. Observer Lt. Lockwood and Pilot Lt. Thomson, 50th Aero Squadron, were attacked by a "Spad" plane with French markings and forced to land in the vicinity of Saizerais at 15:30. Neither pilot nor observer injured.

V. Miscellaneous:

1 flight for testing purposes (12)
1 flight for target practice (1)
4 flights for protection (1)
3 flights for protection (12)

VI. Summary:

1st Aero Squadron:

9 Sorties: 2 reconnaissances; 1 infantry contact patrol; 1 photography mission; 4 flights for protection; 1 flight for target practice.

23 Salmsons on hand—17 available for duty
19 Pilots carried on rolls—18 available for duty
14 Observers carried on rolls—11 available for duty.
Total time 13 hrs. 32 min. Service time 12 hrs. 42 min.

12th Aero Squadron:

8 Sorties: 2 reconnaissances; 1 artillery surveillance; 3 flights for protection; 2 flights for testing purposes.

19 Salmsons on hand—16 available for duty

19 Pilots carried on rolls—18 available for duty.
16 Observers carried on rolls—14 available for duty.
Total time 16 hrs. 30 min. Service time 15 hrs. 30 min.

50th Aero Squadron:
12 Sorties: 11 reconnaissances; 1 artillery surveillance.
21 D.H. on hand—8 available for duty
18 Pilots carried on rolls—10 available for duty
12 Observers carried on rolls—10 available for duty.
Total time 18 hrs. 50 min. Service time 18 hrs. 50 min.

208th Aero Squadron:
6 Sorties: 6 artillery surveillances.
10 Breguets on hand—7 available for duty
10 Pilots carried on rolls—7 available for duty
8 Observers carried on rolls—7 available for duty.
Total time 7 hrs. 45 min. Service time 7 hrs. 45 min.

214th Aero Squadron
5 Sorties: 5 reconnaissances.
10 Breguets on hand—7 available for duty
7 Observers carried on rolls—6 available for duty
10 Pilots carried on rolls—9 available for duty
3 machine gunners carried on rolls—1 available for duty.
Total time 9 hrs. 45 min. Service time 9 hrs. 45 min.

B. Aerostation.
7 Daylight ascensions

1st Balloon Co.	6:55-12:22	5 hrs. 27 min.
2nd Balloon Co.	7:05-12:25	5 hrs. 20 min.
5th Balloon Co.	5:30-12:20	6 hrs. 50 min.
	12:25-19:30	7 hrs. 05 min.
42nd Balloon Co.	6:44-12:31	5 hrs. 47 min.
	14:18-16:44	2 hrs. 27 min.
	18:25 19:24	0 hrs. 54 min.

Total time in air 33 hrs. 54 min.

Balloons 1 and 2 were attacked and burned by a Fokker plane at 12:22 and 12:25 respectively. The observers Lts. Barton and Dungan jumped with parachutes and descended safely.

By order of Major M. A. Hall, C.A.S., 1st A.C.

Paul D. Meyers
2nd Lieut. C.A.C.
Operations Officer

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99th Aero Squadron
September 15, 1918

Missions Carried Out

Pilot	Observer	Missions	Time Out	Time In	Total Time	Visibility
Simpson	McRossie	Protection	9:40 AM	10:00 AM	150	Good
Heywood	Reilly	Reglage	10:00 AM	12:15 PM	135	Good
Cadbury	Rollins	Reconnaissance	1:10 PM	2:10 PM	60	Good
Castleman	E. Stewart	Protection	2:15 PM	3:30 PM	75	Good
McElroy	Kinnie	Protection	2:20 PM	3:02 PM	42	Good
Markham	Powell	Photographic	2:15 PM	3:30 PM	75	Good
Cadbury	Rollins	Protection	2:30 PM	4:00 PM	90	Good
Blumenthal	MacLachlan	Reconnaissance	2:55 PM	4:00 PM	65	Good
McMurtry	Hunter	Reconnaissance	2:45 PM	4:05 PM	80	Good
Sanford	O'Dell	Reconnaissance	6:30 PM	7:30 PM	60	Good
			TOTAL		13:52	

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104th Aero Squadron
September 15, 1918

Summary of Reports

St. Mihiel work continues. Daylight reconnaissance by Lt. Arthur, pilot, and Lt. Beard, observer. No great amount of activity or change in line. Lts. Roberts, Johnson, and Wallace, pilots, with Lts. Pond, Kolb, and McCann as observers, made reconnaissances of Corps sector in formation. Lts. Weeks, pilot, and Lt. Lawrence, observer, performed first photographic mission of the Squadron. Lt. Jacobi, pilot, and Lt. Williams, observer, Lt. Morris, pilot, and Lt. Wood, observer, performed successful courier missions. Lts. Clark, Davis, Coffin, pilots, Lts. Northrup, Oetzel, and Nichols, observers, made evening reconnaissance in formation. On the early morning reconnaissance, Lt. Arthur, pilot, had a forced landing and crashed when a water jacket on the motor burst. Total for the day, ten sorties—8 hrs. 10 min. flying time. Lt. Donald Johnston definitely known to have been killed in action behind the German lines while ferrying a plane from Luxeuil to Souilly. His body was recovered by the French and buried with due

honor by the French in the cemetery at St. Mihiel. According to the best information at hand, Lt. Johnston was flying in formation with planes of the 99th squadron from Luxeuil to Souilly. The clouds were very low and rain was encountered. On the way he lost his formation and crossed the German lines near St. Mihiel. According to Cpl. Johnston, who was flying as passenger with Lt. Johnston, the plane came out through the low hanging clouds and met a heavy anti-aircraft fire and crashed. Cpl. Johnson was knocked unconscious and later recovered in a German dugout by the French and removed to a hospital at Souilly suffering from a broken leg and other minor cuts and injuries. He was unable to state what had happened to Pilot Johnston after the plane crashed. The wrecked plane was found by advancing French troops between Spada and Lamorville. Lts. Earl S. Wallace and Henry P. Full were appointed as a board to report on Lt. Johnston's death. Five Salmson aeroplanes received as replacements.

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Headquarters Air Service
Fifth Army Corps, American E.F.

Operation Report Number 40, 19:00 Sept. 14 to 19:00 Sept. 15, 1918

I. Atmospheric Conditions: Clear and sunny. Clouds very high. Visibility excellent.

II. Aviation:

1. Reconnaissance: During the day six missions were dispatched for reconnaissance and surveillance of the Corps Sector, keeping the sector under constant aerial observation. Considerable information of a confirmation nature was obtained and enemy anti-aircraft activity reported.

The early morning reconnaissance, Pilot Lt. Sanford and Observer Lt. O'Dell, found great anti-aircraft activity in the vicinity of Etang Lachaussee. The plane was hit and badly damaged. The Pilot was severely wounded in the foot, but succeeded in safely reaching the field.

From 16 to 18 hours reports enemy balloons in flames at Mars-la-Tour and sighted a formation of twelve Hun planes near Mars-la Tour.

2. Photography: During the day one photo mission was dispatched, Pilot Lt. Markham and Observer Lt. Powell, took thirty-six pictures covering the old Hindenberg line in front of the Corps sector.

3. Adjustments: During the day [two] controls were attempted. The first one the observer got a reply from the panel station but

three successive orders to fire were unanswered. On the fourth and fifth attempts the battery fired but no shots were observed. The target was then changed and the observer was able to observe some shots.

The second one was sent up on telephonic request to adjust on enemy infantry. The observer was unable to locate same flying at 100 meters over the indicated area.

4. Infantry Contact: Two infantry contact missions located French troops in Fresnes, Marcheville and along the old line of Haudimont to Watronville; enemy machine guns in action in the Manhuelles wood were fired on by the French aviators.

III. Miscellaneous: During the day four planes were dispatched for courier service dropping photographs and messages at Army and Army Corp P.C.'s.

Owing to errors in typing change report of 11th-12th, total service hours should read 55 hours and 20 minutes and one of 13th-14th should read aerial combats.

Balloons: Balloon positions of this Corps have changed the past twenty-four hours following closely behind the present advance. The new positions taker up follow:

Balloon Company No. 6 to a point North of Dommartin X44.7-Y50.6.

Balloon Company No. 8 near Amblueville farm X36.7-Y54.2

Balloon Company No. 12 near Amblueville farm X37.8-Y54.4

Balloon Company 0.93 (French) X37.8-X52.2

By order of Lieut. Colonel Christie

Fraser Hale
1st Lt. AS USA
Operations Officer

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Headquarters Commander Army Balloons
First Army

Daily Report of Operations for September 14th-15th

Balloon Wing, First Army Corps, Noon to Noon

Ascensions:

Company	Time	Observers	Altitude	Visibility
5th Co.	16:40-19:45	Lts. Smith & Fox	1000 M.	25 Kils.
	5:30-12:00	Lts. Lane & Furber	900 M.	12 Kils.

42nd Co. 12:10-12:20	Lt. Felt	200 M.	12 Kils.
14:46-13:40	Lt. Felt	600 M.	12 Kils.
13:52-19:17	Lt. Chamblin	600 M.	14 Kils.
6:44-12:00	Lt. Chamblin	800 M.	11 Kils.
2nd Co. 14:05-19:13	Lt. Dungan	900 M.	20 Kils.
19:35- 6:48	Lt. Henry	500 M.	Very poor
7:05-12:00	Lt. Dungan	1000 M.	20 Kils.
1st Co. 14:00-18:30	Report not received.		

Observations:

1. Enemy Infantry: 9:00. Enemy infantry on road to Bois Rappe at 72.39-43.22 (B-2).

2. Enemy Artillery:

14:34. Enemy battery in action at 33.07 (B-42).
15:50. Enemy battery in action at 372.35-248.80 (B-2).
17:12. Enemy battery in action at 368.76-245.25 (B-2).
17:10. Enemy battery in action at 387.5-251.8 (B-5).
17:15. Enemy battery in action at 369.0-244.76 (B-2).
17:24. Enemy battery in action at 368.95-245.44 (B-2).
17:24. Enemy battery in action at 368.71-245.25 (B-2).
17:30. Enemy battery in action at 368.96-244.76 (B-2).
17:40. Enemy battery in action at 387.5-251.8 (B-5).
17:40. Enemy battery in action at 93.2-36.7 (B-42).
17:40. Enemy battery in action at 93.8-37.6 (B-5).
18:10. Enemy battery in action at 370.2-245.78 (B-5).
19:03. Enemy battery in action at 391.75-238.0 (B-5).
18:16. Enemy battery in action at Fort Kronprinz (B-5).
18:16. Enemy battery in action at Fort St. Quentin (B-5).
19:04. Enemy battery in action at 391.75-238.0 (B-5).
19:22. Enemy battery in action at 379.48-241.03 (B-5).
19:25. Enemy battery in action at Bois Conte 81.31 (B-5).
19:26. Enemy battery in action at Bois-la-Cote 85.18 (B-5).
19:32. Enemy battery in action at Bois-de-Fourasse 14.18 (B-5).
6:15. Enemy battery in action at 78.34 (B-5).
6:24. Enemy battery in action at 75.27 (B-5).
7:30. Enemy battery in action at 370.62-246.00 (B-2).
7:57. Enemy battery in action at 371.85-254.90 (B-2).
8:06. Enemy battery in action at 378.10-246.10 (B-2).
7:07. Enemy battery in action at 378.40-245.60 (B-5).
8:12. Enemy battery in action at 378.10-245.90 (B-5).
8:30. Enemy battery in action at 368.79-245.31 (B-2).
9:34. Enemy battery in action at 368.90-245.35 (B-2).
10:10. Enemy battery in action at 377.00-254.00 (B-2).
14:00. Shells falling in Bois-de-la-Fourasse (B-42).
14:15. Shells in Bois-de-Friere (B-1 & B-2).
16:03. Shells along edge of Bois Sauix 1½ K. S.E. of Vieville (B-3).

16:28. Shells in Vieville-en-Haye (B-1).
16:45. Shells fallling at 371.3-235.7 in Bois-de-Norroy (B-1).
16:43. Shells bursting in vicinity of Vilcey-sur-Trey (B-2).
16:53. Shells in southern edge of Bois-de-Grand Fontaine (B-2).
17:00. Artillery duel over area Pont-a-Mousson (B-5).
17:10. Shells in Bois Gerard (B-2).
17:22. Shells in Bois Gerard (B-1).
17:41. Shells in Bois Gerard (B-1).
17:50. Shells falling in Bonvaux (B-1).
17:55. Shells along the road between Jaulny to Vieville (B-2).
18:05. Shells Western edge of Bois-de-Norroy (B-1).
18:05. Barrage fire from 367.1-239.7 west of Vieville to west edge of Foret-des-Vencheres 368.5-240.2 (B-5).
18:22. Medium Calibre Shells falling Norroy (B-5).
18:53. Three large calibre shells falling at 764.337 (B-5).
18:57 to 19:32. Large Cal. Shells near bridge Pont-a-Mousson (B-5).
3:50. Artillery activity to N. and N.E. (B-2).
6:18. Shells at crossing of line 374.242 (B-5).
6:19. Shells on plateau north of Dieulouard (B-5).
6:48. Large Cal. Guns shelling roads south of Balloon 1 Kilometre (B-2).
7:16. Shells east of Thiaucourt also in Bois Bonvaux (B-5).
7:21. Barrage fire from Preny to Pagny along crest east of Bois-de-Rappes (B-5).
7:26. Shelling in Vandieres (B-5).
7:34. Barrage from Toutecourt to 200 Meters north (B-5).
7:39. Shells in Fort Vencheres (B-5).
8:22. Heavy Barrage from Vandieres to Neuf Voulin Farm (B-5).
8:33. Shells bursting east of Jaulny (B-2).
9:19. Shells bursting near Bois Gerard (B-2).
9:57. Large Cal. Shells in Beney (B-5).
9:59. Considerable shelling south west of Preny in Bois-de-Trou-de-la-Haie (B-2).
10:03. Shells bursting in Preny (B-2).
10:11. Large Cal. shells W. of Preny (B-5).
10:16. Heavy shelling of Bois-Perriers (B-2).
10:27. Large Cal. shells in Rambucourt (B-5).
10:36. Shells in Vandieres again at 11:35 (B-5).
11:37. Heavy fire S.W. Edge of Bois-de-Beaume Haie (B-5).
11:41. Numerous 77s E. of Mousson 96.50 (B-5).
11:42. Med. Cal. shells west of Jesamville again at 11:45 & 11:49 (B-5).

3. Enemy Aeronautical Service.
13:02. Balloon in ascension near Pagny (B-42).

13:13. Balloon in ascension near Pagny (B-42).
14:34. Balloon in ascension on line 200 M left of Preny and 4 K. beyond (B-2).
14:45. Balloon in ascension on line over Bouxelles (B-2).
15:15. Balloon on line over Bouxelles burned (B-2).
16:37. Goin Balloon burned 1 Observer descended in Parachute (B-1, 2, 5, 42).
17:55. Preny and Grange-en-Haye in ascension (B-5).
19:43. Pagny balloon shot down (B-42).
6:20 to 9:00. Goin in ascension at later time this balloon was burned (B-5).
6:21 to 10:00. Preny in ascension at later time this balloon was burned (B-5).
17:57 to 9:47. Balloon at 371.85-250.9 at later time balloon was burned (B-2).
9:50. Enemy balloon in operation in vicinity of 365.75-258.88 (B-2).
9:53. Enemy balloon in ascension near Coin-les-Cuvry (B-2).
15:30. Two enemy planes in north (B-2).
16:01. Plane in north (B-2).
18:41. 2 planes north of Balloon 5 (B-5).
8:41. 5 planes in north west (B-2).
9:10. Plane near Balloon 5 (B-5).

4. Circulation, Roads, Railroads.

15:09. Truck train on road at Les Barraques 368.3 251.7 (B2).
15:21. Traffic trucks and wagons going both ways at cross roads north of Bois-de-Joyeuse at 396.5-248.6 (B-2).
16:57. Traffic at cross roads at 369.5 248.6 (B-2).
16:20. Train from Verny to Pournoy (B-2).
6:40. Train from Metz to Marley (B-2).
6:50. Train from Metz to Crepy (B-2).
7:04. Train going north towards Verny (B-42).
9:09. Train entering Bois-de-l'Hopital (B-42).
7:12. Train going north from Pournoy (B-5).
7:17. Train going W. to E. north of Cheminot (B-42).
7:17. Train going W. to E. Thru Sillegny (B-42).
7:19. Train north from Dornot (B-5).
7:54. Train entering Metz from west (B-5).
7:54. Two trains leaving Metz to east (B-5).
8:02. Two wagons going west over road from St. Louis Farm (B-2).
8:03. Train running south from Acny, and on north to Ars (B-2).
8:03. Train running south from Jouy-aux-Arches (B-2).
8:04. Train North west from Metz (B-5).
8:11. Train going south towards Vigny (B-42).

8:21. Two trains leaving Arvre for Metz (B-5).

11:17. Heavy traffic on road running north east from Waville (B-2).

5. Destructions, Explosions, Fires:

14:18. Columns of smoke arising from Rembercourt and Charey (B-2).

17:35. Smoke arising from Maumont (B-2).

17:58. Fire in Dampvitoux (B-5).

18:30. Along parallel 241 Bois de Rappes much smoke probably grenade or shells (B-5).

20:38. Star Shell on line over Thiaucourt (B-2).

21:05. Three Star Shells on line over Mamey (B-2).

21:12. Three Star Shells on line over Mamey (B-2).

21:23. Numerous rockets on line a little N. of E. (B-2).

21:25. Anti Aircraft burst, Planes and searchlights operating due east of our position (B-2).

21:35 to 21:55. Several long flashes noticed in the N. and N.E. (B-2).

2:25 to 3:35. Several Gun flashes noticed in the N. and N.E. (B-2).

2:52 to 3:19. Several AAA bursts in NE. and N. (B-2).

6:55. Smoke in Bois-la-Cote 85.13 (B-5).

10:05. Smoke on Bois-de-Trou-de-la-Haye apparently from explosions caused by shelling (B-2).

11:40. Ammunition burning around enemy battery (368.9-245.35) (B-2).

6. Trench Work Shelters Etc. Nil.

Adjustments of Artillery:

By Balloon No. 2.

16:50 to 17:24. Battery 60th C.A.C. 155 L fired 14 Obs 10 Target 869.5-248.6 (cross roads).

11:12 to 12:00. Battery 60th C.A.C. 155 L Adjustment not finished.

By Balloon 5

17:25. Battery 340 uproar [?] Cal. 340 fired 3 Obs 3 Target 383.21-257.41.

9:57. Battery Lar Fere [?] Cal 105 Fired 44 Obs 26 Target Bat. 7527.

Paegelow.

Headquarters Commander Army Balloons
First Army

Report Balloons Fourth Army Corps, Sept. 14, and Sept. 15, 12:00 to 12:00.

3 Balloon	3 Ascensions	9 Hrs 40 mins.
10 Balloon	2 Ascensions	5 Hrs 34 Mins.
43 Balloon	1 Ascension	3 Hrs 03 Mins.
69 Balloon	2 Ascensions	8 Hrs 27 Mins.

Enemy Batteries Seen in Action

16:00th Hr	Co-ord B-8854	4 Pieces
18:00th Hr	Co-ord B-1805	Field Piece
6:00th Hr	Co-ord 66.5-46.1	Battery
6:00th Hr	Co-ord 66.9-47.8	4 Guns

Enemy Balloons in Ascension. Min de Rembercourt, (near) Dampvitoux, Marieville, Jonville, Lachaussee, Gorze, Chambley, Moselle, Sponville, Xonville, St. Julian. 1 Balloon Co-ordinates B-70.27. 1 Balloon at G-1079, direction Euvezin. 1 balloon near Bois Hadeville, co-ordinance G-1079. 1 Balloon B-5140.

The 43 Balloon has moved to Bois du Beau Vallon; there ascension point is 63.5-37.5.

69th Balloon Company near Maizerais.

John A. Paegelow
Major, A.S., U.S.A.
Commander Army Balloons, First Army

11:05 P.M., First Army Corps, Sept. 15, 1918. The following are changes in the position of balloon of the First Army:

B-7. 2 Kilometres N. E. Sommedieue
B-8. Les Eparges
B-12. 2 Kilometres South of Mesnil.
B-39. 4 Kilometres East of Limey.
B-43. 1½ Kilometres East of Euvezin.
B-10. 2 Kilometres South of Remenauville.
B-10. 2 Kilometres South of Remenauville.

11:30 P.M., Fifth Army Corps, Sept. 15, 1918. B-6, B-7, B-8, B-12, B-93, in ascension today. Number of destructions fires in enemy lines observed. B-7—4 Reglages. No enemy infantry observed. Enemy planes very active.

. . . . . .

20.45. Fourth Army Corps.

B-11. Attacked at noon but not burned. Balloon again in ascension this afternoon.

B-39. Move tomorrow four K. East of Limey.

B-43. 1½ K East of Euvezin Co-ord. X363.750-Y237.000.

B-10. Moves to Co-ord. X 365.2-Y 23.7 east of St. Baussant.

B-69 and B-3 in same position.

Three of our balloons were up this afternoon making 8 adjustments spending 14 hours in the air.

Paegelow

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Information Section
Air Service, First Army
September 15, 1918

Reports Received

Report from B.I.O. Army Observation Group, 15th September 11:45. At 16:30 16 machines Pfalz and Spads were observed in combat over Charey. The result of this combat is unknown. Enemy aircraft: A formation of the 96th Squadron was attacked unsuccessfully over Arnaville at 12:00. Seven enemy planes attacked flight of the 11th Squadron over Bayonville at 12:15 without result. Six enemy aircraft followed a formation of the 96th Squadron from Longuyon to the lines at 16:25 without attacking. Bombs were dropped on Corny, Bayonville and Longuyon. The bursts were observed on the eastern edge of Corny and Bayonville and on the R.R. yards at Longuyon. A landing "T" was seen in an open field at 370.0, 242.5 at 11:50. Another landing "T" and seven machines were seen on the Longuyon field at 16:20. There was no activity at the Sorbey airdrome. Anti-aircraft accurate and active south of Metz at 12:00, also active and accurate at Etain and Verdun at 16:10. Balloons observed in ascension at 380.0-244.8, at 372.5-246.0 at 12:00 p.m. Yellow smoke from an explosion was observed in Norroy at 16:10.

Report from First Pursuit Group, 15th September 13:10. 147th Squadron reports at 10:15 the towns along the Moselle River are still burning and during the period from 10:00 to 11:00, 33 enemy planes were sighted all well within the German lines. Three Balloons were also sighted at Tronville. Many fires between Conflans and Chambley. At 12:00 a French pilot in a Brequet (Escadre 229) landed on the field and reported many enemy troops trains going from Montmedy, about 50 kilometers north of Verdun, loaded with troops coming into this sector.

Pigeon, used to carry messages, released from a 90th Squadron aircraft.

Report from Observation Wing, 15th September 16:10.

4th Corps Observation Group, 15:45. Carrier pigeon just in with message dispatched at 8:30 A.M. Allied plane down east of Euvezin. Mission 11:50 to 14:00 1st Observation Group. (This message has already been sent by telegraph. Could not reach us before.) Fire in Onville and Bayonville. Two friendly infantry panels shown at E4, E4. Shells falling at E1, E6, but unable to determine whether friendly or enemy. Chased Albatros D-5, and fired at him, after he had brought down two of our balloons north of Remenauville and Regnieville. No pursuit planes of ours in sight. Chased this plane into German lines. One large enemy plane doing reglage above Rembercourt, and 5 pursuit planes as protection. Our infantry (2nd Div) displayed only two panels. Observer shot rockets twice, and flew along line 5 times without getting another response. There seems to be quite a bit of activity in the area. Every chasse patrol that went out today had a fight.

5th Corps, 11:30 a.m. Constant surveillance of sector. Artillery adjustment with Corps Artillery. Liaison with 51st Field Artillery Brigade for series light gun adjustments late today or tomorrow. Photographic mission of Hindenburg line. Photo mission battery position alert of command at infantry contact planes.

General estimate 5th Corps. Sector quiet.

Report from French Aerial Division, 15th September 19:10. Sections of trenches held by the enemy on the edge of road between Lachaussee and Hageville. Enemy infantry at side of road between Jonville and Harville. French infantry between Jonville and Woel, advanced patrols to the southeast of Jonville, among tree. The Bois de Haudronvilles strongly occupied by our troops. Pilot landed between Hattonville and Bois de Haudronvilles in order to give information to French batteries. Mission carried out at low altitude.

Report from First Pursuit Wing, 15th September 19:45. The Day Bombardment Group which returned at 18:45, reports 650 cars in the railroad yard at Longuyon, one train of 35 cars in the station, one train of 50 cars moving into Longuyon from the east. One one-half tons of bombs were dropped on yard at Longuyon doing great damage to the traffic.

Report from Air Service, 15th September 23:45. The night bombardment group (Villome) telephoned that at 23:00 ships of this group bombed the railway station at Conflans and that same is burning fiercely. The explosion also broke the electric wire and the bombers observed the sparking and flashing caused by the electric currents. The bombing is continuing.

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Headquarters, Air Service, First Army,
American Expeditionary Forces

Operations Report Number 16, 19:00 Sept. 14th, 19:00 Sept 15th, 1918.

1. Atmospheric Conditions. Clear and sunny, Clouds very high. Visibility excellent.

2. Enemy Aerial Activity. As on the preceding day, enemy aerial activity was very pronounced in its aggressiveness, and during the greater part of the day, practically every pursuit patrol which crossed the lines was engaged in combat with the enemy. Enemy pursuit aviation was employed almost entirely in formation of 9 planes, but in

one or two instances, formations of 6 planes were encountered. In addition to attacking our pursuit planes, the enemy also made determined attempts to destroy many of our balloons, but without success. Anti-aircraft activity was extremely marked as on previous days.

3. Activity of Our Own Aviation.

(a) Pursuit. The First Pursuit Wing and the First Pursuit Group and the French Aerial Division combined during the day in maintaining an aerial barrage of the sector. The First Pursuit Group carried out a total of 10 patrols in the course of which they engaged the enemy in 11 combats during the course of which combats, it is believed 5 enemy planes were destroyed. The French Aerial Division made 38 patrols over the sector in the course of which they engaged in 12 combats, attacking also 8 enemy balloons, 3 of which were destroyed. One enemy plane was also destroyed. The First Pursuit Wing carried out a great number of patrols, and engaged the enemy in 21 combats, as the result of which their pilots are believed to have destroyed 5 enemy planes.

(b) Observation. As on previous days, our Observation units carried out a great number of reconnaissance missions, keeping the entire sector under constant observation. Considerable information of a confirmatory nature was obtained concerning the location of our own and the enemy's front lines, and a great number of very valuable photographic missions were carried out. In the course of these missions, the Army Observation Group alone made 125 successful photographs, many of them far back in enemy territory. In addition, our observation planes made a considerable number of successful infantry liaison missions locating our front lines in several previously doubtful places. More regulating of artillery fire was carried out than on previous days, and largely resulted in very successful shooting.

(c) Bombardment. On the night of the 14th-15th, British night-bombing planes carried out a great number of very important bombing missions. One hundred 112# bombs were dropped on the railroad station east of Metz and the Metz-Sablon railroad station. In addition a large number of incendiary bombs were dropped, and 15 direct hits were observed, causing 2 large fires. At Courcelles a total of one hundred and thirty one 112# bombs and forty-five 25# bombs were dropped and 6 direct hits were observed on the railroad junction. At Saarbrucken one 550# and twenty 112# bombs were dropped, causing a large fire at the railroad station. At Frescaty Airdrome one 550# and twenty four 112# bombs were dropped causing four fires. Sixteen 112# bombs were also dropped on the Airdrome at Boulay. Many of the above machines made two expeditions during the course of the night, and the total weight of bombs dropped exceeded 17 tons.

Planes of the French Night Bombardment Group made a number of very successful missions, dropping a quantity of bombs on Conflans and adjacent railroad yards.

Our day bombing planes made a number of very important missions during the course of the day, bombing the roads and bridges across the Moselle in the vicinity of Corny and Arnaville also the railroad yards at Longuyon. A total of over 4 tons of bombs were dropped during these expeditions, and on the last mission to Longuyon, over a ton and a half of bombs were dropped in the midst of a heavy concentration of rolling stock causing great confusion and material damage.

During the course of the day, planes of the British Day Bombing Units dropped a total of 12-1/2 tons of bombs on the railroad triangle at Metz-Sablon and the Airdrome at Buhl. Numerous direct hits were observed on the railroad triangle as well as on the airdrome, and at the latter place two 550# bombs did particularly great destruction.

Annex to Pursuit. Late reports received from the French Aerial Division indicate that their units were particularly valuable in affording protection for our Corps Observation. At one time, no less than 16 squadrons were assigned to and cooperating with one of our Corps Observation Groups, enabling it to carry out its work without molestation. In addition to the work down on the sector of the First Army, planes from the First Pursuit Escadre of the French Aerial Division also shot down two enemy long-distance reconnaissance planes—one at St. Die and the other at Luneville. Both of the enemy planes had endeavoured to come in from the right flank of the First Army in order to photograph the rear areas of the sector.

Operations Report No. 16 (Cont'd)

Airplanes		French Aerial Division	Pursuit		Bombardment		Observation		Corps Observation Wing			
			1st Group	1st Wing	1st Army Day Group	Fr Night Group	1st Army Group	Heavy Artillery Group	1st Corps	4th Corps	5th Corps	2nd Fr C.A.C.
Sorties		203	111	222	53	20	33	24	47	57	36	20
Trials			4	30	2		14	4	3	22	13	2
Combats		12	11	21					6		1	
Pilots	On Roll	611	80	239	56	43	31	43	76	65	60	41
	Available		70	216	33	24	29	34	69	58	50	37
	Missing		1	2			3				1	
	Wounded						1		1		1	
	Killed											
Observers	On Roll	242			61	51	34	35	57	61	48	30
	Available	168			36	39	23	30	48	43	45	27
	Missing						3				1	
	Wounded						1		1		2	
	Killed				1							
Enemy Planes	Con.											
	Uncon.	1	5	5			2					
Planes	Total	623	99	273	56	32	45	42	70	74	66	39
	Available	400	64	157	28	25	28	37	55	68	42	34
	Crashed			2	4		1		2			
Total Hours	Flying		147:22	259:30	54:08	45:10	50:02		71:15	50:48	31:45	
	Service		141:40	242:06	54:08	45:10	36:10		69:10	43:34	31:45	
Exercises												
Target Practice									1			
Alerts									1		1	
Patrols			10	16								
Protections		38	2	2			4		9	8	4	8
Voluntary Patrol			2									

Airplanes		French Aerial Division	Pursuit		Bombardment		Observation		Corps Observation Wing			
			1st Group	1st Wing	1st Army Day Group	Fr Night Group	1st Army Group	Heavy Artillery Group	1st Corps	4th Corps	5th Corps	2nd Fr C.A.C.
Reconnaissances	Visual						2		21	13	6	7
	Photo						7		3	2	1	2
	Night					1						
Plates Taken	Suc				6				72	50	36	24
	Unsuc								34	4	12	
Adjustments								10	1	5	2	
Rounds	Fired											
	Observed											
Cartridges fired				2150	1160				860			
Infantry Liaison									4	4	2	1
Special Missions											4	
Ferry Flights												
Bombing Raids					6	19						
Bombs Dropped	50 Kg.											
	20 Kg.											
	10 Kg.											
	Kilos				4456	8008						

Balloons	American	French
Ascensions	25	6
Hours of Flight	100:00	24:00
Adjustments		
Rounds		
Fired		
Observed		

William Mitchell
Colonel, A.S., U.S.A.
Chief of Air Service, First Army

By Thomas S. Bowen
Major, A.S., USA
Operations Officer

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Air Service
First Army

Hostile Movements, Changes and Conduct

September 15th—Enemy aerial activity was very pronounced in its aggressiveness during the greater part of the day. Practically every pursuit patrol which crossed the lines was engaged in combat with the enemy. Enemy pursuit aviation was employed almost entirely by formations of nine planes, but in one or two instances formations of six planes were encountered. In addition to attacking our pursuit planes, the enemy also made determined attempts to destroy many of our balloons, but without success. Anti-aircraft fire was extremely active.

An encampment in the captured salient of St. Mihiel.

By September the line was firmly established from Vandieres, north of Pont-a-Mousson, through Jaulny, Doncourt, and Fresnes-en-Woevre, to Haudimont. The St. Mihiel operation was finished. American units had already begun to leave the area to take up new positions for the Meuse-Argonne Campaign. Of the 75,000 men the Germans had had in the salient at the beginning of the battle, more than 16,000 now were prisoners of war. Of the 550,000 Americans involved in the operation, casualties from all causes, including sickness, amounted to some 11,000.

Orders

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First Army, A.E.F.
Ligny-en-Barrois, September 15, 1918

Field Orders
No. 14

1. The situation remains unchanged.
2. Orders heretofore remain in force without change.
3. The daily issue of field orders will be discontinued, such orders being issued hereafter only when necessary.

. . . . . .

By command of General Pershing:

H. A. Drum
Chief of Staff

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Headquarters Air Service First Army
American Expeditionary Forces
September 15th, 1918

Battle Orders No. 5

1. The 1st Army continues to hold approximately the same line that it had yesterday, and its positions are being consolidated. The enemy's

aviation continues to be about the same as yesterday. It is being used to defend his large strategical centers and feel out the two ends of our line. Movement is reported in his lines from Montmedy towards Longuyon and southeast. Movement is also reported from Sarrebourg towards Metz. Our aviation completely dominates the whole air.

2. The 1st Army continues to hold its positions.

3. OUR AVIATION WILL FORM A STRONG BARRAGE OVER THE WHOLE POSITION SO AS TO ENTIRELY STOP HOSTILE RECONNAISSANCE AND PROTECT OUR OBSERVATION AVIATION AND TROOPS.

4. (a) The Corps Air Services. The same as in Battle Orders No. 4.

(b) The Army Observation Group (Reynolds). The same as in Battle Orders No. 4.

(c) The Army Artillery Group (Block). The same as in Battle Orders No. 4.

(d) The 1st Pursuit Wing (Atkinson). The same as in Battle Orders No. 4, except that the 1st Bombardment Group (Dunsworth) will attack the railroad station at Longuyon at daylight.

(e) The 1st Pursuit Group (Hartney). The same as in Battle Orders No. 4.

(f) The Night Bombing and Reconnaissance Wing (Villome) will execute the night reconnaissance provided for. The stations at Longuyon and Conflans and any railroad trains seen moving in that area will be attacked during the nights of September 15th and 16th with all available forces.

(g) The French Air Division (Vaulgrenant). The same as in Battle Orders No. 4.

5. The Equipment Section will hold itself ready to insure the supply and movement of any units required.

6. The 1st Army dropping ground for messages and the 1st Army landing ground remain the same as in paragraph 6, Battle Orders No. 1. The 1st Day Bombardment Group will provide a detail of four command airplanes to take station at Maulan beginning at 7:00 A.M., September 16th.

7. Reports will reach the Chief of Air Service at Headquarters, Air Service, First Army, Ligny-en-Barrois.

A liaison officer from each Corps Air Service, each Wing or independent group of the Army Air Service and the French Aerial Division, will report at the Headquarters C.A.S., 1st Army, at 21:00 H each day to receive orders.

A liaison officer for the Night Bombardment Wing (Villome) will report at the Headquarters, C.A.S., 1st Corps, at 14:00 H each day to receive orders.

Wm. Mitchell

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Headquarters, Air Service, First Army
American Expeditionary Forces
France, September 16th, 1918

From: Chief of Air Service, First Army
To: Chief of Staff, First Army
Subject: Confirmation of aerial combats.

It is requested that orders be issued to all units to report immediately by written report of witnesses, all aerial combats, stating the time, date and locality, and any other circumstances in connection therewith, to enable this office to make confirmation. And further, to report in writing all crashed machines found, giving type, location, markings, and other data that may help in making confirmations.

T. DeW. Milling
Colonel, A.S., U.S.A.
Chief of Staff

For and in the absence of the C.A.S.

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First Pursuit Group
Operations Office
Sept. 15, 1918

Operations Order
Number 130.

1. The following schedule of operations is announced as effective for tomorrow Sept. 16, 1918.
2. The 1st Army will aim at their new objectives throughout the day, and the Air Service will be on the offensive along the entire line of the sector which will be Chatillon-sous-les-Cotes to Etang-de-Lachaussee, both included. The object being to destroy all enemy air service, to attack his troops on the ground where ordered and to protect our planes and ground troops.
3. This Group will maintain a barrage against hostile aviation: observation aviation will be protected and hostile balloons will be attacked opposite the front of the 5th Corp.

4. The following patrols will be maintained throughout the day:

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to Etang-de-Lachaussee.
94th	5 h 45 to 7 h 15, 10 h 45 to 12 h 15, 15 h 45 to 17 h 15.
147th	7 h 00 to 8 h 30, 12 h 00 to 13 h 30, 17 h 00 to 18 h 30
95th	8 h 15 to 9 h 45, 13 h 15 to 14 h 45, 18 h 00 to darkness
27th	9 h 30 to 11 h 00, 14 h 30 to 16 h 00

5. Each patrol will consist of two (2) echelons of six (6) planes each with the exception of the second set of patrols, that is, from 10 h 45 to 16 h 00 which will be four (4) planes each. The patrols of the lower echelon will operate from an altitude of 2500 to 3500 meters, and the patrols of the upper echelon from an altitude of 3500 to 5500 meters.

6. In addition to the above a mobile reserve of one flight will be maintained throughout the day commencing at 9 h 00. The 94th Squadron will hold its flight on alert while the 27th is on patrol and vice versa, and the 95th Squadron will hold its flight on alert while the 147th Squadron is on patrol and vice versa.

7. The 94th and the 147th will report for duty at this office at 10 h 00 for instructions. At least one officer and transportation will be furnished by each Squadron and upon completion of their mission a written report will be rendered to the Group Operations. The 27th and 95th will report at 14 h 00 under the same conditions.

8. These orders may be changed before midnight if special orders are received from the C.A.S. 1st Army.

9. The mobile flight of the 94th Squadron will find itself at an altitude of 3000 meters at 9 h 30 to protect three Salmsons from the 2nd C.A.C. over the following town: Dampvitoux, Lachaussee, Jonville and Butgneville.

By order of Major Hartney

Romer Shawhan
1st Lt. A.S., S.C.
Group Operations Officer

—428—

Operations Office
27th Aero Squadron
1st Pursuit Group
Sept. 15, 1918

Operations Order
No. 126

1. The following schedule of operations is announced as tentative for tomorrow, Sept. 16, 1918.

MISSION	REGION
Patrol	Chatillon-sous-les-Cotes to Etang-de-Lachaussee
Time	9 h 30 to 11 h 00 14 h 30 to 16 h 00

2. In addition to the above, "C" Flight will be on alert from 10 h 45 to 12 h 15, and "A" Flight will be on alert from 15 h 45 to 17 h 15.

3. Flight Commanders will read Group Operations Order No. 130 in Operations Office, before going on patrol. Patrol leaders will report at Group Operations Office 45 minutes before going on patrol. All pilots whose ships are serviceable will report in squadron operations office 45 minutes before the first patrol.

—429—

95th Aero Squadron
September 16, 1918

Operations Order
No. 104

1. Patrols

13 h 15 to 14 h 45	Lieuts. Buckley, Hall, Weatherhead, Holden of 3rd flight. Lieuts. Mitchell, Heinrichs, Proudfit, and Taylor of 2nd flight.
18 h to Darkness	Lieuts. Buckley, Hall, Weatherhead, Holden. Lieuts. Heinrichs and Taylor. Lieuts. McLanahan, Eoff, Curtis, Gravatt, Knowles and Woodard.

2. Alerts.

12 h 00 to 13 h 15	Second flight
17 h 00 to 18 h 30	First flight

--430—

Headquarters, First Pursuit Wing
Air Service, American E.F.
September 15th, 1918

Operations Order
Number 16.

1. Information of the enemy: Nothing to report.

2. Plan of Operations: We will maintain our Pursuit Barrage.

The Day Bombardment Aviation will attack the objectives indicated in Paragraph 4.

3. First Pursuit Wing:

(A) The Sector of the Wing from the line Vigneulles—Lauchaussee—Puxieux to the line Port-sur-Seille—Coin.

(B) The Second Pursuit Group will be responsible for the front of the Wing from Day-light to 9 h 15 and will hold an alert of 2 squadrons from 12 h 30 to dark.

(C) G. C. 16: will be responsible for the front of the Wing from 9 h 00 to 12 h 45 and will hold an alert from 6 h 30 to 12 h 30.

(D) The Third Pursuit Group: will be responsible for the front of the Army from 12 h 30 to dark.

(E) Alerts will consist of 2 squadrons and will be used to furnish urgent protection for Army Corps Observation Squadrons and for the Army Observation Group. In addition the alert may be sent out to counter attack hostile aviation on orders from these Headquarters.

4. The first Day Bombardment Group will attack Longuyon. An expedition against this objective will be sent off as soon as there is sufficient day-light for the plane to leave the airdrome. If unable to reach this objective the Secondary Objectives heretofore attacked by this Group may be attacked, but every effort, consistent with atmospheric conditions, will be made to attack Longuyon.

By order of Lieut. Colonel Atkinson,

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

—431—

Headquarters
2nd Pursuit Group 1st Pursuit Wing
Operations Office
September 16, 1918

Operations Order
No. 60

1. Position of the front line is unchanged.

2. The sector of the Group is from the line Vigneulles—Lachaussee—Puxieux to the line Port-sur-Seille—Coin.

3. Mission

a) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our corps observation aviation to work.

b) To prevent all enemy planes from crossing our lines.

c) Low patrols will attack all enemy balloons in ascension within the sector.

4. All patrols at 2500 to 3500 meters will be made along a line five to seven kilometers in advance of the line of battle. All patrols at 3500 to 5500 meters will be made along the line six to nine kilometers in advance of the line of battle.

5. Following schedule of alerts and patrols will be in effect September 16th.

	13th Squadron
5:30- 7:30	Patrol entire squadron along the sector altitude 2500 to 3500
12:30-16:00	Entire squadron on the alert.
	22nd Squadron
7:15- 9:15	Patrol entire squadron along the sector altitude 3500 to 5500
16:00-19:30	Entire squadron on the alert.
	49th Squadron
5:30- 7:30	Patrol entire squadron along the sector altitude 3500 to 5500
12:30-16:00	Entire Squadron on the alert.
	139th Squadron
7:15- 9:15	Patrol entire squadron along the sector altitude 2500 to 3500
16:00-19:30	Entire Squadron on the alert.

6. Squadron on alerts to have pilots at the hangars and all available machines lined up ready to take-off at a moment's notice during the period on alert.

7. All previous orders conflicting with the above are revoked.

By order of Lieutenant Colonel Johnson:

R. U. St. John
2nd Lieut. A.S., U.S.A.
Operations Officer

—432—

Operations Office[a]
13th Aero Squadron
September 16th, 1918

Flying Order
Number 48

1. The sector of the Group is from the line Vigneulles, Lachaussee, Puxieux to the line Port-sur-Seille, Coin.

2. Mission

(a) To create an area 5 kilometers in front of our advancing lines in which it will be safe for our corps observation planes to work.

(b) To prevent all enemy planes from crossing our lines.

(c) Low patrols will attack all enemy balloons in ascension within the sector.

3. All patrols at 2500 to 3500 meters will be made along a line five to seven kilometers in advance of the line of battle. All patrols at 3500 to 5500 meters will be made along the line six to nine kilometers in advance of the line of battle.

5:30 to 7:30 Patrol entire squadron along the sector altitude 2500 to 3500 meters.

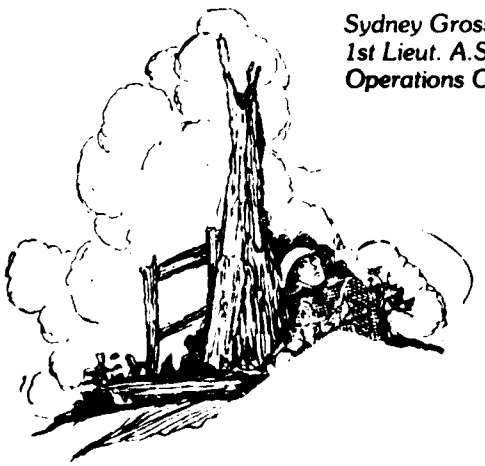
12:30 to 16:30 Entire Squadron will be on the alert.

5.[b] Squadrons on the alert to have pilots at the hangars and all available machines lined up ready to take off at a moment's notice during the period on the alert.

6. All previous orders conflicting with the above are hereby revoked.

By order of Captain Biddle

Sydney Gross
1st Lieut. A.S.U.S.A.
Operations Officer



—433—

Operations Office
22nd Aero Squadron
2nd Pursuit Group
September 16, 1918

Operations Orders
No. 25.

1. The following schedule of Patrols and Alerts will be in effect Sept. 16th.

7:15-9:15 Patrol Entire Squadron along the sector. Alt. 3500-5500 M.

16.00-19.30 Entire Squadron on the Alert.

By order of Capt. Bridgman

George B. Gillson
2nd Lt. A.S. U.S.A.
Operations Officer

—434—

Third Pursuit Group
Operations Office
September 16th, 1918

Operations Order
No. 53.

1. The sector of the Group extends from the line Vigneulles—Lachaussee—Puxieux to the line Port-sur-Seille—Coin.

2. Patrols will consist of all available planes. Those in the lower tier will operate at an altitude of 2500 meters to 3500 meters and those in the upper tier at an altitude above 3500 meters.

3. Every effort will be made to create an area, 5 kilometers in the rear of the enemy's lines, in which it will be safe for our Corps Observation to work, and patrols will remain out for the full time scheduled.

4. The following schedule of patrols is in effect today:

12:30-14:15 Upper tier, 93rd Squadron.
Lower tier, 93rd Squadron.

14:00-15:45	Upper tier, 213th Squadron.
	Lower tier, 213th Squadron.
15:30-17:15	Upper tier, 103rd Squadron.
	Lower tier, 103rd Squadron.
17:00-18:45	Upper tier, 28th Squadron.
	Lower tier, 28th Squadron.
17:45-19:30	Upper tier, 93rd Squadron.
	Lower tier, 213th Squadron.

By order of Major Thaw

R. Soubiran
Captain, A.S., U.S.A.
Operations Officer

—435—

103d Aero Squadron

Flying Orders for September 16th, 1918.

15.30-17.15—2 patrols of all available planes, one patrol to operate at an altitude from 2500 to 3500 meters and the other to operate above 3500 meters.

The sector of this Group extends from the line Vigneulles—Lachaussee—Puxieux to the line of Port-sur-Seille—Coin.

Every effort will be made to create an area, 5 kilometers in the rear of enemy lines, in which it will be safe for Corps Observation work and patrols will remain out for the full time scheduled.

—436—

Operations Office
213th Aero Pursuit Squadron
September 16th, 1918

Operations Order
Number 20.

1. The sector of the Group extends from the line Vigneulles—Lachaussee—Puxieux to the line Port-sur-Seille—Coin.

2. Patrols will consist of all available planes. Those in the lower tier will operate at an altitude from 2000 to 3500 meters and those in the

upper tier will operate at an altitude above 3500 meters.

3. Every effort will be made to create an area, 5 kilometers in the rear of enemy's lines, in which it will be safe for Corps Observation work, and patrols will remain out for the full time scheduled.

4. The following schedule of patrols is in effect today.

14:00-15:45	Upper tier
14:00-15:45	Lower tier
17:45-19:30	Lower tier (93rd squadron-upper tier).

By order of Lieut. Hambleton

E. N. Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

—437—

Headquarters, 20th Aero Squadron
First Day Bombardment Group
September 16th, 1918

Operations Order
No. 7

The following named officers will stand by at 5:00 a.m. September 16th, 1918, for a bombing mission to be designated later.

Their position in the formation will be as follows:

1
Lt West
Lt Frank (774)

3 2

Lt Leach — Lt Howard
Lt Wilmer (546) — Lt Parrott (584)

5 4

Lt Townes — Lt Mandell
Lt Bunkley (792) — Lt Fiske (445)

6
Lt Seaver
Lt Stokes (448)

Charles H Konantz
2nd Lt A S U S A
Operations Officer

—438—

Headquarters, 20th Aero Squadron
A.P.O. 703, A.E.F., France
Sept 16, 1918

Operations Order
No. 8

The following named officers will stand by at 10:00 a.m. Sept. 16th 1918, for a bombing mission to be designated later.

Their position in the formation will be as follows:

1
Lt Howard
Lt Parrott (584)

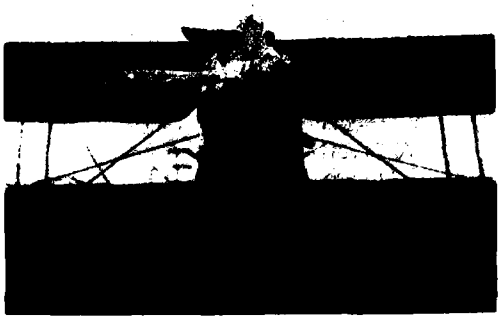
3 2
Lt Wiser — Lt Edwards
Lt Christian (776) — Lt Endler (774)

5 4
Lt Koepfgen — Lt Harris
Lt Hicks (462) — Lt Ramsey (792)

7 6
Lt MacWhirter — Lt Tucker
Lt Holt (286) — Lt Faulk (802)

8
Lt Sellers
Lt Payne (486)

Charles H Konantz
2nd Lt A S U S A
Operations Officer



Loaded bomb rack on a Breguet.

—439—

Headquarters, 20th Aero Squadron
September 16, 1918

Operations Order
No. 9

The following named officers will stand by at 4:00 p.m. this date, for a bombing mission to be designated later.

Their position in the formation will be as follows:

1
Lt Sellers
Lt Payne (486)

3 2

Lt Mandell — Lt Leach
Lt Fiske (445) — Lt Wilmer (286)

5 4

Lt West — Lt Edwards
Lt Frank (802) — Lt Endler (408)

Charles H Konantz
2nd Lt A S U S A
Operations Officer

—440—

Operations Office
96th Aero Squadron
Sept. 16, 1918

Operations Order No. 65

The following pilots and observers will stand by at 4:45 A.M. for raid at 5:00 A.M.

Position	Pilot	Observer	Plane No
	Flight leader		
1	Lt D H Young	Lt H G Rath Lt E E Evans	12
2	Lt Anderson	Lt Thompson	14
3	Lt Bates	Lt Pressler	15
4	Lt P C Young	Lt Bleecker	20
5	Lt Taylor	Lt Stuart	4
6	Lt Ten Eyck	Lt Smith	1
7	Lt Elliott	Lt Ellis	8
8	Lt Baker	Lt Milner	5

E E Evans Operations Officer
1st Lt. A S U S A

—441—

Operations Office
96th Aero Squadron
Sep 16, 1918

Operations Order No 66

The following pilots and observers will stand by at 10:00 A.M. for raid

Position	Pilot	Observer	Plane No
	Flight leader		
1	Lt Gaylord	Lt. Lunt	20
2	Lt Beverly	Lt Newberry	14
3	Lt Turnbull	Lt Cawston	18
4	Lt Lakin	Lt Douglas	15
5	Lt Rogers	Lt Strawn	8
6	Lt Codman	Lt Pressler	1
7	Lt Hopper	Lt Kelly	5
8	Lt Forshay	Lt O'Donnell	4

E E Evans Operations Officer
1st Lt A S U S A

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Operations Office
96th Aero Squadron
Sep 16, 1918

Operations Order No 67

The following pilots and observers will stand by at 4:00 P.M.

Position	Pilot	Observer	Plane No
	Flight leader		
1	Lt Anderson	Lt H S Thompson	14
2	Lt D H Young	Lt Hexter	18
3	Lt Codman	Lt McDougal	20
4	Lt Taylor	Lt Stuart	4
5	Lt C P Young	Lt Bleecker	15
6	Lt Elliott	Lt Ellis	8
7	Lt Ten Eyck	Lt Smith	5
8	Lt Rogers	Lt Strawn	1

E E Evans Operations Officer
1st Lt A S U S A

—443—

Headquarters 91st Aero Service Squadron

Mission for Sept 16th, 1918

Reconnaissance.

At 4:30

Lt Lawson — Lt Cook

Photography

At 8:30 (Outlined in White)

Lt Hammond — Lt Diekema
Lt Badham — Lt Kenney

Waville, Arnaville, Metz at 8:30

Lt Lowry — Lt Guilbert
Lt Jannopoulo — Lt Kelty

Protection

At 8:30 (Outlined in White)

Lt Martin — Lt Delana

Waville, Arnaville, Metz at 8:30

Lt Richardson — Lt Baker.

By order of Major John N. Reynolds.

John H. Snyder, 2nd Lt. A.S.
Operations Officer

—444—

Headquarters
90th Aero Squadron
Observation Group—Fourth Army Corps
Sept. 16, 1918

Reconnaissance

Observers	Pilot	Plane No.	Time
Lt. Hayden, V.B.	Lt. Pierson, N.E.	14	5:45
	Protection		
Lt. Grier, A.T.	Lt.Broomfield, H.	20	5:45

Lt. Young, J.S. will relieve Lieut. Lee as Officer in charge of field.

By order of Lt. Schauffler,

Morton B. Adams, 1st Lt.
Chief Observer

Reports

—445—

27th Aero Squadron, A.S.
Operations Office
1st Pursuit Group
September 16th, 1918

Supplementary report to operations of Sept. 15th, 1918.

1)—1 Alert. 18 h 50 to 19 h 40, 8 planes. Lts. Grant (leader) Lyman, Roberts, Rucker, Clapp, Vasconcells, Wehner and Luke. Alt. 500 to 1000 meters. Lt. Luke did not return on the patrol but returned at 12 h 45 Sept 16th. 1918. For result see Lt. Luke's reconnaissance report.

Summary:

a) Sorties	8
c) Combats	1
i) Enemy planes unconfirmed	1 (balloon)
l) Total flying hours	6'40"
m) Total service hours	6'40"
n) Alerts	1

Operations Report, September 16th, 1918

1)—1 Patrol, 9 h 30 to 11 h 05, 9 planes. Lts. Donaldson, Hewitt, Clapp, Hudson, Lennon, Stewart, Roberts, Hoover and Wilson. Alt. 3500 meters.

2)—1 Patrol. 14 h 30 to 16 h 05, 10 planes. Lts. Stout, Nicolson, Wehner, Stewart, Wilson, Lyman, Hewitt, Dawson, Luke and McKimmon. Alt. 3500 meters. Nothing to report.

1)—1 Sortie. 16 h 30 to 16 h 42. 2 planes. Lts. Donaldson and White. Ferrying new machine from Vavincourt.

Summary

a) Sorties	21
d) Pilots available	18
e) Pilots total	19
j) Total planes	25
k) Available planes	17
l) Total flying hours	30'29"
m) Total service hours	30'05"
o) Patrols	2
s) Planes dropped	2
t) Planes received	2

Attack on a German observation balloon. (From a sketch by John MacGilchrist.)

—446—

27th Aero Squadron, A.S.
Operations Office
1st Pursuit Group
Sept. 16th, 1918

Supplementary report to operations of Sept. 16th, 1918.

1)—1 Voluntary Patrol. 18 h 45 to 20 h 30, 2 planes. Lts. Luke and Wehner. Alt. 500 meters. For results see Lts. Luke and Wehner's reconnaissance report.

Summary

a)	Sorties	2
c)	Combats	4
i)	Enemy planes unconfirmed	3 (balloons)
l)	Total flying hours	3'30"
m)	Total service hours	3'30"
q)	Voluntary patrols	1

—447—

27th Aero Squadron
September 16, 1918

Combat and Reconnaissance Reports

Lt. J.F. Wehner reports: Patrol to straffe balloons. Flew North-East passing over Verdun and attacked a balloon in the vicinity of Reville with Lt. Luke at 19 h 05. We each fired one burst when I observed that it instantly caught fire. The observer jumped but was burned by the flaming balloon before reaching the ground. I headed towards the Meuse river trying to pick up another balloon could not locate one so headed towards Verdun. On the way back saw a fire in the vicinity of Romagne which evidently was Lt. Luke's second balloon. While waiting for Lt. Luke near Verdun saw red flare near Mangiennes thinking it our pre-arranged signal from Lt. Luke, I headed in that direction. Saw balloon just above the tree tops near Mangiennes and brought it down in flames with one burst at 19 h 35. Anti-aircraft very active. Two confirmations requested.

Lt. Frank Luke reports: Patrol to straffe balloons. Everything very carefully arranged. Lt. Wehner and I left airdrome passing over Verdun. We attacked balloon in vicinity of Reville at 19 h 03. Both Lt. Wehner

and I shot a burst into it. It burst into flames and fell on observer who had jumped a few seconds before. We started for another balloon in vicinity of Romagne. I attacked and destroyed it. It burst into flames on the ground, burning winch. The anti-aircraft guns were very active scoring several good hits on my plane. The last I saw of Lt. Wehner he was going in a south-easterly direction after the first balloon went down. I shot at supply trains on my way back. Two confirmations requested.

—448—

94th Aero Squadron, Operations Office
September 16th., 1918

To-day's Schedule of Operations.
(Nothing Supplementary to Report)

1. High Patrol Upper Echelon Chatillon-sous-les-Cotes to Etang Lachaussee. (5) Planes. Lt. Jeffers, P.L. 5 h 45 to 7 h 30. Lt. Jeffers, Cook, Palmer, Sherry, and Zacharias. Lieut. Sherry down at 6 h 28 with motor trouble. Altitude attained 5000 meters. No results.

2. Lower Echelon. Chatillon-sous-les-Cotes to Etang Lachaussee. (5) Planes. Lt. Chambers, P.L. 5 h 45 to 7 h 30. Lieut. Kaye, Hopkins, Cates, and Crocker. Lieut. Crocker panned at Lavigneville at 7 h 05. Lieut. Hopkins down at 6 h 22 with motor trouble. Altitude reached 3500 m. No results.

3. Voluntary Patrol Chatillon-sous-les-Cotes to Etang-de-Lachaussee. (1) Plane. Lieut. Rickenbacker. 7 h 57 to 9 h 36. Altitude reached 5500 m. No results.

4. Protection Patrol for (2) Salmson. Region (Dampvitoux-Lachaussee-Jonville and Butgneville.) (5) Planes. Lieut. Taylor P.L. 9 h 16 to 10 h 54. Lieut. Coolidge, Sparks, Scroggie and Snow. Lieut. Scroggie down at 10 h 16 with motor trouble. See reconnaissance report of Lieut. Taylor. Altitude reached 5000 meters. No results.

5. Patrol Chatillon-sous-les-Cotes to Etang-de-Lachaussee. (7) planes. Lieut. Chambers, P.L. 10 h 38 to 12 h 15. Lieuts. Kaye, Cook, Jeffers, Palmer, Cates and Hopkins. See reconnaissance report of Lieut. Chambers. Altitude reached 5000 meters. No results.

6. Trial Flight. One Plane (1). Lieut. Fowler, 13 h 05 to 13 h 57.

7. Protection Patrol Villecey—Lachaussee, St. Hilaire and Jaulny. Ten (10) Planes Lieut. Chambers, P.L. 15 h 08 to 16 h 45. Lieuts. Coolidge, Kaye, Sparks, Cook, Taylor, Cates, Palmer, Zacharias and Jeffers. Lieut. Palmer down at 15 h 33 with motor trouble. Lieut. Zacharias down also with motor trouble at 15 h 24. Mission reported successfully accomplished. Lieut. Jeffers panned near airdrome at 16 h

40. Altitude reached 4800 meters. Lieut. Sparks not heard from as yet.
8. Voluntary Patrol Villecey—Lachaussee, St. Hilaire and Jaulny. One (1) Plane. Lt. Rickenbacker, 16 h 10 to 18 h 10.
9. Trial Flight Lieut. Coolidge 17 h 15 to 17 h 30.

(a) Sorties	36
(b) Trials	2
(c) Combats	1
(d) Pilots Available	10
(e) Total Pilots	20
(f) Pilots Missing	1
(g) Pilots Wounded	0
(h) Enemy Planes Confirmed	2
(i) Enemy Planes Unconfirmed	0
(j) Total Planes	23
(k) Available Planes	13
(l) Total Flying Hours	50 h 37
(m) Total Service Hours	49 h 30
(n) Alerts	0
(o) Patrols	2
(p) Protection Patrols	2
(q) Voluntary Patrols	2
(r) Special Missions	0
(s) Planes Dropped	2
(t) Planes Received	0

J. L. Davitt, 2nd Lieut. AS. USA.

—449—

94th Aero Squadron
9/16/18

Reconnaissance Report

Time out: 9 h 10
Time in: 10 h 50
Max. Altitude: 5100 m.
Mission: Patrol
Pilot: Thorne C. Taylor.

Lt. Taylor Reports: Met one (1) L.V.G. Biplace at 4000 meters on lines near Fresnes. Had sun on him and dove from 5100 meters under tail. Fired 100 rounds. Turned, attacked from right side and put in 125

more rounds. He slipped and then piqued seemingly out of control smoking badly. Thirteen Fokkers appeared diving and I left. Rembercourt burning badly, also Gorze on fire at 10 h 30. Very large explosion in our lines, just below Blercourt at 10 h 40, 10 kilometers south west of Verdun.

J. L. Davitt
2nd Lieut., AS, USA.
Operations Officer

—450—

94th Aero Squadron[a]
9/16/18

Reconnaissance Report

Time out: 10 h 38

Time in: 12 h 21

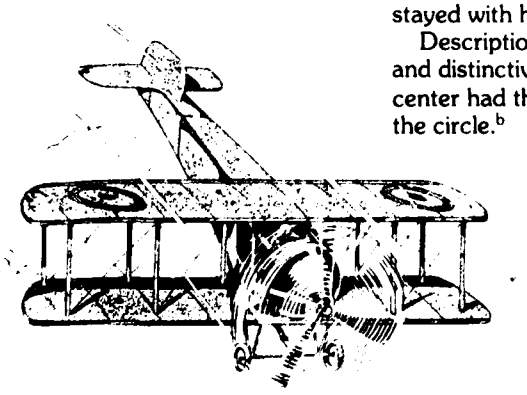
Max. Altitude: 5000

Mission: Patrol.

Pilot: Lieut. Chambers & Kaye.

Lieuts. Chambers & Kaye Report: Met a Rumpler at Fresnes between 4000 and 4500 mts. and chased him for about 45 minutes as far as Charey. He got altitude; 5500 meters, and we climbed to 5100 meters. We both shot all our ammunition with no apparent results. We stayed with him until we ran out of gas and then returned to our lines.

Description of following sketch: Lower wing with usual Camouflage and distinctive markings of white circles on tips of lower wings; the center had the regular camouflage with a narrow white cross inside the circle.[b]



J. L. Davitt
2nd Lieut., AS. USA.
Operations Officer

—451—

94th Aero Squadron
9/16/18

Reconnaissance Report

Time out: 16 h 10
Time in: 18 h 10.
Max. Altitude: 5500
Mission: Voluntary Patrol.
Pilot: Lieut. Rickenbacker.

Lieut. Rickenbacker Reports: Met three (3) Fokkers about 4000 meters at 17 h 20 at Hannonville. Chased him as far as Thionville and fired 50 rounds at him at long range. On way home witnessed between Harville and Moulotte-Labeuville great activity of numerous truck trains going both ways. No apparent results was reported.

J. L. Davitt
2nd Lieut., A.S. USA.
Operations Officer

—452—

Headquarters 95th Aero Squadron
Operations Office
Sept. 16, 1918

Report of Operations

1) Patrol 8 h 15 to 9 h 55; 12 planes; altitude 3500 meters; line—Chatillon to Etang-de-Lachaussee; Lts. McLanahan, Mitchell, Proudfit, Heinrichs, Eoff, Hall, Taylor, Woodard, Knowles, Curtis, Gravatt, and Holden. Lt. Proudfit returned immediately with motor troub'e, nothing to report.

1) Protection patrol 13 h 10 to 15 h 10; 6 planes, altitude 3500 meters; line—Bois of Hadonville and Lake of Lachaussee protection for 2nd Aero [?], C.A.S.; Lt. Taylor had forced landing at Souilly on return; failed to find planes to be protected; nothing to report.

Supplementary

2) Patrol 17 h 55 to 19 h 15; 12 planes; altitude 3500 meters; line—Chatillon to Etang-de-Lachaussee; Lts. Mitchell, Buckely,

Heinrichs, Proudfit, Eoff, Knowles, Curtis, Woodard, Weatherhead, Holden, Hall, and Gravatt; Lt. Proudfit returned immediately with motor trouble, much Allied aerial activity noted, also Allied artillery activity.

1) Special Mission 16 h 15 to 16 h 30; Captain Peterson flew new plane No. 7677 from Vavincourt to field.

Summary

a) Sorties 32
b) Trials 1
d) Pilots available 15
e) Total pilots 18
j) Total planes 25
k) Available planes 16
l) Total flying hours 40 h 15
m) Total service hours 39 h 40
o) Patrols 2
p) Protection patrols 1
r) Special missions 1
s) Planes dropped 1
t) Planes received 1

Edward Butts Jr.
1st Lt AS USA
Operations Officer

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Operations Office
147th Aero Squadron
Amer. E.F.
September 16th, 1918

Daily Report No. 100, Dawn to 18 h. 30m

To: Operations Officer, First Pursuit Group

1. Patrol, 7 planes, Lieut. White (leader), Brotherton, Meissner, Dowd, K.L. Porter, Simonds, and O'Neill. Altitude 4,000 meters. Visibility fair. Mission: Patrol lines between Chatillon-sous-les-Cotes to Etang-de-Lachaussee.

2. Protection patrol, 8 planes, Lieuts. Jones (leader), Brotherton, Meissner, Simonds, Simon, Dowd, Bronson, and O'Neill. Altitude 5,000 meters. Visibility good. Mission: Protection for three Salmsons from the 99th Squadron. Route: Lachaussee to Jonville and return.

Time: 11 h.45m to 13 h.50m. See Reconnaissance Reports. Lt. Simon had forced landing at Daucourt due to broken oil pump.

3. Trials, 2 planes, time 55 minutes.

Summary

a)	Sorties	17
b)	Trials	2
c)	Combats	5
d)	Pilots available	19
e)	Total pilots	23
f)	Pilots missing	0
g)	Pilots wounded	0
h)	E.A. confirmed	0
i)	E.A. Unconfirmed	1
j)	Total planes	24
k)	Available planes	15
l)	Total flying hours	21 h. 55m
m)	Total service hours	20 h. 45m
n)	Alerts	0
o)	Patrols	1
p)	Protection patrols	1
q)	Voluntary patrols	0
r)	Special missions	0
s)	Planes dropped	1
t)	Planes received	0

By order of James A. Meissner

George J. Brew
1st Lt. Air Service, U.S.A.
Operations Officer

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147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Near Lines fair

Mission: Patrol Chatillon-sous-les-Cotes to Etang-de-Lachaussee

Route Actually Followed: Chatillon-sous-les-Cotes to Etang-de Lachaussee

Names of Pilots on Patrol and Leaders: Lts. White (leader), O'Neill, Brotherton, Meissner, Dowd, K.L. Porter and Simonds

Hour of Departure	Hour of Return	Altitude	Squadron	Date
7 h.00	8 h.50	4000 meters	147th	Sept. 16

Number of E.A. Seen: 1 Time: 7 h.50
Number of E.A. Encountered: 1 Time: 7 h.50
Type: Halberstadt, two seaters Altitude: 2500 meters
Region: Vicinity of Chambley Combats: 1
Number of Rounds Fired: 38 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have ;Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A. Allied:
Markings on E.A.

In the Opinion of Those Who Took Part in the Combat, What pilots are Entitled to Share in Confirmation.

Detailed Report of Pilots and Other Observations:

While flying at about 4000 meters over Chambley saw one E.A. two seater Halberstadt with red markings on fuselage. He was flying north and we were headed south. I peaked on him, fired two good bursts of 38 shots, the last burst seen enter fuselage of E.A. I pulled out while the E.A. was in a dive and did not see whether he crashed or not. Time 7 h.50 2500 meters.

Located an archie battery at the edge of the town, apparently Chambley. It is in an open field and is very visible for photography. Visibility rather poor due to sun and haze. Was preparing to locate the battery exactly when I saw the E.A.

W.E. Brotherton
2nd Lt. Air Service, USA

One two seater Halberstadt sighted near Chambley. Lower members of our patrol engaged it, firing as it dove vertically. Remained above for protection. Result of combat unseen. Artillery battery shell fire at Jonville.

R. A. O'Neill
2nd Lt. Air Service, USA

At about 4000 meters, at about 7 h.50 saw an E.A. two seater going north. Patrols engaged it. It was at an altitude of about 2500 meters. I was behind and dove, but could not get any shots in. Archie battery near Chambley.

P. M. Simonds
2nd Lt. Air Service, USA

Saw one E.A. about 7 h.50 peaking into Germany in the vicinity of Chambley, at 2500 meters, followed by several bursts of flares. Halberstadt two seater with red markings on fuselage. Dove on him but could not get in any shots.

M. L. Dowd
2nd Lt. Air Service, USA

S. M. Purcell
2nd Lt. Air Service, USA
Squadron Operations Officer

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147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good
Mission: Protection patrol
Route Actually Followed: Lachaussee to Jonville
Names of Pilots on Patrol and Leaders: Lt. Jones (leader), Brotherton, Simonds, Meissner, Simon, Dowd, Bronson and O'Neill

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11 h.45	13 h.25	5000	147th	Sept. 16

Number of E.A. Seen: 3 Time: 12 h.50
Number of E.A. Encountered. 3 Time: 12 h.50
Type: Halberstadt Altitude: 4400
Region: Hageville Combats: 3
Number of Rounds Fired: 150 Confirmations Requested: Yes
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: 1 Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation: Lt. L. C. Simon, Jr.

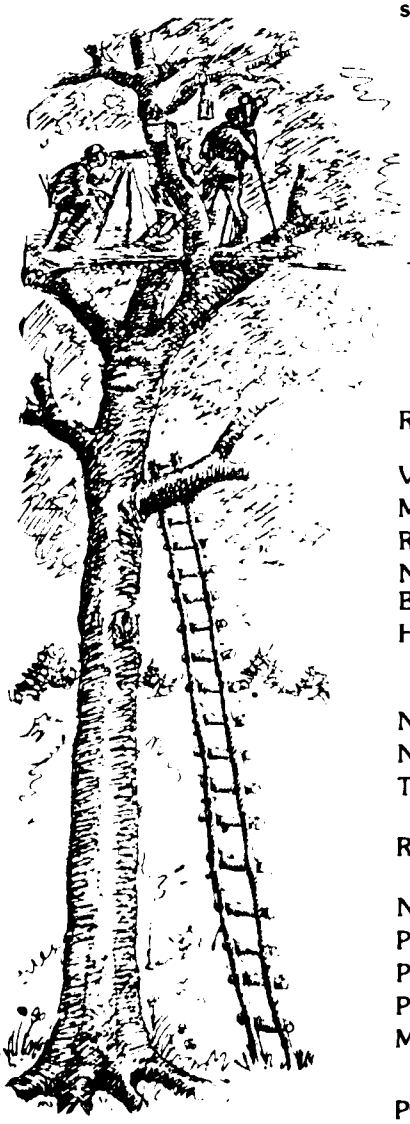
Detailed Report of Pilots and Other Observations:

I left the patrol at about 12 h.40 on account of bad oil broken pump and thermometer. Had been fired on by a two-seater E.A. type Halberstadt at about 12 h.30 in the vicinity of Hageville. At about 12

h.45 in the vicinity of Hadonville 3 E.A. Halberstadt two-seaters fired upon me and tried to cut me off from the lines. After being fired upon I got into position and fired on one plane which was last seen going down in a straight nose in the vicinity of Etain. I crossed the lines north-east of Verdun and landed at a French airdrome at Daucourt. The fight started at 4400 meters and when I crossed the lines I was at 300 meters.

Lt. L. C. Simon, Jr.
2nd Lt. Air Service, USA

George J. Brew
1st Lt. Air Service, USA
Squadron Operations O



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147th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good
Mission: Protection for Salmsons from 99th Squadron at Souilly
Route Actually Followed: Lachaussee to Jonville and return
Names of Pilots on Patrol and Leaders: Lts. Jones (leader) Brotherton, Simonds, Meissner, Simon, Dowd, Bronson, O'Neill

Hour of Departure	Hour of Return	Altitude	Squadron	Date
11 h.45	13 h.50	5000 meters	147th	Sept. 16

Number of E.A. Seen: 5 Time: 12 h.40
Number of E.A. Encountered: 3 Time: 12 h.50
Type: 3 Halberstadt 2 seaters, 2 unknown Altitude: 4500 meters
Region: Etang-de-Lachaussee and 1 E.A. at Ornes Combats: 4
Number of Rounds Fired: 100 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

While escorting Salmsons over the lines observed 2 E.A., type unknown, at an altitude of about 4500 meters over the Etang-de-Lachaussee, flying some distance to our right and headed north. Shortly afterwards, met two Halberstadts two-seaters, over the Etang-de-Lachaussee. One came towards the Salmson so I came in between the two. The E.A. turned into Germany and the observer shot one burst at me doing no damage. I did not fire at the E.A. because of long range and instead [stayed] with the photo plane. Time about 12 h.50.

W. E. Brotherton
2nd Lt A.S. USA

Was fired upon by two Halberstadts, two-seaters, which went into Germany. Stayed with Salmson.

James A. Meissner
1st Lt. A.S. USA

I lost my patrol and shortly afterwards observed three Spads climbing and going north. I thought it was part of our patrol so joined them but did not catch them until I reached Moranville where they looked over an Allied two-seater Salmson. At Ornes we sighted an E.A. two-seater Halberstadt at 4000 meters. I fired 100 rounds at long [range] but did not bring him down. I found out that the patrol I joined was a French patrol.

F. M. Simonds
2nd Lt. Air Service, USA

George J. Drew
1st Lt. A.S. USA

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First Pursuit Group
Operations Office
Sept. 16th, 1918

1. Atmospheric conditions. Visibility rather poor during the early patrols, but clearing as the day advanced.

2. Enemy Aerial Activity.

(a) Airplanes. Enemy patrols active all along our sector flying in formations of three (3), nine (9) and thirteen (13).

(b) Balloons. Only a few balloons seen in ascension which had been pulled to the ground by the time our patrols had dispatched to destroy them.

(c) A.A.A. Rather active in the vicinity of Etain.

3. Activity of our own aviation.

(a) 1 Patrol. 5 h 45 to 7 h 30, 10 planes, altitude 5000 meters. Chatillon to Etang-de-Lachaussee. 94th Squadron. Nothing to report. Lt. Crocker had forced landing at Lavigneuville.

1 Patrol. 7 h 00 to 8 h 50, 7 planes, altitude 4000 meters. Chatillon to Etang-de-Lachaussee. 147th Squadron. See reconnaissance reports attached.

1 Patrol. 8 h 15 to 9 h 55, 12 planes, altitude 3500 meters, Chatillon to Etang-de-Lachaussee. 147th Squadron. See reconnaissance reports attached.

1 Patrol. 9 h 30 to 11 h 05, 9 planes, altitude 3500 meters. Chatillon to Etang-de-Lachaussee. 27th Squadron. Nothing to report.

1 Patrol. 10 h 38 to 12 h 15, 7 planes, altitude 5100 meters. Chatillon to Etang-de-Lachaussee, 94th Squadron. See reconnaissance report attached.

1 Patrol. 14 h 30 to 16 h 05, 10 planes, altitude 3500 meters. Chatillon to Etang-de-Lachaussee. Nothing to report. 27th Squadron.

(b) 1 Protection Patrol. 9 h 16 to 10 h 54, 5 planes, altitude 5000 meters. Dampvitoux, Lachaussee, Jonville, and Butgneville. For 2nd French Army Corps. 94th Squadron. See reconnaissance report attached.

1 Protection Patrol. 13 h 10 to 15 h 10, 6 planes, altitude 3500 meters Bois of Haddonville and Lake of Lachaussee. For the 2nd Aero [?], C.A.S. 95th Squadron. Nothing to report. Failed to find planes to be protected. Lt. Taylor had forced landing at Souilly.

1 Protection Patrol. 11 h 45 to 13 h 50, 8 planes, altitude 5000 meters. Lachaussee to Jonville, for 99th Squadron. 147th Squadron. See reconnaissance report attached. Lt. Simon had forced landing at Daucourt.

1 Protection Patrol. 15 h 08 to 16 h 45, 10 planes, altitude 4800 meters. For 2nd French Army Corps. 94th Squadron. Mission successful.

(c) 1 Voluntary Patrol. 7 h 57 to 9 h 36, 1 plane, altitude 5500 meters. Chatillon to Etang-de-Lachaussee. 94th Squadron. Nothing to report.

1 Voluntary Patrol. 16 h 10 to 18 h 10, 1 plane, altitude 5000 meters. Villecey—Lachaussee, St. Mihiel and Jaulny. 94th Squadron. Nothing to report.

(d) 1 Alert. 18 h 50 to 19 h 40, 8 planes, altitude 500 to 1000 meters. To discover E.A. artillery in the vicinity of Jonville. 27th Squadron. See reconnaissance report attached.

4. Miscellaneous. Certificates have been attached to reconnais-

sance reports the last three days in the instance of two (2) victories for Lt. Rickenbacker, 94th Squadron, two (2) for Lt. Luke of the 27th Squadron and one (1) for Lt. Wehner of the 27th Squadron which have established the correctness of their claims. It is requested that these victories be published in order that they may be considered official.

Group Summary.

(a) Sorties ..... 114.
(b) Trials ..... 5.
(c) Combats ..... 6.
(d) Pilots Available ..... 7.
(e) Total pilots ..... 80.
(i) Enemy planes unconfirmed ..... 1 and 1 balloon.
(k) Total planes ..... 97.
(l) Total flying hours ..... 149 h 56
(m) Total service hours ..... 146 h 40
(n) Alerts ..... 1.
(o) Patrols ..... 7.
(p) Protection patrols ..... 4.
(q) Voluntary patrols ..... 2.
(s) Planes dropped ..... 6.
(t) Planes received ..... 4.

	27th	94th	95th	147th
Pilots total	19	20	18	23
Pilots available	18	19	15	19
Planes total	25	22	23	24
Planes available	17	13	17	15

Romer Shawhan
1st Lieut. A.S.U.S.A.
Group Operations Officer

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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Excellent.

Mission: Patrol.

Route Actually Followed: Toul, Pont-a-Mousson, Lachaussee.

Names of Pilots on Patrol and Leaders: Captain Biddle, Major Spatz, Lieuts. McAteer, Bartron, Brewer, Elliott, Guthrie, Stiles, Este, Richards, Howe, Stovall, Hays, Seerley, Brodie, Stivers.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
5:45	7:45	3800 meters	[13th]	Sept. 16

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Balloon in ascension region of Puxieux attacked at 7:15. Fired several hundred rounds. I had very few incendiary bullets in my guns and balloon did not catch fire but was pulled down. Enemy balloon seen in its Bed near Puxieux and another near Onville-sur-Mad. Balloon near Goin a short distance up. Major Spatz reports combat at 7:30 2 kilometers south of Metz. He was flying with upper formation of squadron when leader failed to follow him. I dove for balloon, but flew toward Metz and formation was attacked from above by 9 Fokkers. Lieut. Brodie had forced landing at Azelot. Lieuts. Stiles and Guthrie not yet heard from 8:45.

Chas. J. Biddle
Captain, A.S.U.S.A.

Was flying towards Pont-a-Mousson from Metz when I saw seven Fokkers coming out of the sun, but not headed to us. Went down to signal the leader that and just as I started to wiggle my wings the E.A. turned and dove on us. Was not more than twenty meters from Lieut. Stiles and pointed to E.A. besides waving my wings, could see his face plainly, but he did not seem to realize what was happening. Continued to signal him when saw E.A. were within one hundred to two hundred meters, then went into vertical dive. Just then saw the tracers start over my head. There were two other Spad planes, one a good distance to my right, which I saw wave his wings and one to our left which was closer and which I did not see attack. When pulled out of dive my engine, which had been bad, stopped and was forced to land between Dieulouard and Toul.

M. K. Guthrie
1st Lieut A.S.U.S.A.

Lieut. Stiles leading high patrol, one other man and myself, broke contact with him and low patrol about 7:20 A.M. Crossed lines at Thiaucourt, to Chambley. Circled down about 1000 meters here. Continued to point 2 kilos. South of Metz. Heavy anti aircraft. Jumped from above and in sun by 9 Fokkers. Dove plane past leader waving my wings and continued down followed by two Fokkers. Turned to left and climbed about 3 kilometers north of Pont-a-Mousson. Flew east parallel to lines followed by two Fokkers parallel and above me in German side. Could not get altitude on them. Returned to airdrome. German planes started firing first after I found leader and waved wings.

After Captain Biddle dove I followed 3000 meters following plane in position 7. I was flying 8. Lost sight of other planes down below. Circled around 3 minutes at 2500 meters looking for others below when companion plane headed due north. Followed short distance. Motor stopped lack of gas. Turned on Nourrice and headed due south. Saw 3 Spads 5000 meters above, 500 ahead. While climbing to join them four Fokkers attacked the 3 Spads from N.E. Pulled up at Fokker which passed over head and fired 2 bursts. Three Spads turned around and chased four Fokkers N. when last seen. Motor lasted till east of Nancy. Spent night north with British Squadron No. 55. Returned 10:30 A.M. Plane O.K.

C. A. Brodie
1st Lieut. A.S.U.S.A.

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13th Aero Squadron

Reconnaissance Report

Visibility Near Lines: Fair.
Mission: Trial Flight.
Route Actually Followed: Dieulouard towards Beney, Pont-a-Mousson
Names of Pilots on Patrol and Leaders: Lieut. Brewer

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:50	14:50	5000	13th	Sept. 16

Number of E.A. Seen: 2 Time: About 1:00 to 2:00
Number of E.A. Encountered: 1 Time: 1:50
Type: Rumpler Altitude: 5000
Region: Pont-a-Mousson Combats:
Number of Rounds Fired: 100 Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Went out on trial flight, saw Rumpler above at about 5200 meters over Pont-a-Mousson, I being about 4500 meters. Climbed up towards him. He saw me and started back towards his own lines. I fired about 100 rounds at about 500 meters from slightly below without apparent effect. Saw another Rumpler with white tail cross over just west of Pont-a-Mousson, but he evidently saw me as he turned back and disappeared.

L. Brewer
1st Lieut. A.S.U.S.A.

A German Rumpler.

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22nd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: Patrol (sector)

Route Actually Followed: Toul—Pont-a-Mousson—Vigneulles —Hamonville—Toul

Names of Pilots on Patrol and Leaders: Lt. Sperry (leader) Lts. Tyndall, Jones, Tucker, Little, Agar, La Force, Capt. Bridgman, Hudson, Richter, Beane

Hour of Departure	Hour of Return	Altitude	Squadron	Date
7.07	9.15	5000 M.	22nd	Sept. 16.

Number of E.A. Seen: 8 Time: 8.50

Number of E.A. Encountered: Time:

Type: Not known Altitude: 5000 M

Region: Combats:

Number of Rounds Fired: Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Small villages smoking between Rembercourt and Hadonville-Lachaussee. Nothing else to report.

J. A. Sperry
1st Lt. A.S. U.S.A.

Observed shells bursting on Metz. Also saw a few small fires in German territory. Saw 4 enemy planes away back of Pont-a-Mousson. Saw 4 enemy planes West of Mars-la-Tour, and well inside the German lines.

R. J. Little
1st Lt. A.S. U.S.A.

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Headquarters 2nd Pursuit Group
1st Pursuit Wing

Report of Operations #80

From 17 h 00 Sept. 15th to 17 h 00 Sept. 16th
Weather: Fair. Visibility Good.

I. Patrols
1. Port-sur-Seille, Lachaussee
5 h 45-7 h 45
3800 meters
16 planes 13th
See pilots report
2. Lachaussee, Gorze, Pont-a-Mousson
6 h 05-7 h 50
4500 meters
13 planes 49th
See Lt. Bridgman's report.
3. Pont-a-Mousson, Vigneulles, Arnaville
7 h 00-9 h 15
5000 meters
12 planes 22nd
Small villages seen smoking around Rembercourt and Lauchaussee. Nothing else to report.
4. Lachaussee, Louvigny
7 h 29-9 h 22
3500 meters
10 planes 139th
Nothing to report
5. Toul, Ars, Xonville, Toul
9 h 55-11 h 50
5700 meters
1 plane 49th
See pilots report.

II. Protections
None

III. Alerts
1. To bring down balloon Rembercourt, Preny
16 h 54
13 planes 139th
Not in. Will show on tomorrow's report.

IV. Trials

1. 7 h 55-8 h 15
   1 plane 13th
   Testing
2. 16 h 20-18 h 25
   1 plane 139th
   Testing
3. 8 h 40-8 h 50
   2 planes 13th
   Testing
4. 9 h 55-11 h 20
   1 plane 49th
   Testing
5. 9 h 55-10 h 15
   1 plane 13th
   Testing
6. 11 h 40-11 h 55
   1 plane 13th
   Testing
7. 12 h 50-14 h 50
   1 plane 13th
   1 combat. See pilot's report.
8. 15 h 10-15 h 20
   1 plane 13th
   Testing
9. 16 h 15-16 h 50
   1 plane 13th
   Testing
10. 16 h 30-16 h 50
    1 plane 13th
    Testing

V. Miscellaneous

1. Lt. Robert M. Stiles 13th Sqdn. had not returned from patrol which left at 5.45. He was seen at 7.20 region south of Metz when attacked by 9 Fokkers.

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28th Aero Pursuit Sqdn.
Third Pursuit Group
Operations Office
Sept. 16, 1918

Daily Operations Report

Patrols

1. 17:25 to 19:25, September 15. 11 planes. 28th Sqdn. Routes: Void, St. Mihiel, Fresnes, Arnaville, Vaucouleurs. Altitude 3500 meters. *See reconnaissance report.* Lts. Turnure, Cassady, Merrick, Moriarty, Bell, Jebb, Philbrick, Merrill, Hardy, Greenhalgh, Jones, Jacques. Lt. Jones landed en panne at 2nd Pursuit Group at 19:35 returning to field following day. Lt. Philbrick landed en panne at Boncourt at 17:50 returning to field following day Sept. 15th. Lt. Jebb landed en panne at Gironville doing some damage to machine, extent not known.

Trial flights:

1. 18:15 to 18:40 one plane testing.

Summary

Sorties	12
Trials	1
#No. Pilots Available	21
Total planes	26
Available planes	15
Total flying hours	22:25
Total service hours	22:00
Patrols	2
Planes not returned	1
Planes crashed	1
#No. Pilots assigned	22

#Number not including Commanding Officer.

By order of Lt. Jones.

A.B. Hill A.S., U.S.A.
2nd Lieut.
Operations Officer

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93rd Aero Pursuit Squadron
Third Pursuit Group
Operations Office
Sept. 16, 1918

Daily Operations Report

I. Patrols

1. 17:30-19:15 10 planes, 93rd Squadron, Route: Vaucouleurs—Pont-a-Mousson—Louvigny—Corny—Chambley—Charey—Thiaucourt—Pont-a-Mousson—Vaucouleurs. Altitude: 4500 meters. See Reconnaissance report. Lts. Rummell, Wright, Case, Hartman, Merz, Cox, Evans, Ball, Fuller, and Lindsley. Patrol encountered 7 E.A. near Charey at 18:15, fired 400 rounds. Confirmation requested on one E.A.

2. 12:30-14:05 5 planes, 93rd Squadron. Route: Vaucouleurs—Pont-a-Mousson—Rembercourt—Lachaussee—Thiaucourt—Pont-a-Mousson—Vaucouleurs. Altitude: 4000 meters. Nothing to report. Lts. Gude, D'Olive, Cox, Rummell, and Long. Lt. Long forced to land at British Airdrome east Colombey-les-Belle.

3. 12:30-14:15 6 planes 93rd Squadron. Route: Vaucouleurs—Pont-a-Mousson—Lorry—Chambley—Thiaucourt—Villers-en-Haye—Vaucouleurs. Altitude: 3000 meters. See Reconnaissance Report. Lt. Wright, Patterson, Ball, Carruthers, Evans, and Lt. Lindsley. At 15:05 patrol encountered one E.A. near Chambley. Fired 100 rounds with no apparent effect. Lt. Lindsley forced to land near Villers-en-Haye.

II. Trial Flights

1. 18:20-18:40 1 plane, Lt. Harding testing.
2. 11:10-11:20 1 plane, Lt. Long, testing.
3. 11:25-12:00 1 plane, Lt. Maxwell, testing.
4. 15:00 Lt. Evans returned from forced landing Toul.
5. 14:45 Lt. Wright returned from forced landing Villers-en-Haye.
6. 16:10-16:20 1 plane. Lt. Barry testing.
7. 16:40 Lt. Long returned from forced landing near Colombey-les-Belle.
8. 17:20 Lt. Carruthers returned from forced landing Toul.
9. 11:25-12:05 1 plane Lt. Long testing.

III. Summary

Sorties	30
Trials	9
Combats	2
*Pilots available	22
Enemy planes unconfirmed	1

Total planes	25
Available planes	11
Planes not returned	1
Total flying hours	32:55
Total service hours	30:00
Patrols	3
*Pilots assigned to Squadron	23

*Not including Commanding Officer

By order of Major Huffer

Earl W. Martin
2nd Lt. A.S., U.S.A.

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Good

Mission: Patrol

Route Actually Followed: Vaucouleurs—Pont-a-Mousson—Lorry—Chambley—Thiaucourt—Villers-en-Haye—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Wright, Patterson, Ball, Carruthers, Lindsley, and Evans.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:30	14:15	3500 M	93rd	Sept. 16th-18

Number of E.A. Seen: 9 Time: 13:20

Number of E.A. Encountered: 1 Time: 13:20

Type: Fokker-Biplace Altitude: 3000 meters

Region: Chambley Combats: 1

Number of Rounds Fired: 100 Confirmations Requested: Yes

Planes Seen to Have Gone Down in Flames. E.A.: Allied:

Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

The patrol leader reports the following: At 13:05 altitude 3500 the patrol sighted 9 E.A. in the region of Chambley. The E.A. had the advantage of one thousand meters altitude, so we climbed in the opposite direction for position. At the same time the E.A. climbed and we were unable to attack. The plane soon disappeared towards Metz. Lieut. Patterson at this point retired with bad motor. At 13:20 we sighted a bi-place Fokker between Pont-a-Mousson and Nomeny. Lieuts. Wright and Lindsley attacked, forcing him down from 3000 meters to 200 meters. Lieut. Lindsley had continuous motor trouble, so that he was forced to retire with an overheated motor and landed south of Villers-en-Haye. With one gun jammed and the other firing only a single shot at each burst. Lieut. Wright retired when the E.A. went into German territory. Lieut. Evans was also forced to retire with a bad motor after diving once on the enemy plane. Lieut. Wright landed beside Lieut. Lindsley, found that he had several bullet holes through his plane, presumably one in his motor and returned home.

C. E. Wright
1st Lieut. A.S., U.S.A.

Lieut. Ball was forced to return on account of motor trouble. Lieut. Wright and Lindsley landed near Villers-en-Haye, found that Lieut. Lindsley could not return on account of a bullet in his motor. Lieut. Carruthers has not returned.

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93rd Aero Squadron

Reconnaissance Report

Visibility Near Lines: Fair

Mission: Patrol

Route Actually Followed: Vaucouleurs—Toul—Pont-a-Mousson—Vandieres—Thiaucourt—Lachaussee—Vigneulles—Vaucouleurs.

Names of Pilots on Patrol and Leaders: Lieuts. Wright, Gude, Cox, Long, Patterson, Ball, Rummell, D'Olive, Hartman, Fuller, Barry.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
17:40	19:10	4000 M	93rd	Sept. 16th,-18

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:
Type: Altitude
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Detailed Report of Pilots and Other Observations:

Nothing to report. Artillery active between Rembercourt and Moselle River at 19:10.

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Third Pursuit Group
Operations Office
213th Aero Pursuit Squadron
September 16th, 1918

Daily Operations Report

1. Patrols

1. 14:00-15:35 4 planes, 213th Aero Squadron. Route: Vaucouleurs, Vigneulles, Lachaussee, Puxieux, Arnaville, Chamont, Vancouleurs, saw 5 Fokker planes, approached same, they turned away. Nothing to report. Altitude 3500M. Lts. W.F. Loomis, McAlpin McClure, H. S. Loomis.

2. 13:55-15:40 7 [8?] planes, 213th Aero Squadron. Route: Vaucouleurs, Lachaussee, Pont-a-Mousson, Vaucouleurs, Lt. Ford made a forced landing at Ourches. Nothing to report. Lts. Ford, McGehee, Wierick, Pickard, Lee, Richardson, Ogden, Aiken. Altitude 4000M.

3. 16:10-18:10 7 planes, 213th Aero Squadron. Route: Vaucouleurs, Pont-a-Mousson, St. Benoit, Richecourt, Vaucouleurs. Altitude 4300M. Nothing to report. Lts. Hambleton, Matheson, McGehee, Wierick, Pickard, Mell, Lee.

4. 16:15-18:15 7 planes, 213th Aero Squadron. Route: Vaucouleurs, St. Mihiel, Pont-a-Mousson, Fresnes, Chambley, Puxieux, Vaucouleurs. Altitude 2500M. Lts. Hoffman made a forced

landing near Pont-a-Mousson. See Reconnaissance report. Lts. W. F. Loomis, H. S. Loomis, Hoffman, McAlpin, Ogden, Gaillard, Grey.

II. Summary

Sorties	25
*Pilots available	20
Total planes	26
Available planes	17
Planes not returned	3
Total flying hours	32:25
Total service hours	32:25
Patrols	4
*Pilots assigned to squadron	25

*Not including Commanding Officer

By order of Lieut. Hambleton

E. Norman Hunt
1st Lieut., A.S., U.S.A.
Operations Officer

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 16th, 1918

Operations Report Number 42.

I. Patrols

1. 16:00-18:10. 7 planes, 213th Squadron. Route: Pont-a-Mousson, Thiaucourt, St. Benoit, Richecourt. Altitude, 4300 meters. Nothing to report.

2. 16:15-18:15. 7 planes, 213th Squadron. Route: St. Mihiel, Pont-a-Mousson, Flirey, Fresnes, Chambley, Puxieux. Altitude 2600 meters. See Reconnaissance report.

3. 17:25-19:25. 11 planes, 28th Squadron, Route: Void, St. Mihiel, Fresnes, Arnaville, Altitude 2500-3500 meters. See Reconnaissance report.

4. 17:30-19:15. 10 planes, 93rd Squadron. Route: Pont-a-Mousson, Louvingy, Lorry, Chambley, Charey, Thiaucourt, Pont-a-Mousson. Altitude 5000 meters. See Reconnaissance report.

5. 18:45-19:20. 7 planes, 103rd Squadron. Route: St. Mihiel, Void. Altitude 1000 meters. Nothing to report.

6. 12:30-14:15. 5 planes, 93rd Squadron. Route: Rembercourt, Lachaussee, Thiaucourt, Pont-a-Mousson. Altitude 4000 meters. Nothing to report.

7. 12:30-14:15. 6 planes, 93rd Squadron. Route: Pont-a-Mousson, Lorry, Chambley, Thiaucourt, Villers-en-Haye. Altitude 3500 meters. See Reconnaissance report.

8. 14:00-15:35. 4 planes, 213th Squadron. Route: Vigneulles, Lachaussee, Puxieux, Arnaville, Chamont. Altitude 3500 meters. Nothing to report.

9. 13:55-15:40. 7 planes, 213th Squadron. Route: Pont-a-Mousson, Lachaussee. Altitude 4000 meters. Nothing to report.

II. Special Missions

1. 18:05-19:05. 2 planes, 103rd Squadron, 1 plane, Major Thaw. Route—Villecey-sur-Mad, Haumont, Vandieres. Altitude 1800 meters. Nothing to report.

W. Thaw
Major, A.S., U.S.A.
Commanding

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Headquarters Third Pursuit Group
First Pursuit Wing
Operations Office
September 16th, 1918

Form Number 1 Pursuit

	28th	93rd	103rd	213th	Hdq.	Total
Sorties	13	30	13	25	1	82
Trials	2	9		4		15
Pilots enrolled [?]		2				2
Pilots available	21	22	18	20		81
Pilots killed						
Pilots missing						
Pilots wounded						
Enemy Planes confirmed						
Enemy planes unconfirmed		1				1
Total planes	26	25	23	20	1	103
Planes available	15	11	1	17	1	48

Planes crashed	1					1
Planes lost in Enemy lines						
Planes not returned	1		1	3		5
Total flying hours	22:85	38:50	6:35	42:35	1:00	110:25
Total service hours	22:00	35:55	6:05	42:35	1:00	106:35
Exercises						
Target practice						
Alerts						
Patrols	1	3	1	4		9
Protection Patrols						
Special Missions			1			1
Bombing raids						
Bombs dropped						
Pilots enrolled	22	23	23	23		91

W. Thaw
Major, A.S., U.S.A.
Commanding

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11th Aero Squadron

Raid Report

Visibility: Fair
Objective: Longuyon
Route Actually Followed: Bar-le-Duc route
Number of Teams Participating: 9 teams started, 4 reached obj.
Names of Leaders: Lt Tyler (Pilot) Lt Strauch (Obsr)

Hour of Departure	Hour of Return	Altitude	Squadron	Date
6:05	8:00	13,000	11	Sept 16

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude
Region: Combats:
Number of Rounds Fired: Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 8 Type: 155 M/m 50 kilos

Bursts were Observed at: S.W. of Longuyon near the R.R.

Remarks on Enemy-Aircraft Artillery: Fair active, but not accurate

Remarks on Enemy Airplanes:

Other Observations: Two trains standing still also moving freight cars in yards at Longuyon.

Clair B. Laird
2nd Lieut. A.S., U.S.A.
Squadron Operations Officer

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20th Aero Squadron

Raid Report

Visibility: Very Good

Objective: Longuyon

Route Actually Followed: Gondrecourt, Verdun, Etain, Dommary, Baroncourt, Etain, St. Mihiel, Amanty

Number of Teams Participating: Eleven teams left the field, one team crossed the lines.

Names of Leaders: 1st Lt. Howard, (P), 1st Lt, E.A. Parrott, Leaders

Hour of Departure	Hour of Return	Altitude	Squadron	Date
6:10	8:15	15000 ft.	20	Sept 16/18

Number of E.A. Seen:	Time:		
Number of E.A. Encountered:	Time:		
Type:	Altitude		
Region:	Combats:		
Number of Rounds Fired:	Confirmations Requested:		
Planes Seen to Have Gone Down in Flames.		E.A.:	Allied:
Planes Seen to Have Crashed on Ground.		E.A.:	Allied:
Planes Seen to Have Gone Down Out of Control.		E.A.:	Allied:

Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 4-50 kg Type: 155 m/m Demols
Total: 200 kilos

Bursts were Observed at:

Remarks on Enemy-Aircraft Artillery: One battery active near Etain

Remarks on Enemy Airplanes:

Other Observations: 2 Hostile balloons seen—2 trains, 1 north, 1 south of Dommary-Baroncourt both going North.

Charles H. Konantz
2nd Lieut., A.S., U.S.A.
Squadron Operations Officer

—471—

20th Aero Squadron

Raid Report

Visibility: Good
Objective: Conflans Railroad Yards.
Route Actually Followed: Amanty, Conflans, Amanty
Names of Leaders: 1st Lt. Howard, (P) lst Lt. E.A. Parrott, (O) Leaders.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:45	14:30	12000 ft	20th	Sept 16/18

Number of E.A. Seen: 7 Time:
Number of E.A. Encountered: Time:
None
Type: Fokker biplane Altitude: 1000 ft.
Region: South of Conflans Combats: None
Number of Rounds Fired: None Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.: Red noses and wings with white fuselages

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 20-50 kg Type: 155 m/m Demol. Total: 1000 kilos

Bursts were Observed at: One burst on Eastern part of Yards. Bursts were observed on Hospital.

Remarks on Enemy-Aircraft Artillery: Accurate over Lachaussee.

Remarks on Enemy Airplanes:

Other Observations: 1 balloon 3600-2620. 150 cars in the Yards at Conflans. 1 Camion train at Friauville at 2:00 p.m. Cars in yards were widely separated in small sections.

Charles H. Konantz
2nd Lieut., A.S., U.S.A.
Squadron Operations Officer

—472—

20th Aero Squadron

Raid Report

Visibility: Poor

Objective: Conflans, R. R. Yards

Route Actually Followed: Gondrecourt, Neufchateau, Verdun, Longuyon, Fresnes

Number of Teams Participating: 6 teams left the field, one reached the objective.

Names of Leaders: 1st Lt. C. G. Sellers, (P) 1st Lt. K. C. Payne, (O)

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:40	18:45	15000 ft.	20	Sept 16/18

Number of E.A. Seen: 7 Time: 17:50

Number of E.A. Encountered: 7 Time: 17:50

Type: Fokker Biplane Altitude: 12000 ft

Region: Longuyon Combats: One

Number of Rounds Fired: 700 Confirmations Requested:

Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.: Red Noses, white tails.

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 4-50 kg Type: 155 m/m Demol.
Total: 200 kilos
Bursts were Observed at:
Remarks on Enemy-Aircraft Artillery: Fairly active.
Remarks on Enemy Airplanes:
Other Observations: Patrol of 5 Spads was met at lines on return trip.

Charles H. Konantz
2nd Lieut. A.S., U.S.A.
Squadron Operations Officer

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96th Aero Squadron

Raid Report

Visibility: Good
Objective: Conflans
Route Actually Followed: Bar-le-Duc, Verdun, Conflans, Fresnes, Amanty.
Number of Teams Participating: 8. 6 crossed the lines
Names of Leaders: Lts. Gaylord and Lunt

Hour of Departure	Hour of Return	Altitude	Squadron	Date
12:35	15:00	4200 M	96th	9/16/18

Number of E.A. Seen: Time:
Number of E.A. Encountered: Time:
Type: Altitude
Region: Combats:
Number of Rounds Fired: 405 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:

Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped:	10	Type:	115 m/m long
	12		155 m/m
	6		Incendiary

Bursts were Observed at: To the north and east of the objective

Remarks on Enemy-Aircraft Artillery: Fairly active and inaccurate

Remarks on Enemy Airplanes:

Other Observations: 1-25 car train at Jarny going south at 14:05. Three trains with steam up in the western yards of Metz. 350 cars at Conflans. 600 cars at Briey, 500 cars at Dommary-Baroncourt. 500 cars at Moineville. 200 cars at Etain, 6 machines on ground and landing T at Giraumont. Truck train of seven south of Gondrecourt 14:10. 1-25 car truck train at Jeandelize 14:15. 1-10 car truck train at Giraumont 14:00. 1-20 car truck train at Harville 14:20.

E. E. Evans
1st Lt. A.S. U.S.A.
Squadron Operations Officer

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96th Aero Squadron

Raid Report

Visibility: Fair

Objective: Conflans

Route Actually Followed: Neufchateau, St. Dizier, Bar-le-Duc, Fresnes, Conflans, Ligny, Amanty

Number of Teams Participating: 7. 5 crossed the lines

Names of Leaders: Lts. Anderson and Thompson, H.S.

Hour of Departure	Hour of Return	Altitude	Squadron	Date
16:50	19:20	4200 M	96th	9/16/18

Number of E.A. Seen: Time:

Number of E.A. Encountered: Time:

Type: Altitude

Region: Combats:

Number of Rounds Fired: 76 Confirmations Requested:
Planes Seen to Have Gone Down in Flames. E.A.: Allied:
Planes Seen to Have Crashed on Ground. E.A.: Allied:
Planes Seen to Have Gone Down Out of Control. E.A.: Allied:
Markings on E.A.:

In the Opinion of Those Who Took Part in the Combat, What Pilots are Entitled to Share in Confirmation:

Number of Bombs Dropped: 4-90 m/m Type: Incendiary
4-115 m/m long
8-155 m/m

Bursts were Observed at:

Remarks on Enemy-Aircraft Artillery:

Remarks on Enemy Airplanes:

Other Observations: Five machines crossed the lines, one machine (pilot Lts. Elliott and Obs. Lt. Ellis) was unable to keep up with the formation and they dropped their bombs at Hadonville and returned to airdrome. The other four machines have failed to return.

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96th Aero Squadron

Report of 1st Lieutenant Charles R. Codman, A.S., regarding captivity in Germany (from notes taken by 2nd Lieutenant C. I. Wheat, Information Section, Headquarters, Air Service.)

2nd Lieutenant Charles R. Codman, Pilot, of the 96th Aero Squadron, was taken prisoner while on a day-bombing expedition against Conflans on September 16th, 1918. A flight of seven machines started on this expedition, but all but four fell out of the formation before crossing the lines. These four machines bombed Conflans, but on the return trip were met by a flight of 24 German Pursuit planes. The other three planes were brought down in flames and Lieutenant Codman and his observer, 2nd Lieutenant Stewart McDowell, were brought down out of control, with one aileron, the rudder, and one-half the elevator shot off. Both Officers were wounded. Lieutenant McDowell seriously, Lieutenant Codman slightly. Lieutenant Codman stated that he shot down three German planes before his machine was brought down, and that this may be confirmed by the statements of three French aviators, also prisoners, who witnessed the fight (address Adjudant Gaston Boeglin, French Squadron C-46, and Monsieur Marceau, also a French pilot).

Lieutenant Codman's plane came down in a spiral and crashed in a field near Conflans, in which were many German soldiers. The plane was immediately surrounded. There was no opportunity to set it on fire. The German first aid was given to Lieutenant McDowell, and he was taken to a hospital. Lieutenant Codman was taken to some barracks in a small town near Conflans. From there he was taken in a touring car to an Intelligence Officer's [?] in the neighborhood of Longuyon. He was there questioned for about three hours. Much wine was brought out. No force was used, and the Intelligence Officers were most polite. Next morning he was taken to Montmedy, a prisoner's camp, where he was placed in solitary confinement for three days, and from there he was sent to Rastatt near Karlsruhe, and after three weeks at Rastatt was sent to Karlsruhe itself. In the latter town he spent two nights in the famous "Dictaphone Hotel" where he was kept with 30 or 40 other aviation prisoners, about ten of whom were Americans. Later he was removed to the regular prison camp at Karlsruhe, where he received good treatment, and where he stayed about a week. He was then taken to the Aviation Officers Prison at Landshut, Bavaria. He was allowed to send one postal card on the 1st and 10th of each month, and a letter on the 15th and 25th. In addition he could send all the picture postal cards he desired, and many photographic cards were given to him and to other prisoners as a sort of advertisement of the camp, these pictures being largely photographs of prisoners, drinking, or playing games. At Landshut he was inoculated for cholera, typhus and small pox. He depended almost entirely upon the Red Cross for food, and had plenty of that. He remained at this camp until November 16th, 1918. Newspapers were at hand every day.

On November 7th, a revolution occurred in Bavaria, and most of the guards were taken away. The revolution, however, was a quiet affair, consisting largely of a political change, while King Ludwig was imprisoned in his castle. Herr Kurt Eisner, a poet and socialist editor in Munich, was made President of the Republic of Bavaria. The revolution lasted only about two hours. Everything had been planned in advance and many of the old regime officials retained their jobs. There was no saluting of officers in the streets.

In relation to other prisoners the Americans were favored in the camp. Lieutenant Codman stated that this was considered by American prisoners as propaganda for American good will after the war. Bavaria disliked the Prussians very much. Treatment was good and food was fairly good, the food situation in Bavaria being better than in other parts of Germany. No rubber or leather goods were to be had. Twenty-four American Officers (flying) and a few each of Artillery and Infantry were housed in Trausnitz Castle, where they were well quartered.

The Armistice came as a relief to the German people of the vicinity, but they were bitter regarding the conditions of the same, considering the paragraph regarding railroad carriages especially unjust.

On November 16th, all the prisoners were taken to Villengen except the Red Cross Committee, which stayed to check the Red Cross material. On this committee, in addition to Lieutenant Codman were Captain James N. Hall, 2nd Lieutenant R G Brown and 1st Lieutenant Henry Lewis. The guards disappeared on this date, and on the evening of November 16th these four officers left the camp with a German corporal. They spent the night in a hotel in Munich where no one paid any attention to them and the next day they proceeded by rail with a German corporal to a point on Lake Constance from which they proceeded by boat and landed at Romans Horn on November 17th. From there they proceeded to Berne where they spent some days with the American Red Cross, preparing necessary reports on their committee work. Then they proceeded through Geneva to France, arriving in Paris November 21st.

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Report of 2nd Lieutenant Steward A. McDowell, Observer 96th Aero Squadron, from notes taken by 1st Lieutenant C E Andrews.

On September 16, 1918, Lieutenant McDowell was sent on a mission to bomb Conflans. Near Conflans the machine was shot down out of control. The pilot and Lieutenant McDowell were both hurt, they were in a hospital for one month at Lamure and then evacuated to Weingarten, Bavaria. Their treatment was very bad, they were put into a room with three men with syphilis. On one occasion they were given five days solitary confinement for giving away bread to a Russian prisoner orderly. Their clothes were taken away from them, they were allowed no books. This treatment was probably the result of pique at the general military situation at the moment. The incident happened the day that Bulgaria signed the peace treaty. While in confinement they were fed by English Tommies who broke guard and gave them food from Red Cross parcels. Lieutenant McDowell was sent on October 11th, to Karlsruhe and put into the "Chamber of Horrors". He was questioned closely and then sent to the prison camp in that town. After this he was sent to Landshut, Bavaria, a prison for flyers. He was innoculated for cholera, typhus and smallpox. When he was finally sent back after the armistice he had an interesting collection of souvenirs for which he had traded pieces of soap.

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Day Bombardment Group
September 16th, 1918

Summary of Operations

The following missions were made today. First Mission left airdrome at 6:05 to bomb Longuyon and returned at 8:00.

Pilots:	Planes:	Observers:
Flight leader: (96th)		
Lt. D.H. Young	12	Lt. H.G. Rath
Lt. Anderson	14	Lt. H.S. Thompson
Lt. Bates	15	Lt. Pressler
Lt. C.P. Young	20	Lt. Bleecker
Lt. Taylor	4	Lt. Stuart
Lt. Ten Eyck	1	Lt. Smith
Lt. Elliott	8	Lt. Ellis
Lt. Baker	5	Lt. Milner

All planes crossed the lines and bombed the objective.

Flight leader: (20th)		
Lt. Sellers		Lt. Payne
Lt. Howard	792	Lt. Parrott
Lt. Leach	408	Lt. Wilmer
Lt. Mandell	445	Lt. Fiske
Lt. Townes	546	Lt. Bunkley

Planes #792 and 442 reached objective; one crashed.

Flight leader: (11th)		
Lt. Tyler	507	Lt. Strauch
Lt. Stahl	358	Lt. Archer
Lt. Allsopp	317	Lt. Roof
Lt. Malcom	651	Lt. Springer
Lt. Brewster	619	Lt. Jones
Lt. Slauson	157	Lt. Yates
Lt. Garlough	252	Lt. Payton
Lt. Harter	228	Lt. Stephenson
Lt. Comegys	797	Lt. Carter
Lt. Osmun	595	Lt. Edwards
Lt. Pearson	243	Lt. Perry
Lt. Ring	764	Lt. Greene

9 of these planes left this airdrome.

Visibility: Good

Itinerary: Gondrecourt, Bar-le-Due, Verdun, Longuyon, Verdun and Amanty. Total weight of bombs 1320 kilograms.

Second Mission—The following left the airdrome at 12:45 to bomb Conflans, returned at 15:00. Altitude 4200 meters, visibility good.

Pilots:	Planes:	Observers:
Flight leader (96th)		
Lt. Gaylord	20	Lt. Lunt
Lt. Beverly	14	Lt. Newbury
Lt. Turnbull	18	Lt. Cawston
Lt. Lakin	15	Lt. Douglas
Lt. Rogers	8	Lt. Strawn
Lt. Codman	1	Lt. Pressler
Lt. Hopper	5	Lt. Kelly
Lt. Forshay	4	Lt. O'Donnell

Planes number 4, 5, 15, 18, 14 and 20 reached and bombed the objective; others did not cross the lines.

Flight leader: (20th)		
Lt. Howard		Lt. Parrott
Lt. Edwards		Lt. Endler
Lt. Wiser		Lt. Christian
Lt. Harris		Lt. Ramsey
Lt. Koepfgen		Lt. Hicks
Lt. Tucker		Lt. Faulk
Lt. MacWhirter		Lt. Holt
Lt. Sellers		Lt. Payne

3 planes did not reach the objective.

Flight leader: (11th)		
Lt. Gatton		Lt. Bird
Lt. Ring		Lt. Greene
Lt. Brewster		Lt. Jones
Lt. Harter		Lt. Stephenson
Lt. Pearson		Lt. Perry
Lt. Garlough		Lt. Payton
Lt. Allsopp		Lt. Root
Lt. Porter		Lt. Patton

None of these planes reached the objective;
1860 kilograms were dropped by the 96th and 20th squadrons.

Third Mission: The following left the airdrome at 17:00 to bomb Conflans, planes left of mission returned about 19:00 o'clock. Altitude 4200 meters. Bombs dropped by 96th, and 20th was 676 kilograms.

Flight leader: (96th)

Lt. Anderson	14	Lt. H.S. Thompson
Lt. D.H. Young	18	Lt. Hexter
Lt. Codman	20	Lt. McDowell
Lt. Taylor	4	Lt. Stuart
Lt. C.P. Young	15	Lt. Bleecker
Lt. Elliott	8	Lt. Ellis
Lt. TenEyck	5	Lt. Smith
Lt. Rogers	1	Lt. Strawn

Planes #14, 20, 4 and 1 did not return and have no report of them up to the present time; others did not reach objective.

Flight leader: (20th)

Lt. Sellers	Lt. Payne
Lt. Leach	Lt. Wilmer
Lt. Mandell	Lt. Fiske
Lt. Townes	Lt. Bunkley
Lt. West	Lt. Frank
Lt. Edwards	Lt. Endler

Lt. Sellers and Lt. Payne crossed the lines, other planes did not cross the lines.

Flight Leader: (11th)

Lt. Gatten	Lt. Bird
Lt. Munn	Lt. Ward
Lt. Ring	Lt. Greene
Lt. Garlough	Lt. Payton
Lt. Porter	Lt. Patton
Lt. Pearson	Lt. Perry
Lt. Stahl	Lt. Archer
Lt. Allsopp	Lt. Root
Lt. Brewster	Lt. Jones

4 of these planes reached the lines and dropped their bombs.

Results:

Longuyon, 4 bursts in town, 2320 kilograms of bombs dropped (96th, 20th and 11th).

Conflans, bursts to the north of objective, 4 bursts on eastern neck of yards, 1860 kilograms (96th).

bursts to south and west of objective 600 kilograms (11th).

Railroad Movements:

2-50 car trains going south out of Longuyon 7:05 (96th)
1-50 car train going south out of Dommary-Baroncourt 7:05 (96th)
1-50 car train going south out of Conflans 7:05 (96th)
2-50 car trains going east out Longuyon 7:10 (96th)

2 trains with steam up at Dommary-Baroncourt 7:15 (96th)
1-50 car train going north into Longuyon 7:20 (96th and 20th)
1-50 car train going south at Gondrecourt 7:05 (20th);
8 locomotives under steam at Longuyon 7:05 (96th)
Steam from about ten narrow guage railroad engines in Foret de Spinecourt and Foret de Mangiennes 7:10 (96th)
About 600 cars at Longuyon 7:05 (96th)
1-50 car train at Jarny headed south at 14:05 (96th)
3 trains with steam up in western yards of Metz 14:05 (20th)
About 350 cars in yards at Conflans 14:05 (20th)
About 600 cars in yards at Briey 14:05 (96th)
About 500 cars in yards at Dommary-Baroncourt 14:05 (96th)
About 500 cars in yards at Moinville 14:00 (96th);
About 200 cars in yards at Etain 14:10 (96th).

Hostile Airdromes:
2 planes on ground at Longuyon 7:20 (96th)
3 planes on ground at Sorbey 7:20 (96th)
6 planes and landing "T" at Giraumont 14:20 (96th)

Anti-Aircraft:
Active and accurate at Longuyon 7:00 (96th, 20th and 11th);
Active and accurate over Lachaussee 14:20 (20th)

Enemy Aircraft:
7 E.A. reported as biplane Fokkers with rose colored wings and white fuselages, followed flight of 20th from Brainville to Chambley 14:10 (20th).
10 E.A. seen at 2000 meters over Allamont 18:00 (11th)

Miscellaneous:
One balloon on ground at 3430-2825, 7:20 (96th)
One plane en panne at 3405-2680, 7:20 (96th)
Considerable activity about material dumps at Spincourt 7:15 (96th)
Truck train of 15 units at Friauville 14:00 (20th)
Truck train of 7 units on road south of Gondrecourt, 14:10 (96th)
Truck train of 25 units Jeandelize 14:15 (96th)
Truck train of 10 units at Giraumont 14:00 (96th)
Truck train of 20 units at Harville 14:20 (96th)
Balloon in ascension at 3600-2620, 14:20 (20th)
1000 propaganda pamphlets dropped over Allamont, 1000 at Conflans and 2000 at Harville. Wind 45 to 60 miles to northeast of Conflans.
Four planes at 96th squadron missing:

Pilots:	Observers:
Lt. C.P. Anderson	Lt. H.S. Thompson
Lt. C.R. Codman	Lt. S.A. McDowell
Lt. R.C. Taylor	Lt. N.A. Stuart
Lt. N.C. Rogers	Lt. K.P. Strawn

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Headquarters, First Pursuit Wing
Air Service, American E.F.
September 16th, 1918

Operations Report Number 16

From 17 h 00 Sept 15th to 17 h 00 Sept 16th.

1. Atmospheric Conditions: Excellent all day.

2. Enemy Air Service: Following the losses in material and the casualties arising out of its intense activity of the day before, the Enemy Air Service today dropped to almost nothing.

10 combats were reported by our Pursuit Group, most of which took place late in the evening of Sept 15th. The combats during the day of Sept 16th were restricted to those with enemy bi-place planes attempting to regulate their artillery on our new positions. Confirmation of 3 of these planes has been requested.

3. Activity of Our Pursuit Aviation: All three Pursuit Groups operated in the barrage of the sector. An attack on balloons was carried out and the observers of two enemy balloons were forced to jump with their parachutes.

Lieutenant Stiles, 13th Aero Squadron is missing after a combat late in the evening of Sept 15th.

4. Activity of Our Bombing Aviation: 5040 kilograms of bombs were dropped as a result of expeditions to Longuyon and Conflans. Direct hits were observed on both objectives.

The excellent atmospheric conditions also permitted our bombing pilots to make important observations of the enemy's rear areas as far as Metz, Briey and Audun.

Summary

	1st Day Bombdmt Group	G.C. 16	2nd Pursuit Group	3rd Pursuit Group	Pursuit Total
Sorties	49	26	63	82	171
Trials	1	0	10	15	25
Combats	0	3	5	2	10
Pilots on rolls	56	69	91	91	251
Pilots Available	39	69	84	81	234
Observers on rolls	60	—	—	—	—
Observers Available	48	—	—	—	—

Pilots missing.....	0	0	1	0	1
Confirmations requested.....	0	0	2	1	3
Total Planes.....	60	75	97	103	275
Available Planes	30	50	58	53	161
Planes Crashed....	1	0	0	1	1
Total Flying Hours.....	74:51	52:00	111:50	87:25	251:15
Total Service Hours.....	74:21	52:00	104:00	83:25	239:25
Patrols	0	3	5	9	17
Protection Patrols	0	1	0	0	1
Special Missions.....	0	0	0	1	1

Bombing raids 9
Bombs dropped—5040 kilograms.

By order of Lieut. Colonel Atkinson

Philip J. Roosevelt
Captain, Air Service, U.S.A.
Operations Officer

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Headquarters Ninth Aero Service Squadron
September 16, 1918

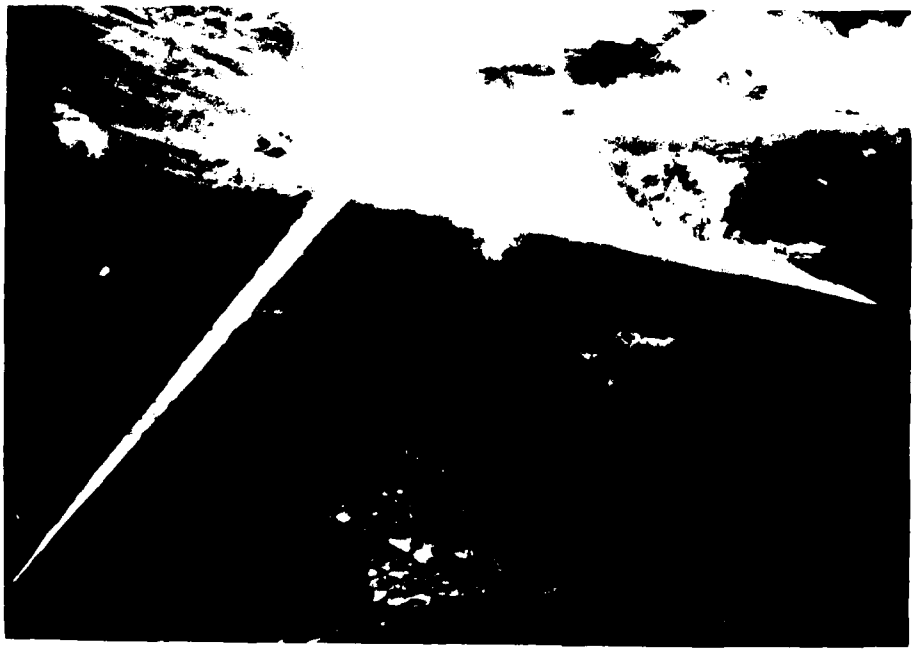
Operations Report

Atmospheric Conditions.
Night—Excellent.
Day—Good.

1. Reconnaissance.
Night—2 successful. Itinerary, Pont-a-Mousson—Corny—Gorze—Chambley—Mars-la-Tour—Conflans—Fresnes, 1 unsuccessful. Itinerary: Fresnes—Briey—Conflans. 1 attempt too dark.
Too dark for successful reconnaissance during morning hours.
Day Sorties—5, acquainting new pilot with sector.
Night bombardment and reconnaissance with French at Epiez. 4 Sorties. Objectives: Conflans, Longuyon—Dommary-Baroncourt.

2. Miscellaneous.
Planes—1 D. H. Liberty awaiting night equipment.
2 Breguets awaiting night equipment
1 Breguet in reserve
3 Breguets awaiting minor repairs.
3. Observation. Reported by B. I. O.
4. Summary.
Night Sorties—16. 1 attempt, 1 unsuccessful, 2 successful Rec. 4 night bombardment and Rec. with French. 4 practice night hops.
Day Sorties—5 Reconnaissance.
Service Hours—16½
Total hours—23¾
20 planes on hand (19 Breguets, 1 D. H. Liberty), 15 Available for duty.
Pilots 10, available 10
Observers 7, available 5

Harold W. Merrill
1st Lt. 103 F.A.
Operations Officer



A Night Bombing Mission. (Painting by Henri Farre.)

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Headquarters—24th Aero Squadron
First Army Observation Group

Operations Report for September 16th 1918.

Atmospheric conditions: Visibility good throughout day.
1. Reconnaissance, Nil.
2. Photography, Nil.
3. Miscellaneous. 16 planes (Salmson 2A2) being repaired, equipped etc.
4. Summary.
5 sorties.
1 protective flight.
3 attempted protective flights.
1 test flight.
Service hours—2:00.
Total hours—6:15
21 Salmson 2A2 planes on hand—5 available.
17 pilots—17 available. 12 observers—12 available.

John W. Cousins
1st Lt. Inf.
Operations Officer

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Headquarters 91st Aero Squadron

Operations Report for September 16, 1918.

Atmospheric conditions: Visibility, good.
1. Reconnaissance
a. West of hills to Verdun, N.E. to Spincourt. 16:00 to 18:35 Alt. 4700 m. Vis. Good. Obs. Lt Schricker: Pilot, Lt. Powell.
b. Cheminot—Metz—Briey—Conflans—Vigneulles. 4:50 6:50. Alt. 4500 m. Vis. good. Obs. Lt. Lawson: Pilot, Lt. Cook.
2. Photographic.
a. Waville—Arnaville—Metz—Pont-a-Mousson. 8:55-11:25. Alt. 5100 Vis. good. Obs. Lt. Lowry: Pilot, Lt Guilbert: 36 exp. 32 g.
b. Waville—Doncourt—Giraumont—Conflans—Dainville [?]. 9:00-11:00 Alt. 4600 m. Vis. fair. Obs. Lt Hammond: Pilot, Lt. Diekema. 33 exp. 33 g.

c. Waville—Arnaville—Metz. 9:20-11:40. Alt. 5300 m. Vis. Obs. Lt. Jannopoulo: Pilot, Lt Kelty. 21 exp. 13 g.

3. Miscellaneous.
   1 Plane No 13 gas tank repaired.
   4 Planes Liberty D. H. 4 received to-day.
   2 planes S.P.A.D. received today.
5. Observations. Reported by B.I.O.
6. Summary.
   6 sorties.
   2 Vis. Rec.
   3 Photo
   1 Att. Photo
   1 Protective
   1 Att. Protective
   30 planes on hand.
   24 Salmson 2A2
   4 D.H.4
   2 S.P.A.D. 220
   29 Planes available
   Service time: 13:45
   Total time: 16:10
   15 Pilots: 14 available.
   13 Observers: 12 available.

John H. Snyder, 2nd Lt. CARC
Operations Officer

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1st Aero Squadron
September 16, 1918

Summary of Operations

Infantry Contact Patrol. Dampvitoux, Charey, Rembercourt. 2nd Division. 17:00-19:20. Altitude 500 meters. Visibility good. Pilot Lieut. Butler, Observer Lieut. Hanscom. No request made on plane by 2nd Division. See Intelligence report.

Infantry Contact Patrol. Rembercourt, Charey. 2nd Division. 11:55-14:04. Altitude 800. Visibility good. Pilot Richardson, Observer Lieut. Duckstein. Infantry displayed panels but two panels after firing two rockets. Enemy planes which had burned two of our balloons attacked and chased across the lines. One plane First Squadron furnished protection.

Reconnaissance. Pont-a-Mousson, Lachaussee. 6:05-8:25. Altitude 1000 meters. Visibility good. Pilot Lieut. Richards, Observer Lieut. Phillips. See Intelligence report.

Reconnaissance. Charey, Vilcey-sur-Trey. 17:05-18:25. Altitude 1000. Visibility good. Pilot Lieut. Fox, Observer Lieut. Farnham. See intelligence report. Forced to land at advance field account of motor trouble.

Photography. Vandieres, Xammes. 13:40-14:30. Altitude 1000 meters. Visibility good. Pilot Lieut. DeCastro. Observer Lieut. Easterbrook. 20 oblique photos taken, mission not finished owing to a near collision with protection plane. Two planes from First Aero Squadron furnished protection.

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12th Aero Squadron
September 16th, 1918

Summary of Operations

Reconnaissance: Thiaucourt—St. Julien. 16:00-16:25. Alt 1800 M. Vis Fair. Pilot Lt Morris, Observer Lt Styles. 1 plane as protection.

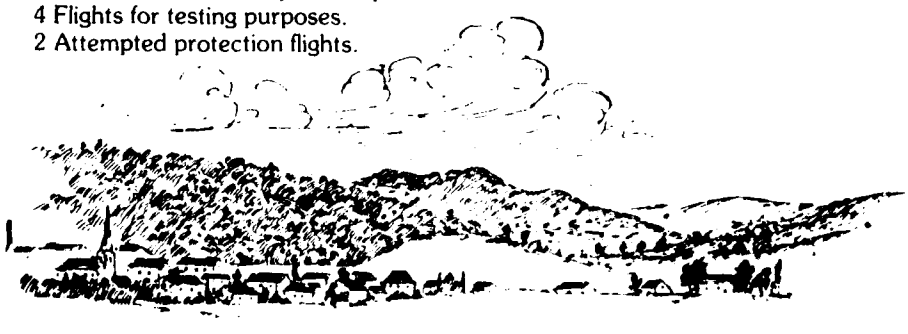
Photography: Pagny—Charey. 10:05-12:20. Alt 4000 M. Vis. Good. Pilot Lt Arthur, Observer Lt Fleeson. 24 photographs taken all of which were good. 1 plane as protection.

Photography: Pagny-sur-Moselle—Bayonville—Arnaville. 10:10-12:15. Alt 4000 M. Vis Good. Pilot Lt Morris, Observer Lt Styles. 24 photographs taken all of which were good.

Adjustment of Artillery Fire: For 1st Bn 309th F A. 9:50-13:10. Alt 2000 M. Vis Good. Pilot Lt Muller, Observer Lt Read. Objective: Coordinate 74.4-42.5. Summary—20 rounds fired, 16 observed. Mission not successful. 1 plane as protection.

4 Flights for testing purposes.

2 Attempted protection flights.



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50th Aero Squadron
September 16, 1918

Operations Report

Atmospheric Conditions—Visibility: Good.
Reconnaissance

1. Thiaucourt, Pagny, Pont-a-Mousson, Verny. Eply. 5:45-7:35. Alt. 2000 M. Vis Fair. Pilot Lt. Bird, Observer Lt. Bolt. See intelligence report.

2. St. Jure, Pagny-les-Goin, Norroy, Pagny. 8:00-10:33. Alt. 1800 M. Vis Good. Pilot Lt. Phillips, Observer Lt. McCurdy. See intelligence report.

3. Eply, Cheminot, Norroy, Vandieres and N.W. 10:25-12:20. Alt. 200 M. Vis. Good. Pilot Lt. Anderson, Observer Lt. Sain. See intelligence report.

4. Field and N. to Dieulouard. 15:35-16:15. Alt. 1000 M. Vis. Good. Pilot Lt. Hardin, Observer Lt. French. Forced landing due to motor trouble.

5. Eply, Cheminot, Champey, Norroy, Vilcey, nearly to Rembercourt. 13:25-15:42. Alt. 2600 M. Vis. Good. Pilot Lt. Alter, Observer Lt. Dovre.

6. Pagny, Bois de Fontaine, Sillegny, Arry. 17:00-18:15. Alt. 1500 M. Vis. Good. Pilot Lt. Pickrell, Observer Lt. Darrin. See intelligence report.

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Office of the Chief of Air Service
Headquarters First Army Corps
American Expeditionary Forces
17 Sept. 1918

Summary of Operations for the day of 16 Sept. 1918. No. 7

Atmospheric Conditions: Favorable—Visibility good.
A. Aviation.
I. Reconnaissance: 15 reconnaissances of Corps carried out.
II. Infantry Contact Patrols: Nil.
III. Photography: 3 missions. 48 vertical and 20 oblique exposures taken over enemy lines, all of which were good.

IV. Artillery Adjustment: 5 Artillery surveillance missions were carried out. 1 adjustment was carried out with the 1st Bn. 309th F.A. (155). 20 rounds fired—16 observed.

V. Miscellaneous:

1 flight for testing purposes (1)
4 flights for testing purposes (12)
2 flights for protection (1)
3 flights for protection (12)
2 attempted protection flights (12)

VI. Summary:

1st Aero Squadron:

6 Sorties: 2 reconnaissances; 1 photography mission; 2 flights for protection; 1 flight for testing purposes.
23 Salmsons on hand—17 available for duty
19 Pilots carried on rolls—18 available for duty.
Total time 6 hrs. 35 min. Service time 5 hrs. 05 min.

12th Aero Squadron:

13 Sorties: 1 reconnaissance; 2 photography missions; 1 artillery adjustment; 3 flights for protection; 4 flights for testing purposes; 2 attempted protection flights.
20 Salmsons on hand—13 available for duty.
19 Pilots carried on rolls—18 available for duty.
16 Observers carried on rolls—14 available for duty.
Total time 18 hrs. 35 min. Service time 15 hrs. 30 min.

50th Aero Squadron:

6 Sorties: 6 reconnaissances.
21 D.H. on hand-8 available for duty.
18 Pilots carried on rolls—16 available for duty
12 Observers carried on rolls—11 available for duty.
Total time 10 hrs. 30 min. Service time 10 hrs. 30 min.

208th Aero Squadron:

5 Sorties: 5 Artillery surveillance missions.
10 Breguets on hand--6 available for duty
10 Pilots carried on rolls—8 available for duty
8 Observers carried on rolls—8 available for duty
2 machine gunners carried on rolls—2 available for duty.
Total time 6 hrs. 15 min. Service time 6 hrs. 15 min.

214th Aero Squadron:

7 Sorties: 6 reconnaissances; 1 attempted reconnaissance.
10 Breguets on hand--7 available for duty
7 Observers carried on rolls--6 available for duty
10 Pilots carried on rolls--9 available for duty
3 machine gunners carried on rolls--1 available for duty.
Total time 9 hrs. 15 min. Service time 7 hrs. 30 min.

B. Aerostation.
11 Ascensions
1st Balloon Co. 6:35-12:50, 12:58-18:27, 11 hrs. 44 min.
2nd Balloon Co. 8:13-13:00, 13:13-18:47, 10 hrs. 21 min.
5th Balloon Co. 5:10-12:05, 12:10-19:20, 14 hrs. 05 min.
42nd Balloon Co. 7:37-12:46, 13:00-13:49, 13:58-15:58, 16:00-17:53, 17:58-18:55, 11 hrs. 50 min.
Total time in air 46 hrs. 57 min.
3 Adjustments carried out. Rounds fired: 153. Observed: 138.

By order of Major M. A. Hall, C.A.S., 1st A.C.

Paul D. Meyers
2nd Lieut. C.A.C.
Operations Officer

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99th Aero Squadron
September 16, 1918

Missions Carried Out

Pilot	Observer	Missions	Time Out	Time In	Total Time	Visibility
Edwards	Hays-Davis	Protection	9:40 AM	10:40 AM	60	Good
Heywood	Reilly	Reglage	9:45 AM	10:45 AM	60	Good
McMurtry	Hunter	Protection	11:15 AM	12:45 PM	90	Good
Simpson	MacRossie	Protection	11:20 AM	12:10 PM	50	Good
McElroy	Kinne	Photographic	11:20 AM	11:20 AM	120	Good
McElroy	Kinne	Photographic	2:20 PM	3:02 PM	42	Good
Eaton	Case	Protection	2:30 PM	3:00 PM	30	Good
Cadbury	Read	Artillery Plane	5:35 PM	7:35 PM	120	Good
Clark	Gaither	Surveillance	5:35 PM	7:05 PM	90	Hazy
Eaton	Case	Surveillance	5:35 PM	7:15 PM	100	Hazy
Doran	Irwin	Reconnaissance	6:40 PM	7:42 PM	62	Hazy
			TOTAL		13:44	

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104th Aero Squadron
September 16, 1918

Summary of Reports

Lt. Ellis, pilot, and Lt. Polley, observer, made daylight reconnaissance but reported no great activity. Lt. Wallace, pilot, and Lt. Lawrence, observer, completed one special photograph mission. Lt. Wallace makes a bad landing on returning. Lts. Reynolds, pilot. Morris, pilot, Jacobi, pilot, ferried Lt. Houck, Ball, and Johnson to Luxeuil for the purpose of ferrying additional planes to Souilly. Lts. Reynolds, Andrew, Jacobi, Morris, Johnson, and Ball, pilots, returned with planes from Luxeuil. Lt. Greening, ferrying plane from Luxeuil to Souilly, had forced landing at Vittel, necessitating that plane be salvaged, it being impracticable to change motors at that place. Lt. Houck had forced landing at Commercy.

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Headquarters Air Service
Fifth Army Corps, American E.F.

Operations Report Number 41, 1900 Sept. 15 to 1900 Sept. 16, 1918

I. Atmospheric Conditions: Clear and sunny. Visibility excellent.
II. Aviation:

1. Reconnaissance: During the day three missions were dispatched for reconnaissance and surveillance of the Corps Sector.

The day break reconnaissance St. Hilaire-Doncourt and Woel found no enemy movement in region covered. Two hostile balloons at about 400 meters. One vicinity Mars la Tour and one about two kilometers to the NE.

In the course of a reconnaissance in front of the 15th French Division Sergeant Lemire Pilot and Lt. Clero Observer were attacked by two enemy aviators. Once at 18:40 hours and once at 19:00, 15 September 1918.

The first combat was without result. The second combat resulted in an enemy plane being sent to the ground in the region of Bausecourt. Confirmation is requested. 380 rounds were fired.

2. Photography: During the course of the day three photographic missions were dispatched, Pilot Lt. Weeks and Observer Lt. Lawrence, region covered ravine west Dommartin-la-Montagne and from 43.7-48.5 to 42.8-49.5. Twelve successful photographs were taken.

The second mission, Pilot Lt. McElroy and Observer Lt. Kinnie, area Lachaussee to Maizeray and our line from Mesnil to Hattonville. Exposed thirty-six plates, all good. No anti-aircraft and no Boche planes sighted. Report of area covered in third mission by French Squadron has not been received. Will be reported tomorrow.

3. Adjustments: During the day one attempted adjustment was made with the 146th Field Artillery. On account of the regiment moving on very short notice a signal "No further need of you" when the aviator appeared above the panel station.

4. Infantry Contact: Nil.

5. General Impression of the Day: Very quiet. Very little enemy aerial activity.

III. Miscellaneous:

88th Aero Squadron: 1 plane in repair; approx. time 48 hours.

99th Aero Squadron: 2 Pilots sick: approx. time 18 hours; 1 plane out of commission to be condemned. 3 plane in repair, approx. time 48 hours.

104th Aero Squadron: 4 Pilots enroute from old station (Luxeuil). Four planes enroute from Luxeuil. Three still at Luxeuil and 9 under minor repairs; approx. time 48 hours.

42nd French Squadron: No report as to Pilots. Observers and planes not available.

By order of Major Christie

Fraser Hale
1st Lt. FA USA
Operations Officer

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Headquarters Commander Army Balloons
First Army

Daily Report Operations Balloon in First Army, September 16, 1918, Supplementary

Fifth Army Corps
September 14th., 19:00 O'clock to 19:00 O'clock 15th

General Impressions of the Day: Enemy infantry no activity; enemy artillery quiet; Enemy planes very active; Enemy Balloons increased activity. Destructions, Explosions, Fires, within the enemy's lines increased.

Enemy Aeronautical Service:

Airplanes

8:25 Enemy plane seen over Abaucourt coming towards B-7,

fired on by AAA and sent north from Rupt-en-Woevre (B-8).

8:50. Enemy plane DFW from direction of Grimaucourt towards Rupt-en-Woevre, taking zigzag course, fired on by machine guns and AAA (Photo Plane) (B-8).

8:33. Rumpler photo plane coming from direction of Rampont towards Marcaulieu (B-8).

9:17. Enemy plane coming from direction of St. Mihiel traveling towards Hennemont a Pfalz, A.A. active (B-8).

9:45. Two enemy planes, a Rumpler and a LVG, photo, coming from direction of Jalvecourt towards Maiyevia [?] (B-8).

15:33. One enemy plane coming from direction of Etain, fired on by AAA, turned back towards Etain.

Balloon No. 6 reports 3 enemy planes in direction of St. Remy but does not locate.

Balloon No. 7 reports 4 planes in vicinity of Sommedieue, but does not locate.

Balloon No. 12 reports 19 enemy planes observed during the day but does not locate.

Enemy Balloons.

New balloon in neighborhood Chaumont; in ascension at 5:45 to 7:55 and at 8:40 to 12:30.

Parfondrupt in ascension 11:00-11:25, 11:55-12:00, 14:00-14:20.

Le Pernard [?] in ascension 12:15-17:30.

Bois de Harville in ascension 7:00-17:15.

Bois de Moulotte in ascension 7:45—15:30.

Boinville in ascension 15:00-15:55.

Artillery Adjustments: Four.

Allied Balloon Ascensions: Ten.

Enemy Batteries Spotted: At 61.5-57.5, 4 pcs., time 15:35.

Objective unknown, probably Toul.

Fourth Army Corps

12:00 o'clock Sept. 14 to 12:00 o'clock Sept. 15.

General Impressions of the Day: Sector very active.

Enemy Aeronautical Service:

8:25. Enemy airplane fell to ground slightly to right of Jaulny (B-10).

8:30. Two enemy planes in N.W. (B-3).

9:06. Enemy plane in direction of Buxieres (B-9).

9:26. Nine enemy planes direction of Dampvitoux (B-69).

10:06. Five enemy planes in N.E. (B-3).

10:10. Enemy plane in direction of Thiaucourt (B-69).

Balloons.

12:27. Balloon in ascension in direction of Marielles (B-69).

12:52. Balloon in ascension in direction of Jonville and Lachausse (B-69).

15:11. Balloon in ascension in direction of Gorze (B-69).

6:50. Balloon in ascension in line with Thiaucourt 15K away (B-5).
7:19. Balloon in ascension in Chambley (B-69).
7:36. Balloon in ascension E. Moselle (B-69).
7:40. Balloon in ascension at Jonville (B-3).
7:41. Balloon in ascension in vicinity of Sponville (B-3).
7:35. Balloon in ascension back of Sponville and Jonville (B-69).
8:00. Balloon in ascension in direction of Gorze (B-69).
8:40. Balloon in ascension in direction of Euvezin Co-ord. G-1079 (B-10).
8:41. Balloon in ascension Co-ord. G1079 Bois Hageville (B-10).
9:25. Balloon in ascension Co-ord. B5140 Min de Rembercourt (B-10).
9:29. Balloon in ascension Co-ord. B7027 (B-10).
9:57. Balloon in ascension in line with Thiaucourt (burned by four allied planes) (B-3).
10:05. 2 Balloons on ground Co-ord W3168 (B-3).
11:00. One of last observed balloons ascending (B-10).

Artillery Adjustments: Nil.
Allied Balloon Ascensions: Seven.
Enemy Artillery Seen in Action:
One enemy battery located at Co-ord. 66.5-46.1 (B-8).
Enemy battery of four guns at 66.9-47.8 (B-8).

Paegelow

Second Colonial Corps
September 16, 1918

Supplementary Daily Report

Ascensions:
B-20. 6.30-9.10, 11.20-12.40, 12.40-18.40, 6.30-7.25.
B-52. 6.10-6.40, 12.15-still up.
Enemy Aeronautical Service
B.20
At Co-ord. 17.83. on the ground near Hannonville-au-Passage.
At Co-ord. 88.75 West of St. Maurice in the center of Bois sans Nom one and half kil west of Jonville.
At 17.05 Boche balloon burned in direction of Conflans.
At 8.10, 9 German planes in the Chamblay-Vigneulles region
At 9:10 Several enemy airplanes in the region of Deuxnouds.
At 18.00 4 enemy airplanes in the region of Lachaussee.
B.52.
Enemy balloon in direction of Haumont in the corner of Bois de Bouxelle at Co-ord 38.13.

Enemy balloon in direction of South Eastern part of Dommartin at Co-ord. 73.48.

Enemy balloon in direction of Corno du Bois Chaufour at Co-ord 31.49 near Hannonville-au-Passage.

Enemy Batteries Seen in Action:

B-20.

Enemy batteries in action at Co-ord 55.75 near Mars-la-Tour at 16.05.

A.A.A. active at 16.05 at Co-ord 58.72 in vicinity of Mars-la-Tour.

B-52. Active Batt. Cal. 105 at Co-ord 15.83 firing toward 79.66.

Balloon 41 has no communication.

Balloon 53 is in reserve at Vignot.

Paegelow

Fourth Corps, Sept. 16, 1918

Ascensions:

B-3. 4 ascensions 11 Hours 15 Minutes.

B-10. 3 ascensions 11 Hours 26 Minutes.

B-69. 3 ascensions 15 Hours 32 Minutes.

B-43. 2 ascensions 8 Hours 43 Minutes.

Enemy Aeronautical Service: Very active.

Enemy balloons seen at the following stations Bois de Viex, East of Buxieres, Sponville, Hattonville, Jonville, Chambley, St. Gulein, Waville, Lachaussee, Bayonville.

Balloon in direction of Avillers burned at 6:10.

Balloon at X 72.50—direction of Champs—burned at 11:20 A.M.

Enemy Batteries Seen in Action:

15:33. Battery in action at 75.4-54.7.
16:00. Battery in action at 66.1-49.7.
19:08. Battery in action at 60.3-54.5.
19:30. Battery in action at 62.4-50.9.
19:32. Battery in action at 62.7-47.4.
5:33. Battery in action at 62.2-49.5.
6:05. Battery in action at W-4560.
6:50. Battery in action at W-1345.
7:30. Battery in action at 67.3-54.3.
8:12. Battery in action at 65.8-37.1.
11:31. Battery in action at W-7443 (2 Guns).
7:42. Battery in action at 67.5-54.6 (objective Xammes).
8:00. Battery in action at 64.9-34.7 (objective Xammes).
11:10. Battery in action at 64.9-34.7 (objective Xammes).

The greatest part of the shelling is in the Jaulny, Thiaucourt, and Xammes Sector.

Adjustment of Artillery Fire:

B-3. Six adjustments 155M/M 98 shots fired 98 shots observed.

B-10. Two adjustments 155 G.P.F. 30 shots fired 29 shots observed.

B-69. Two adjustments 155 Short 31 shots fired 27 shots observed.

Report from 12:00 to 7:00 o'clock

Ascensions:

B-3. 1 Ascension, 4 Hours 58 Minutes.

B-10. 1 Ascension, 7 Hours 16 Minutes.

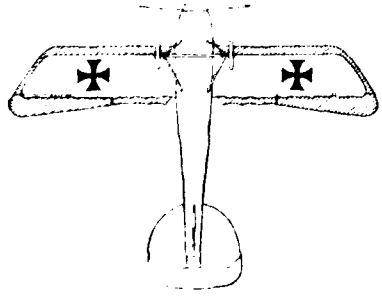
B-43. 1 Ascension, 2 Hours 06 Minutes.

B-69. 3 Ascensions, 4 Hours 44 Minutes.

Enemy Aeronautical Service: At 12:00 O'clock #43 attacked. Enemy plane driven off by Anti-aircraft. Observers landed O.K.

Movements of Balloons: (American). B-9 Move to Co-ordinate 52.7-41.0 (Bois de Thiaucourt near Lamarche).

Paegelow



Headquarters Commander Army Balloons
First Army
September 17, 1918

Daily Report Operations Balloons in First Army

First Army Corps
From Noon Sept. 15th, to Noon Sept. 16

Enemy Batteries in Action:

14:45. Battery of large cal. at 83.3-59.3 east of St. Quentin (B-5).

18:41. Battery 4 pcs. large cal. 84.57-45.49 (B-5).

5:35. Battery of Med. Cal. at 70.55-45.55 (B-5).

6:11. Battery at Fort St. Quentin (B-5).

7:30. Battery 1 pc. at 67.4-46.6 (B-1).

Enemy Aeronautical Service:

Air planes:

12:25. 1 Fokker burned Balloon 1 and 2 observers jumped and landed safely. Balloon 11 was also attacked but unsuccessfully (B-42).

13:00. 4 Fokkers over B-1 (B-1).

13:05. 5 planes west of Pont-a-Mousson (B-5).

15:55. 1 Albatros F.W.V. in the east (B-1).

16:05. 6 Fokkers in the north (B-1).

16:06. 6 Fokkers in the West (B-1).

16:55. 1 Albatros F.W.V. in the north east (B-1).

17:30. 1 Albatros F.W.V. in the north east (B-1).

17:45. 1 Albatros in the east (B-1).

18:50. Balloon 5 approached by planes, driven off by excellent

D.C.A. barrage which punctured balloon in three places (B-5).

8:25. 1 flight of 7 Fokkers D-7 and Albatros D-5 in No. 8 Kil. all with white vertical rudders but no other insignia visible on Fokker of the flight with broad white band around central part of fuselage (B-2).

18:35. 1 flight of Albatros D-5 in the north west 4 Kil. all with white vertical rudders (B-2).

8:35. 8 Fokkers patrolling in the north (B-1).

8:50. Same flight of 7 Fokkers D7 as above. In the N. 7 Kil (B-3).

8:55. Same flight of Albatros as above in N.W. 5 Kil. (B-3).

9:05. Same flight of Fokkers as above in north very low 7 Kil. (B-2).

9:15. 1 Hannover very low in N.E. 4 Kil. (B-2).

9:25. 1 Hannoveraner in the east (B-1).

9:25. Enemy planes approached Balloon 5 from east (B-5).

Balloons

8:52. Balloon in ascension over Marieulles, Louvigny, (2) Mars-la-Tour, Bayonville (B-5).

13:15-15:35 Goin in Ascension also at 16:21, 6:18-6:34, 7:45-9:47, 9:53 (B-5).

6:34. Preny in Ascension also at 13:32, 10:30, 18:22 (B-5-42).

8:05 and 13:25. Marieulles in ascension 81.3-46.0 (B-5-42).

15:05. Two enemy balloons to right of Chambley (B-5).

17:22. Balloon apparently burned 1 Kil East of Chambley (B-5).

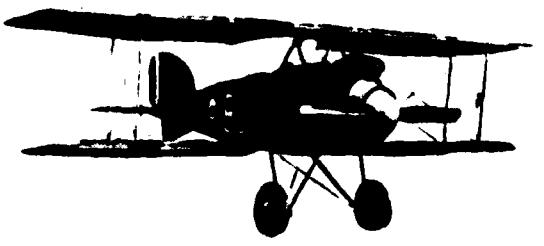
18:22. Pagny and Preny apparently retreat 8 Kilos (B-5).

18:30. Balloon descends at 75.0-50.8 (B-5).

19.18. Two balloons in line Bois-de-Jurieux (B-42).

Adjustments of Artillery:

12:14. Battery C 60th C.A.C. Cal. 155 L fired 20 observed 20 target 69.9-45.35 ammunition burned around target. Incomplete. Balloon burned by enemy plane (B-2).



A German Albatross.

13:37. Battery 340 Cal. 340 Fired 1 observed 1 target 83.21-57.41. This shot was a direct hit on a road (B-5).

8:05. Battery 340 Cal. 340 Fired 8 observed 7 target 83.21-57.41 (B-5).

Note: The following is Aeroplane report for Balloon 2 dated Sept. 14 and 15. During the last 24 hours [there were] at least four different flights of Fokkers D-7. Each flight had one plane with a broad white band running around central part of fuselage one flight the leader had plane with red fuselage. Tail planes all white with black nose. Rest of flights had white vertical rudders and three stripes around central part of fuselage, two black with a white one in the center. Practically all Fokkers have white vertical tails. Several Fokkers with red noses have been seen. Two of these flights had one Albatros D-5 in each.

Ascensions of Allied Balloons: 11.

Enemy Artillery: Very Active.

Fourth Army Corps
From Noon Sept. 15 to Noon Sept. 16

Enemy Batteries Seen in Action:

15:33. Battery co-65.4-54.7 (B-69).
16:00. Battery co-65.1-49.7 (B-69).
19:08. Battery co-50.2-54.5 (B-69).
19:22. Battery co-52.4-50.9 (B-69).
19:30. Battery co-52.7-47.4 (B-69).
19:32. Battery co-62.2-49.5 (B-69).
5:33. Battery Bois-la-Dame Co-ord W2508 (B-3).
6:05. Battery co-ord W4560 (B-3).
6:50. Battery co-ord W1345 (B-3).
7:30. Battery co-ord 67.2-57.3 (B-69).
8:12. Battery co-ord 65.8-57.1 (B-69).
11:31. Battery co-ord W7443 2 guns Probably 150's (B-3).
7:15. Battery co-ord W-6755 AAA (B-3).

Enemy Aeronautical Service:

Air Planes

12:32. Enemy burns 2 Allied Balloons (B-69).
13:00. Five enemy planes direction Vigneulles (B-69).
16:22. Six Pfalz planes direction St. Benoit (B-69).
16:03. Five Pfalz planes in direction Beney (B-69).
13:38. Enemy plane in east of Maizerais (B-5).
6:23. Plane with two engines going east Mars-la-Tour (B-3).
9:00. Four Pfalz planes direction Beney (B-69).

Balloons

6:30. P. of A. of balloon nearest Sponville approx. Co-ord W1745 (B-3).
8:25. Enemy balloon at Co-ord X 7250 (B-10).
11:30. Enemy balloon burned in direction N.W. of Beney (B-10).
11:37. Two enemy balloons located in Bois-de-Viex other S. of Vuxirrex [?] (B-3).

5:51. Enemy balloon in line with Maizerais and Haddonville (B-3).

6:09. Balloon on road east of Sponville (B-3).

6:10. Enemy balloon burned in direction of Avillers (B-69).

6:16. Enemy balloon in direction Haddonville (B-69).

6:16. Enemy balloon in direction Sponville (B-69).

6:17. Enemy balloon in direction Rembercourt (B-69).

8:13. Enemy balloon in direction Xammes and Charey (B-69).

8:46. Enemy balloon between Jonville and Lachaussee probably directing fire on Beney (B-69).

8:47. Enemy balloon in direction Vieville-en-Haye (B-69).

Artillery Adjustments:

Balloon	Adjustments	Calibre	Fired	Obs.
3	6	155	98	98
10	2	155 GPF	30	20
69	2	155 Short	31	27

Ascensions of Allied Balloons: 3.

Enemy Artillery: Very Active.

Fifth Army Corps
From 19:00 O'Clock 15th to 19:00 O'Clock 16

General Impression of the Day: No infantry Activity. Enemy Artillery activity increased, enemy plane increased activity, enemy balloons increased activity.

Enemy Batteries Seen in Action:

7:10. Enemy AAA Active in N.E. of Fresnes-en-Woevre (B-8).

7:20. Enemy AAA Active N.E. of Hennemont (B-8).

16:27. AAA Active east of Fresnes-en-Woevre (B-8).

18:12. Enemy artillery in Bois-de-Pareid objective Saulz (B-8).

18:15. Enemy AAA active near Harville (B-8).

18:30. Enemy battery flashes seen in direction of Conflans. On account of poor visibility location impossible (B-6).

9:00 to 7:01. Enemy battery Ravin-du-Vozel. Approximate location 34.3-59.00 (B-7).

Enemy Aeronautical Service:

Air Planes:

6:57. Enemy plane over Treauvaux (B-12).

7:11. Enemy plane over Sommedieue (B-12).

7:13. 2 Enemy planes over Haudiomont (B-2).

7:17. 2 Enemy planes over Tresauvaux flying West (B-12).

7:20. 2 Enemy planes about 3 Kil. S. of Haudiomont (B-12).

7:45. DFW coming from direction Vionville disappear in direction of Boinville fired on by AAA (B-8).

Pfalz coming from direction of Manncourt, mission reconnaissance, fired on by AAA (balloon No. 8).

7:48. 2 Enemy planes over Co-ord Z 0659 (B-12).

8:11. Enemy plane over Co-ord Z 0659 headed North (B-12).

9:18. Enemy plane coming from Presavaux [?] toward West (B-12).

9:55. Enemy plane over Sommedieue (B-12).

9:54. Rumpler north of Sommedieue flew straight toward balloon no 7 had French insignia on lower wing fired on by AAA when over 35.7-58.2 turned and went over line in north east at 10:06 o'clock. Purpose apparently to direct artillery fire on Balloon 7 camp (B-7).

10:16. Enemy plane near Haudiomont (B-12).

10:18. Rumpler about 4 Kil north of Sommedieue directing Art. fire on Bal. No. 10 plane returned across line in N. (b-7)

10:25. One plane directly over Z 0659 (B-12).

10:38. Three enemy planes in direction of Rupt-en-Woevre (B-12).

10:40. Two enemy planes near Manheulles (B-12).

10:53. Albatros D3 sighted about 5 Kil. from Balloon. When plane was about 200 meters away the observers jumped. AAA put up heavy barrage after plane passed over. Plane went out of sight in NE Insignia on wings White Maltese cross in black circle (B-7).

10:56. One plane over Sommedieue (B-12).

11:05. One plane near Manheulles (B-12).

11:28. One plane near Manheulles (B-12).

11:50. 4 planes evidently fighting in region of Doncourt at low Alt. Only one of these planes was seen flying away to N E. (B-6).

11:45. Fokker biplane at very high alt. about 6 Kil. NW of B-7 circled and retu[illegible]d flying N. at 11:52.

16:02. Rumpler C-4 flew from north to south fired on by AAA and flew directly over Bal. Position 35.7-58.2. Machine gunners fired 2544 rounds plane returned in E at 16:15 (B-7).

Enemy plane approaching from Louvemont mission reconnaissance disappears in direction of Warcq (B-8).

16:03. Enemy plane flying over Sommedieue (B-12).

16:05. Enemy plane flying over Ancemont (B-12).

16:07. Enemy plane headed west for Bal. #12 turned North from Z 0659 after being fired upon (B-12).

16:25. Three planes being fired upon east of Ancemont (B-12).

Balloons:

Maizerais Balloon, 1 Ascension.
Harville Balloon, 2 Ascensions.
Bois-de-Hautes-Epines, 2 Ascensions.
Bois-de-Corps, 3 Ascensions.

Ascensions of Allied Balloons: 12
Enemy Artillery: Active

John A. Paegelow
Major, A.S., U.S.A.
Commander Army Balloons First Army

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Information Section
Air Service, First Army
September 16, 1918

Reports Received

Report from First Pursuit Wing, 16th September 17:03. Eleven planes from the First Day Bombardment left airdrome 12:30, returned 15:10. Objective Conflans. Bursts observed northeast and south of town. Four direct hits. Evidence that Conflans had been bombed earlier in the day. Following enemy movements observed: 1-145 car train going south from Jarny at 14:10. 3 trains with steam up west of Metz in yard at 2:10. 600 cars at Briey at 2:00 p.m. 500 cars at Dommary-Baroncourt at 2:00 P.M. 500 cars at Moneville at 2:00 o'clock. 200 cars at Etain at 2:10. 6 motor trucks at side of road near Giraumont. Truck train seen on road south of Gondrecourt at 2:10. 10 trucks near Giraumont at 2:10. 20 trucks at Harville at 2:20. 350 cars at Conflans at 13:50 o'clock. The first expedition saw no enemy aircraft. The second sighted seven Fokker planes with rose colored wings with white bodies.

Report from First Pursuit Wing, 16th September. Reported by 1st American day bombing group. Bombing raid made on Longuyon at 7:30 A.M. Sept 16 targets, station and railway yards, approximately 22:00 kilos bombs dropped. Following enemy movements observed: one 50 car train going south from Gondrecourt, one 50 car train going east from Longuyon at 7:20, two 50 car trains going south from Longuyon at 7:05, one 50 car going south from Dommary-Baroncourt at 7:05, one 50 car train going south from Conflans at 7:05. One 50 car train going north from Longuyon at 7:20, one 50 car train going west from Longuyon at 7:40, one 35 car train going north from Longuyon at 7:10 two 50 car trains going from Longuyon to Audun at 7:10, about 600 cars and 8 engines with steam up in Longuyon yards at 7:10. Two planes on landing field at Longuyon at 7:20, 3 planes on Serbey field at 7:20, one balloon on ground about 1 km west of Lisson [?] at 7:20. Much material in the fields about Spincourt. Large number of trucks in large field NW of Spincourt at 7:10. Train of 7 cars on narrow guage railway in Foret of Manginnes [?] at 7:10. Last night the British dropped a total of just over 11 tons on Metz-Sablons, Lorquin airdrome, Boulay, Buhl and Morhange. Especially good results were obtained on the Buhl airdrome where several machines were destroyed and fires started in a number of hangars. The long distance bombing group dropped a total of 5 tons of bombs on the towns of Karlsruhe and Mainz, making a total of 16½ tons of bombs dropped for the night.

Report from Villome Bombardment Group, 16th September 7:00. During the night (15th to 16th September) 23 Capronis (GB-2) and 10 Capronis (GB-18) dropped 14,100 kilos. Longuyon station 6,145 kilos. Dommary-Baroncourt stations 6,274 kilos. Audun-le-Roman station 440 kilos, Conflans station 1240 kilos. Five planes belonging to Squadron #9 attacked at low altitude R.R. trains and stations on the Battlefield. 3 teams (GB-2) and 3 teams (GB 18) made three sorties. Adjutant Couppie (Squad 130) made 3 sorties on Longuyon station. Results: 2 fires in Longuyon station. Reconnaissance of Squadron 115 on Pont-a-Mousson, Metz, Mezieres-Thionville, Audun-le-Roman, Conflans, and back. R.R. tracks 2 trains in Maizieres-les-Metz at 21:30. Frouville station very much lit up. One train from Thionville to Audun-le-Roman. Battembourg much lit up. Conflans was not lit at all. Nothing to report on the road. A.A.A. fairly active along the whole itinerary. General Impression: The station seem to be less lit up near the zone of the battlefield. (Perhaps owing to the moonlight). R.R. tracks—lights in Mars-la-Tour station at 21:00. One train going toward Thionville at 21:45. One train in the station of Roman and back. No convoys on the road. Observation—A.A.A. very active on the whole itinerary.

Report from First Pursuit Group, 16th Squadron 12:00. Reports the towns of Gorze and Rembercourt near Pont-a-Mousson in flames at 10:40. Lieutenant Davis of the 94th Squadron reports big explosion 10 kilometers southwest of Verdun.

Report from Fourth Corps, 16th September 13:40. Protection reglage 10:05 to 10:50. Altitude 1500 meters. Reports no troops movements Norroy to Vilcey-sur-Trey. No troop movements, no convoys, no fires, no train movements on enemy's side of lines. Very little enemy artillery.

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Headquarters, Air Service, First Army
American Expeditionary Forces

Operations Report Number 17, 19:00 September 15th, 19:00 September 16th 1918.

1. Atmospheric Conditions. Clear and sunny. Visibility excellent throughout the day.

2. Enemy Aerial Activity. As a result of our aggressive and organized offensive of the day previous, enemy aerial activity throughout the day was extremely light, enemy planes being sighted in but very few cases. The absence of enemy aerial activity is also probably due in great measure, to the very effective bombing by British, French and our own units on the day and night previous when most of the active

enemy airdromes were very heavily and effectively attacked. Very few enemy balloons were in ascension, and in every case were pulled down immediately upon the approach of our patrols.

3. Activity of Our Own Aviation.

(a) Pursuit. The French Aerial Division carried out a total of 61 patrols in the course of the day, engaging the enemy in 11 combats. Enemy balloons were attacked on 16 occasions, and at least four were definitely known to go down in flames, while the remainder were in several cases very badly damaged. In addition to the balloons destroyed, it is very probable that one enemy plane was also destroyed by the Aerial Division.

The First Pursuit Group encountered in the course of 12 patrols, a number of formations of enemy planes, which appeared to be flying in groups of 3, 6 and 9. Six combats were engaged in by this group, as the result of which it is believed three enemy planes were destroyed.

The First Pursuit wing executed 18 patrols engaging the enemy in 10 combats, resulting in the probable destruction of three enemy planes.

(b) Observation. Corps Observation Units were active throughout the day executing a considerable number of visual reconnaissance missions as well as a number of very successful photographic missions. Over 350 successful photographs of the front lines and the enemy's defensive organization were taken in the course of the day. Several very successful adjustment missions were also performed by various units of Corps Observation, resulting in very effective work.

The Army Observation Group made 13 reconnaissance missions in the course of the day, reporting information concerning movements in the enemy's rear areas.

A detailed report has just been received concerning a very important mission carried out on the morning of the recent attack, by Major Reynolds, Group Commander, with Lieutenant Snyder as observer. The mission left the field in a heavy rain-storm, and with clouds at 1000 meters this plane flew over enemy territory to a depth of over 50 kilometers, passing through many rainstorms enroute, and from its low altitude was harrassed continually by very accurate anti-aircraft fire. The trip was accomplished, however, without mishap, and the plane returned safely having been over enemy territory for over two hours, at no time over 1000 meters.

(c) Bombardment. On the night of Sept. 15th-16th, Independent Force, R.A.F., carried out heavy attacks on the railroad at Metz-Sablon, and on enemy airdromes at Lorquin, Boulay, Buhl and Morhange. Very good results were observed in all the above places, and a total of over 11 tons of bombs were dropped on these targets.

French Night Bombing planes or the Groupment Villome executed 4 very important bombing raids on the night of the 15th-16th. A total of 6150 kg's of bombs were dropped on the station at Longuyon, 6270 kg's on the station at Dommary-Baroncourt, and over two tons of

bombs were dropped on the station at Conflans and Audun-le-Roman. Excellent bursts were observed causing great damage at each of the above targets.

Five planes of our night reconnaissance squadron during the night of the 15th-16th, attacked trains, stations and troops, firing many rounds of machine-gun fire with very good effect.

Our Day Bombardment Group carried out 9 bombing raids in the course of the day, dropping over 5 tons of bombs on the station at Longuyon and Conflans. Four direct hits were observed northeast and south of the town of Conflans, and very good bursts were observed on the railroad tracks at Longuyon. This squadron reported that at Conflans, damage inflicted by recent bombing operations has been very great.

Bombs on a Liberty DH-4

Operations Report No. 17 (Cont'd)

Airplanes		French Aerial Division	Pursuit		Bombardment		Observation		Corps Observation Wing			
			1st Group	1st Wing	1st Army Day Group	Fr Night Group	1st Army Group	Heavy Artillery Group	1st Corps	4th Corps	5th Corps	2nd Fr C.A.C.
Sorties		254	101	171	49	33	13	8	38	29	14	19
Trials			5	25	1				4	6	6	3
Combats		11	6	10							2	
Pilots	On Roll	661	80	251	56	42	31	34	76	66	60	41
	Available	472	71	234	39	33		33	69	60	51	34
	Missing		1	1								
	Wounded											
	Killed											
Observers	On Roll	240			60	35	24	24	57	51	46	30
	Available	173			48	25		22	50	43	46	28
	Missing											
	Wounded											
	Killed											
Enemy Planes	Con.											
	Uncon.	1	3	3								
Planes	Total	633	97	275	60	30	57	32	84	75	72	39
	Available	414	62	156	30	31	34	30	46	68	48	30
	Crashed			1	1						1	
Total Hours	Flying		133:44	251:15	74:51	66:00	21:25	10:00	48:00	36:39	32:25	41:30
	Service		131:10	239:25	74:21	66:00	15:45	10:00	45:75	28:40	32:25	
Exercises												
Target Practice							1					
Alerts			1							5		
Patrols		50	6	17								
Protections			4	1			6		6	11	3	9
Voluntary Patrol		11	2						4			

Operations Report No. 17 (Cont'd)

Airplanes		French Aerial Division	Pursuit		Bombardment		Observation		Corps Observation Wing			
			1st Group	1st Wing	1st Army Day Group	Fr Night Group	1st Army Group	Heavy Artillery Group	1st Corps	4th Corps	5th Corps	2nd Fr C.A.C.
Reconnaissances	Visual						2		23	8	3	3
	Photo						4		4	1	3	4
	Night											
Plates Taken	Suc				10				68	29	72	120
	Unsuc									7		
Adjustments								3	1	1	1	
Rounds	Fired								20	30		
	Observed								16	30		
Cartridges fired					2056				257	1000	380	
Infantry Liaison												
Special Missions				1							2	
Ferry Flights												
Bombing Raids					9	33						
Bombs Dropped	50 Kg.											
	20 Kg.											
	10 Kg.											
	Kilos				5040	1440						
Enemy Balloons	Con.	4										
	Uncon.	12										

Balloons	American	French
Ascensions	21	4
Hours of Flight	94:55	10:00
Adjustments	1	
Rounds		
Fired	16	
Observed	8	

William Mitchell
Colonel, A.S., U.S.A.
Chief of Air Service, First Army

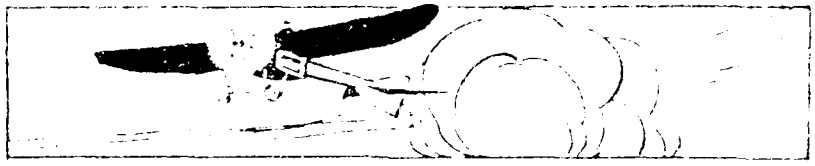
By Thomas S. Bowen
Major, A.S., USA
Operations Officer

Plane Situation, First Army
Sept. 16, 1918

Station	Group	Squadron	On hand yesterday	Lost	Received	On hand to-day	Due on Order	Available for duty	Type	Spad 13	Salmson 4	DH 4s B	DH 4s Ob.	Breg. B	Breg. Ob.
Toul	2nd Pursuit Group	13	24	0	1	25	0		Spad	25					
		22	25	2	2	25	0			25					
		49	25	0	0	25	0			25					
		139	24	0	1	25	0			25					
	1st Corps Observation	1	21	0	0	21	1		Salmson		21				
		12	24	0	0	24	0				24				
Gondreville	Army Observation Group	24	24	0	0	24	0				24				
		91	24	3	5	26	4	22			26				
Vaucouleurs Field No. 1	3rd Pursuit Group	28	25	0	0	25	0		Spad	25					
		93	25	0	0	25	0			25					
		103	26	1	0	25	0			25					
		213	25	0	0	25	0			25					
Ourches	4th Corps Observation Group	8	23	0	0	23	1		DH 4's				23		
		90	24	0	0	24	0		Salmson		24				
		135	17	0	5	22	2		DH 4				22		
Amanty	Night Recon. Day Bombing	9	18	0	3	21	4		Breg						21
		96	20	0	5	25	0							25	
Bicqueley	1st Corps Observation Group French	50	22	1	3	24	0		DH 4				24		

Document 492 (Cont'd)

Station	Group	Squadron	On hand yesterday	Lost	Received	On hand to-day	Due on Order	Available for duty	Type	Spad 13	Salmson 4	DH 4s B	DH 4s Ob.	Breg. B	Breg. Ob.
Souilly	5th Corps Observation Group	88	18	0	0	18			Salmson		18				
		99	24	0	0	24					24				
		104	24	4	4	24					24				
Rembercourt	1st Pursuit (218th Park) (Flight C, 648 Supply)	27	23	0	1	24			Spad	24					
		94	23	0	0	23				23					
		95	25	0	0	25				25					
		147	25	0	0	25				25					
		11	20	0	2	22	1		DH 4			22			
Total		20	20	0	5	25	0					25			
			618	11	37	644	13			297	185	47	69	25	21



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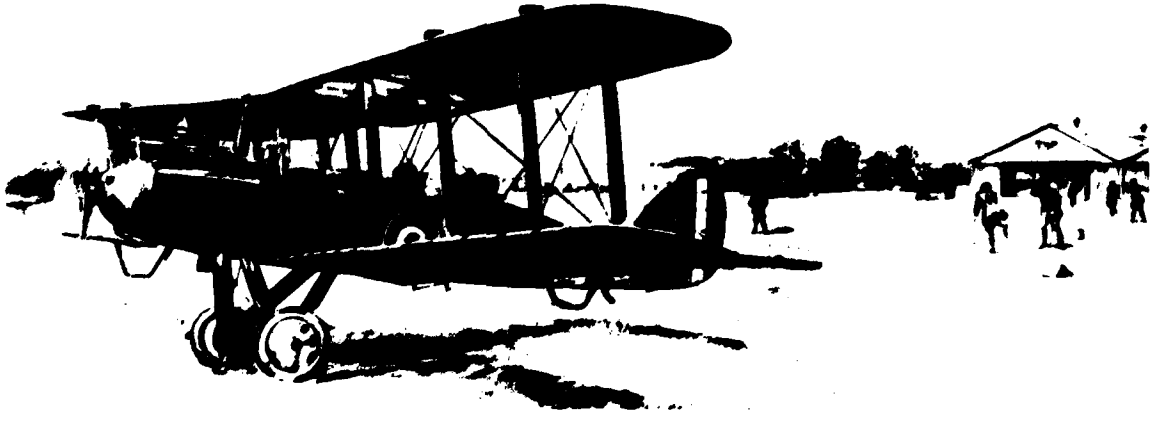
Airplane Gas and Oil Report
Air Service First Army
Date Sept. 16, 1918

Report from Equipment Department

Station	Kind	Gal. on hand yesterday	Gal. Delivered	Gal. Received	Gal. on hand today
First Air Depot	Fighting Spirits	15,936	8,533	21,760	29,163
	Gasoline	26,191	4,968		21,223
	Castor Oil	22,173			22,173
	BB Oil	19,702	550		19,152
Rembercourt	Fighting Spirits	3,721			3,721
	Gasoline	50,402			50,402
	Castor Oil	7,353			7,353
	BB Oil	36			36
Souilly	Fighting Spirits				
	Gasoline	5,945			5,945
	Castor Oil	10,969			10,969
	BB Oil				
Toul	Fighting Spirits	747			747
	Gasoline	11,827	346	2,030	10,310
	Castor Oil	30			30
	BB Oil				
Mobile Park No. 1	Fighting Spirits	5,386		3,200	8,586
	Gasoline	20,105	3,413	1,653	18,345
	Castor Oil	4,800	587	337	4,550
	BB Oil				



Historical Summaries

The histories written by the various units of Air Service, AEF at the end of the war usually include a summary of the unit's operations in each of the major battles or campaigns in which the unit participated. In many instances the summaries were poorly done and are of little value. Some, while providing considerable data, merely repeat, in narrative form, information found in operations reports included in this volume. Some, however, provide additional information of interest. The St. Mihiel summaries selected for use in this volume tell, for example, of the problems of trying to conduct pursuit operations without enough wheels to have a set for each of the squadron's airplanes; of field orders that arrived long after they were to have been executed; of ground fire, that "Hell of air work"; of a pilot's surprise at not being "scared stiff" when he met the enemy; of the difficulty of trying to maneuver an inflated balloon along a road crossed by telephone lines strung on poles by the Signal Corps; of taking off in mud and flying through clouds and rain to carry out the mission assigned. There are tales of hardship and heroism, of battles won and lost. For the most part, however, these summaries fall far short of the goal set when the historical program was established in May 1918, that of telling "the living, the human, the American story" of the war.

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27th Aero Squadron

The 27th Squadron after finishing operations on the Chateau Thierry front, was immediately ordered to the St. Mihiel sector. At this time this particular front was known as the St. Mihiel Salient, reaching from Watronville on the west to Pont-a-Mousson on the east, extending in depth to the town of St. Mihiel.

We arrived on the 3rd. day of September and started operations on the following morning.

In order to deceive the enemy in regards to the number of planes concentrated on this front for the coming offensive we were ordered to fly in formations of two and three. We were ordered never to cross the lines and stay on the defensive only.

In order to keep our operations from being known to the enemy, it was necessary to keep a pilot in the air in the vicinity of our airdrome at an altitude of 5000 meters to guard against enemy photographic machines. All machines were camouflaged and never allowed to be seen on the field except on the taking off and returning.

The attack opened on the morning of September 12th 1918 after an intense artillery preparation. (Zero hour being 5 o'clock). Our orders were to take the offensive at all points with the object of destroying enemy aircraft; attacking his troops on the ground; protecting our observation planes and ground troops. All hostile balloons were to be attacked in our sector.

It was impossible to carry out orders in regards to large formations at high altitudes on account of the weather conditions. It was only possible to fly at 250 meters, and was ordered out [?] individually to observe enemy troop movement and straffe his infantry and all convoys. The weather conditions remained the same throughout the day, and it was only possible to make repeated trips and protect our troops from his low flying machines.

September the 13th the weather conditions being much improved the following operations were carried out. The first patrol was ordered out at 8 Hrs 45 to 10 Hrs 15, consisting of two echelons of four planes each, the lower echelon operating at an altitude of 2500 to 3500 meters, the upper echelon at an altitude of from 3500 to 5500 meters. We scoured the lines between Chatillon-sous-les-Cotes to St. Mihiel attacking all enemy aircraft and affording protection to our observation and photographing planes. Each patrol was ordered to observe all enemy activity on the ground and report any movement seen immediately upon returning.

On the 14th the army having gained their objectives, we were ordered to patrol along the sector from Chatillon-sous-les-Cotes to Etang-de-Lachaussee, the absence of enemy machines permitted us to carry out the same orders as of the 13th and permitting the pilots without hindrance of enemy machines to straffe ground troops and convoys. Our balloon pilots were active and succeeded in shooting down the enemy balloons in our sector.

Our army having gained all objectives and the St. Mihiel Salient wiped out the army digging in, we resumed our schedule of former operations. Having the absolute supremacy of the air we observed all enemy captive balloons, attacked and destroyed at will.

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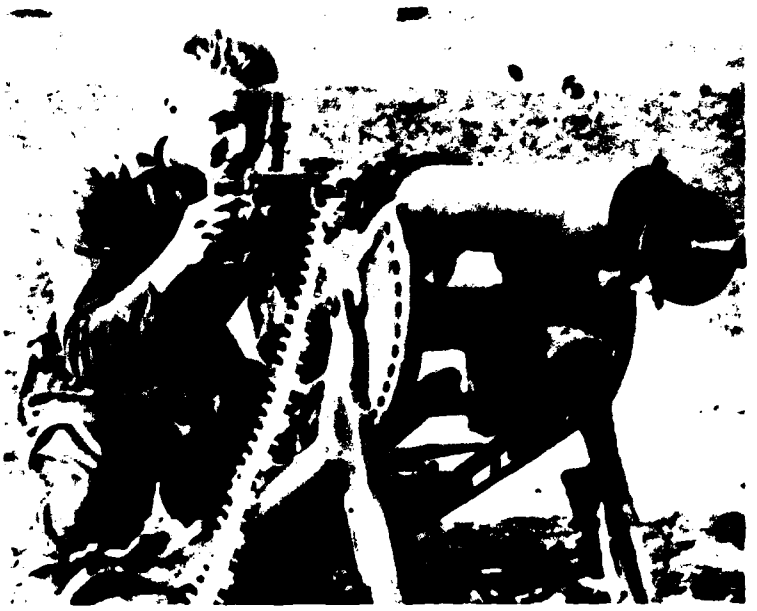
1st Pursuit Group

On September 12th the St. Mihiel offensive started and the First Pursuit Group was entrusted with the important and dangerous mission of "Low Flying on the Offensive" . . . . Under the direction of the Commanding Officer the pilots co-operated, and though pioneers in low flying, made this new form of offensive fighting a great success. A number of the pilots became experts in balloon straffing and in this department Lieutenant Luke of the 27th Squadron became very proficient and performed the wonderful feat of shooting down fifteen (15) balloons and three (3) planes in seventeen (17) days.

On the first day of the offensive the Group patrols began operating before daybreak in the morning and kept up a constant barrage over the sector (St. Mihiel-Chatillon) until after dark at night. Field lights being installed to allow the pilots to land after dark.

The enemy seemed very active on this front and the patrols were continually meeting low flying reglage and photographic machines protected by large formations of Fokkers. These they shot down or



Lt. Frank Luke, practicing to improve his gunnery skills.

Several aerial gunners combined to shoot down this enemy balloon.

drove back behind their own lines and it was gradually being recognized that low flying was one of the most important departments of Chasse work.

During this offensive the Group kept up an incessant and untiring barrage over our troops and the enemy line, and on September 25th the Group had added thirty-four (34) more victories to the list with only one casualty. Captain Meissner, Lt. Hudson and Lt. Luke had become Aces. Lt. Rickenbacker had shot down his seventh enemy plane. . . .

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22d Aero Squadron

Capt. Bridgman won the first victory for the Americans seven hours after we opened up against the Huns entrenched along the line St. Mihiel, Montsec, Flirey, Pont-a-Mousson. The Captain was scouting alone above the light film of clouds at 800 meters. Through the slight rifts he caught a glimpse of a Hannoveraner bi-place which, upon spotting the Spad, immediately dove for home with the Captain following shooting. Result—one Hannoveraner diving through a layer of mist to its crash.

Another combat similar to this very nearly took place directly after

this one, but this time the Boche got a head start while the Captain was interested in the battle below. Then a bullet from the ground, in the battle below, (either American or German, in those days both sides fired indiscriminately) put the Spad's engine out of commission and the Captain was forced to land on, what a few hours before had been enemy territory.

Lieut. Vaughn McCormick was killed in a crash upon returning to the airdrome from an early morning patrol. This was the first casualty for the 22nd. He was a man of excellent character, companionable and capable. He was buried with honors at the plot near Evacuation Hospital No. 1 where several of his friends are buried also, among whom are Lieuts. Herman Schultz and David Putman.

The next week patrols, of Allies and German became more concentrated, as the weather lifted somewhat from the tiresome murkiness of low clouds, gusty wind, and rain, to real "flying weather." On September 13th, the air was full of French, English and American planes, and the various layers of clouds did not prevent constant patrolling. Attached to several of our formations at this time were a number of 11th and 20th Squadron D.H.4 "Liberty's." At high altitude these ships were good rear protection, but near the earth the Spads ran away from them, so they were impractical for our work. Protection Missions were also carried out, Salmsons from the 1st, 12th and 91st Squadrons taking photographs and making reconnaissances while the Spads kept the Pfalz and Fokkers at a distance.

The 14th of September was clear, and ideal with the rush on the ground at its victorious height, and our work in the air maintaining supremacy over that of the Huns. Morning and afternoon patrols were carried out. The first big fight between Fokkers and the Spads of the 22nd, which later became common on the Verdun Front, took place over Mars-la-Tour, just after 3: o'clock in the afternoon.

The Spads were to meet a photographic Salmson coming out over Mars-la-Tour at 3: p.m. (or 15 hours, as the French report teaches the time). The usual orders were always to clear the sky of Germans in the area for a depth of 9 to 11 kilometers in advance of our front lines. The Hun played safe and conservatively still further beyond this range. At the time our planes were "en haut" the Boche had a string formation in 3 groups extending along the line Metz—Fresnes. At 3 o'clock our patrol was over the Salmson rendezvous going towards the center group of Boche. No Salmson was in sight but if it had been it is doubtful if about six Spads left in formation would have protected it against three batches of Fokkers, numbering five, six, and twelve planes. Strangely enough other Allied Chasse ships were scarce at this hour.

The patrol was "jumped" by the last collection of twelve. All except two members appeared to be sane and dived to approximate safety. Lieut. Kimber was engaged and his plane unreasonably shot to pieces, himself surviving by several miracles. Lieut. Hassinger disappeared

entirely from the fight as it was beginning, and it is practically certain that he fought a glorious fight against large odds, for if he did remain above to continue the struggle, the number against him became overwhelming due to the approach of the middle group of E.A.

Lieut. Brooks, riding as deputy in the first left position, went into the cross-fire of the swarm of Fokkers descending from the upper right region. He then went through the most exciting ten minutes of his life when he fought eight or ten of the red-nosed crew, maintaining his 5000 meters to Lake Lachaussee, where he manoeuvered down through 3000 meters accounting for several oppressors during the interim. With many bullets in his plane, right rudder control shot away, and one gun jammed by a bullet, he landed behind our lines and now has a tendency to date his life from September 14th.

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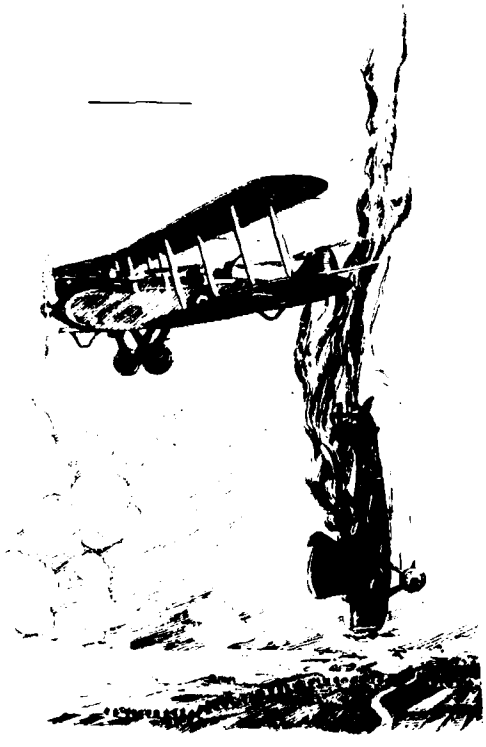
93rd Aero Squadron

The beginning of September brought intense activity in American Army units. The First Army was organized and concentrated in the St. Mihiel sector for its first independent operation. Two miles away from our field was quartered the First Division and a few miles farther on, was the Second Division, both of which, with other divisional units moved up past our camp shortly after. The tramp, tramp, tramp of the doughboys, the purr of the motors and the rumbling of the artillery could be heard most of the night, and all the day too, if the weather was such as to hide the movement from the Boche observers eyes. Other things were noticed, too, from the air—large encampments of American troops, new artillery emplacements, new railroad facilities and new aerodromes. As yet we had received no definite news concerning operations before us, but these signs were proof positive that a big "Push" was coming. Moreover, we knew that the American Army was overseas for the express purpose of helping to end the war. The general impression seemed to be that the surest and quickest way to end the war was to win it; so we set about to play in the air the part which that all powerful stage manager, G. H. Q., had planned that we should take.

Let it not be supposed, in spite of the uninteresting data which comprises the resume of our first month's work, that our path was entirely smooth and without obstacles. We lacked everything from experience to motors. For almost a week we had barely six pairs of wheels for our entire quota of ships. When one plane returned from patrol, its wheels would be hastily transferred to another machine which had been made ready for the next "show". There was a shortage of



motor parts too; even wrenches were scarce. All these little difficulties made the work of keeping our planes in the air a mountainous task, one for which Lt. Boles and the enlisted men under him deserve a deal of praise.

During the first days of September, our need of parts, and planes, was somewhat relieved and veiled orders started coming which pointed very steadily toward the early opening of the expected offensive. Our pilots were still ordered to patrol on our side of the lines for two very good reasons. In the first place in order not to call the attention of the enemy to the concentration of Air Services, which would have awakened his suspicions concerning our intentions. In the second place to avoid giving the impression of a large force of Pursuit planes on the sector, which would cause the enemy to send up additional squadrons of chasse to outnumber our small quantity of fighting planes. The idea was to strike hard when everything was ready, before that to lie low. Naturally this policy of watchful waiting was cause enough for violent excitement among the pilots of the Squadron. The return of each patrol caused a congregation of interested officers who were continually on hand to get the latest reconnaissance reports.

On September 11th we felt that the moment had arrived. We had all felt that for at least two weeks, but this time our expectations were aroused by a very significant order for the Major to report at once to the Group Headquarters. We waited in the mess hall where we were all sitting at dinner, until he returned an hour later with the news we had all been expecting. The big attack was scheduled to start at dawn the following morning, preceded by a three hour artillery bombardment. All planes which could possibly be made serviceable were to be in line with motors running at 4:45 and flight commanders were to have all pilots ready to take off at 5 o'clock. Perhaps with some unpleasant thoughts that tomorrow night would not find us all together in the mess hall, but with a determination to do the coming job well, the pilots went to bed early as a physical preparation for the morrow. Many were awakened about two o'clock by the roar of the big guns which continued their booming until the dawn of that eventful day which furnishes us our first real opportunity to put our Squadron among the list of those organizations which have "done something."

At 4:30 the field was a scene of officers and mechanics busily engaged in making final preparations for take off. Specific instructions had arrived at the operations office, and the flight leaders had final conferences with their pilots before leaving. The first show was a straffing mission—"The 93rd Squadron will furnish a patrol of six machines to attack with machine guns, a concentration of German troops on the road between Chambley and Waville". Off they went, with Lt. Wright leading, amid the low hanging clouds, across the lines in spite of the barrage of anti-aircraft fire which the Boche put up, and on to their objective. Once past this difficulty that Hell of air work, rifle

and machine gun fire from the ground, was encountered. Nevertheless the planes pushed on and carried out their mission, completely demoralizing the enemy, who were scarcely expecting an air attack so far behind their lines.

On the next patrol enemy planes are sighted by a formation consisting of Lts. Rummell, Cox and D'Olive. Several of them were attacked at close range. The full account of this battle we did not learn until the following day, when Lt. Rummell returned. His own story, which follows, will give a better idea of what took place:

"It was on a special reconnaissance mission that I set out at about ten o'clock with Lts. Cox and D'Olive following me. There were clouds at less than 400 meters and a fine rain which stung our faces like needles. I shall hurry over the preliminaries: how I lost Lts. Cox and D'Olive in the clouds, how I gained my objective, made the necessary observations, and started back. It was then that I glanced inside the cowling of my machine at my pressure gauge, and looked up again to find a speck, a German scout I soon decided, among the clouds, above and in front of me. I climbed, turning slightly away from the other machine, which started to climb towards me. He was then some 500 meters away and about on my level, with the clouds above, below and around us both. I recall that I was surprised at that very instant to find how calm and collected I was. I had thought I should be scared stiff; I felt that I ought to be but I wasn't. Nobody is I guess when he gets that far. What followed I did without reasoning. It just seemed the thing to do. The Hun was coming towards me, climbing in such a way to head me off if I kept straight on. Right along side my line of fight was a cloud, a small one, which I saw that I could get around. I turned, dodged around the cloud, climbing all the time, evidently giving the German the impression that I was running away, for when I had completed the circuit, I found the enemy machine going in the direction he had last seen me take. I was now above and behind him, and, most important of all, unnoticed. The rest was easy. I came down on him, opening with both guns at a distance of 75 yards. The tracer bullets I could see enter his cockpit and forward part of his fuselage. As I reached a point about thirty yards away from him, he seemed to pull the nose of his machine up; I followed with my tracers and became so intent on keeping those yellow streams flowing into him, that I almost drove my plane into his. Suddenly I did the only thing left to do. I dove underneath with full motor. When I looked back he had fallen into the clouds below us, lost to sight. Then I was scared; and lost. I could see the ground only at intervals, and could recognize no landmarks. I resorted to the compass, and what I could see of the sun, keeping as much in the clouds as I could to avoid possible attack from enemy planes. Incidentally, those fifteen minutes I spent flying in the grey mist of the clouds, with no idea of where I was, and almost as little of where I was going, with the

minutes of flying getting fewer as the gas became less, were a bit startling. My compass led me too far east, to where the front turned south toward Nancy. As I was flying south, I merely flew parallel to the lines for a while, until, in one of my periodical dips, I discovered the trenches, and crossed over and picked out the only available spot for a landing. This spot was I found later, on a slope of the Vosges Mountains. I crashed the machine, but not myself; and later, when our troops moved up, got confirmation on my first enemy plane. I was reported missing, too, because it wasn't till late that night that I got word to the squadron."

Lt. D'Olive, having lost the patrol as Lt. Rummell went through the clouds sighted a Boche near our lines, and opened fire on him as the Hun retreated toward Germany. D'Olive saw the enemy plane go down in a steep dive, and later received official credit for its destruction. This made our score for the first day, two enemy planes shot down, convoys and troops shot at and demoralized, with no one lost. However Rummell, as has been said, landed and crashed at a distant point. Fuller, too, broke up his plane far from the home field, while Hartman, after having turned back with jammed guns and a missing motor, was chased across the lines by three Hun planes, though he managed to land safely at Luneville.

Lt. Case made his first trip across the enemy lines on a straffing expedition, that memorable 12th of September, and gives an interesting account of what took place. Here is his story:

"My first flight over the lines was the 12th day of September. Always before this we had patrolled up and down behind the lines, not going over into the enemy's territory. The 12th of September, orders were received for all available planes to fly at low altitude and straff the following towns: Vigneulles, St. Benoit, Dampvitoux and Chambley, and roads, and all concentrations of troops we saw. Lt. Gude could not go any farther than the lines on account of motor trouble, so we three that were left went on over and completed our mission. I did not know any of the enemy territory so I flew close to Lt. Merz, who was leading. I watched him and fired on almost every target he fired on. At one time we flew over a very small town, where there were, to the best of my judgement, about 3000 troops in the streets and outside of the town, together with many motor lorries. I piqued down and fired on the troops in the street which caused utter confusion, a great many of them trying to enter one door at once. I concentrated my fire on that door, killing and wounding many of them, I am sure, for I could see them fall, being at that time less than fifty meters high. Things were getting pretty hot for us there and we moved on. I saw a company of riflemen about a half mile and a second later I thought my time had come, for I could see the smoke coming from their rifle barrels. I piqued on them, firing both guns until I was about 150 feet from them, then

had to pull up to keep from hitting the ground and crashing. At a very short distance from them I saw several motor trucks going north. I opened fire on one of them and saw the driver jump from one side and another chap from the other; the truck hit a tree and stopped. I fired on numerous other small formations of the enemy. On our way home there was a great deal of rifle and machine gun fire and archies directed at us, luckily no one in the formation being touched, but Lt. Merz had a longeron shot in two by rifle or machine gun fire. Lt. Carruthers also picked up two bullets in his machine. Neither I nor my machine were touched. Being out of ammunition we returned to the aerodrome to await further orders, which came that afternoon."

September 13th is marked with red letters in the history of our pilots. About 17 o'clock, after an observation mission some kilometers behind the lines, one of our formations became somewhat split up. Lt. D'Olive met a patrol of the 103rd Squadron, just as the latter was about to engage in combat with several enemy planes. D'Olive attacked one Fokker with Lt. Furlow of the 103rd, and last saw the blacked crossed machine vrilling at an altitude of about 100 meters. D'Olive climbed hurriedly and attacked another Fokker with Lt. Furlow, at an altitude of about 500 meters. This enemy plane was seen to crash near St. Benoit. Again D'Olive climbed up to about 500 meters, attacking a third time. He followed his adversary down till he saw him crash not far from the second plane. With three planes to his credit, D'Olive flew home, there to be congratulated by an admiring group of comrades, and, later, to be recommended for the D.S.C. Lts. Carruthers and Harding attacked a formation of three Pfalz scouts near Jonville, sending one down in flames. The other Boches evidently heeded this evidence of allied marksmanship, for they headed northeast with wide-open motors. The 13th closed with four more Huns to the credit of the 93rd, all of which, it might be well to add, were shortly afterwards confirmed or officially credited. The Squadron just missed getting credit for another Fokker, which Lt. Wright attacked in the region of Buxieres. He was, however, chased off by a reserve of five Fokkers, and forced to take refuge in a cloud.

On a straffing expedition, early in the day, Lt. Lindsley had an experience which was at once thrilling and amusing. He was flying low, at about 100 meters, in the region of Mars-la-Tour, busily engaged in shooting up troops moving back from the lines. Suddenly he saw a huge truck, and as suddenly recognized it as a beautiful target. It must have been a gasoline tank, for, after having received a few shots, it exploded with violence, damaging everything in the close vicinity. Lindsley returned unhurt. On a similar mission, Lt. Merz chased a German Officer on horse back, and gleefully watched the Boche gallop for cover. It was while engaged on this same mission that Lt. Nash was last seen, apparently all right. When he failed to return, his Squadron brothers made inquiries through the Red Cross, but for

many weeks failed in their attempt to get news of him.

On the 14th the German pilots evidently did little flying, for none of our patrols succeeded in gaining contact with the enemy, though one Boche formation was observed over Metz. Lt. Wright attacked a German sausage, but did not succeed in firing it, largely because his eleven millimeter gun jammed after a hundred rounds.

The following day, September 15th, gave us a change to add one more Hun to the list of our victories. In the late afternoon, a patrol of ten of our machines encountered about eight enemy planes. A general Melee ensued, during which one Boche went down in a vrille, and was later confirmed and credited to Lts. Wright and Lindsley. The rest of the Fokkers, who had the advantage in altitude on our planes, hurried off towards Metz when more Spads dove out of the sun towards the fight.

At about 13 o'clock on September 16th, Lts. Wright and Lindsley found a German bi-place hovering over Pont-a-Mousson at about 3000

meters. They attacked and drove the observation plane down to about 300 meters, though Lt. Wright's guns jammed continually and Lt. Lindsley had a bullet in his motor. The German plane seemed to be badly damaged, but our pilots, unable to report that it had come down behind our lines, were properly disgusted. Lindsley was forced to land not far from the fight, and Wright came home cursing the Armament officer, the Kaiser, and all his friends. Perhaps his display of righteous indignation did the trick, for several days later the report reached us that the bi-place had landed in our lines, and that both observer and pilot were taken prisoner. Confirmation and official credit soon followed, bringing our score up to eight official planes.

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20th Aero Squadron

The Squadron moved to the Aerodrome at Amanty, Meuse, to join the First Day Bombardment Group, September 7th, 1918. With the beginning of the St. Mihiel Offensive several planes were detached for special service. At this time it was believed that the squadron was to be used as a biplane pursuit organization, and no bombs were on hand for the use of it or the other Liberty squadrons on the field.

On the evening of September 13th, 1918, orders were issued for the Liberty Squadrons to bomb Conflans the following day. All that night the Squadron's trucks hauled bombs from the depot at Colombey-les-Belles. In the early hours of the morning the armorers were bombing the planes. By daylight the 20th Squadron had been transformed into a bombing squadron, and was ready to carry out orders issued to it less than 12 hours before.

That morning the squadron made its maiden raid, and since it was the first off the field, it achieved the distinction of being the First squadron of American built planes to drop bombs on the enemy.

The conditions under which the squadron began operations were far from ideal. With the exception of the Commanding Officer, none of the Pilots or Observers had ever been over the lines. Some of them had never flown in Liberty Planes, and none of them had any opportunity of learning what effect bombs had on the handling of the ships. As a result, 1st Lieut. C. G. Stephens, (Pilot) sacrificed his life in taking off on one of the first raids. As he was leaving the field on his first flight, his plane went into a stall, side-slipped and crashed. His Observer, 1st Lieut. J. J. Louis was severely injured. In spite of these adverse conditions the squadron made eight raids during the first three days of operations. Its Commanding Officer, Capt. C. G. Sellers, led seven of these eight raids in person.

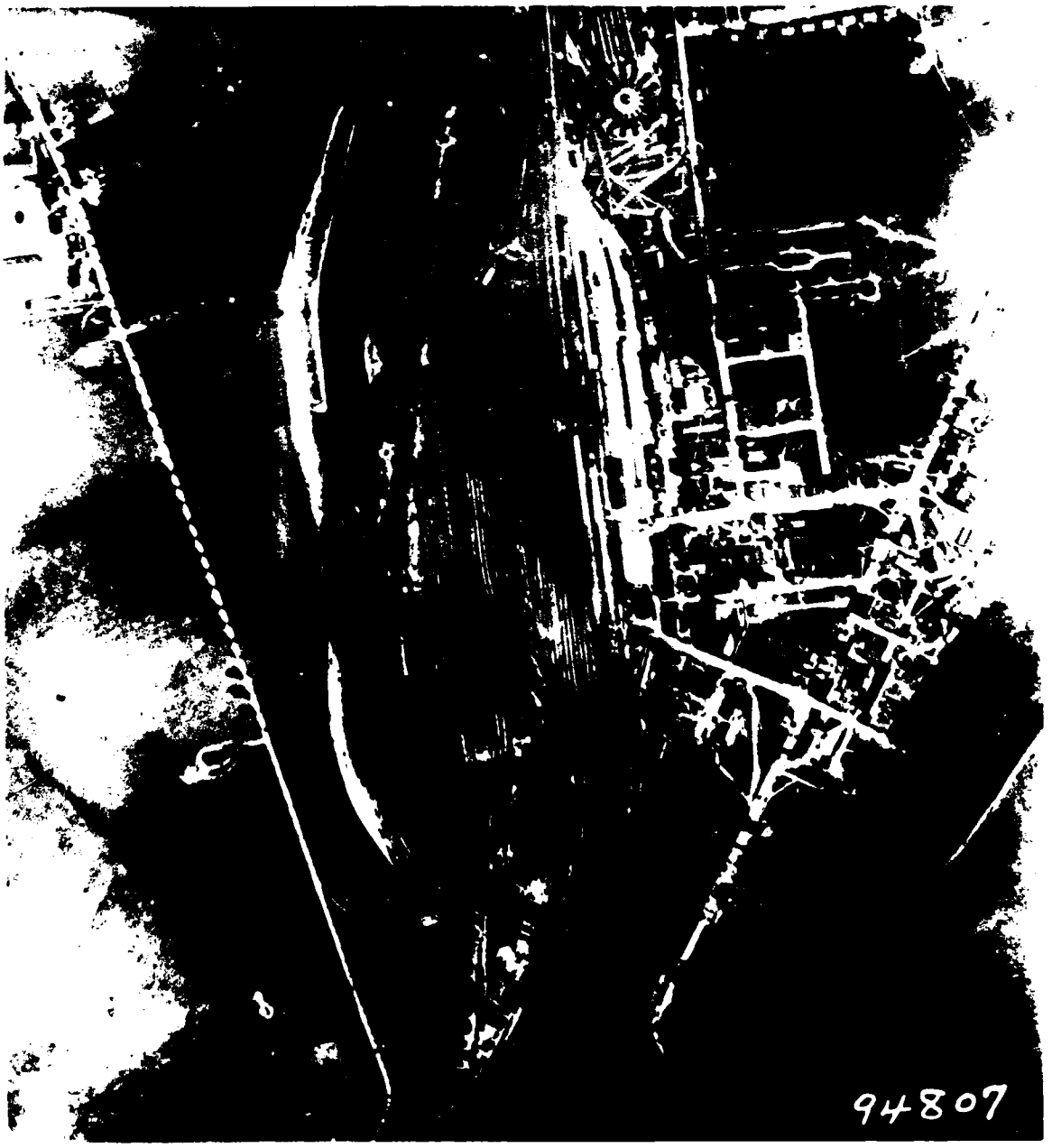
It was during this period of the Squadron's history that Capt. Sellers performed a deed of courage which confirmed the wisdom of the men who made him Commanding Officer and which served to inspire his men during later days when the squadron's mounting casualty list gave them no hope of surviving the winter.

On September 15th he left with a formation of six planes to bomb the Railroad Yards of Conflans. Motor trouble due largely to the excessive strain put upon the planes in the earlier days of the offensive caused all but Captain Sellers to drop out and turn back before the lines were reached. When he reached enemy territory he found himself alone. Although he and his observer, 1st Lieut. K. C. Payne, knew from experience that the bombing plane which crosses the lines alone faces almost insuperable odds, he elected to try for the Objective without support and his observer smiled assent. The story of this raid by a lone plane is now a tradition of which the Squadron is proud. Four Fokkers were met and driven off in the dash for the important railroad center. The bombs were dropped on the objective. Three more enemy planes were met and driven off on the return to our lines, and the lone plane, riddled with enemy shots, finally reached its field. For this exploit, Captain Sellers and Lieut. Payne were awarded the Distinguished Service Cross.

Such utter disregard for personal danger proved to be contagious. The following day Lieut. John Y. Stokes, Jr., performed a deed of such distinguished gallantry that when he was recommended for the Distinguished Service Cross, his recommendation was returned by special courier with the suggestion that his action probably qualified him for the Medal of Honor and that he should be recommended for that coveted decoration.

Lieut. Stokes was teamed as Observer with Lieut. A. F. Seaver and they flew a formation, which had Etain as its objective. As on the day before various mishaps caused all but one plane to retire before the lines were reached. This one plane was that of Lieut. Seaver and Lieut. Stokes. Instead of turning back they joined a formation of the 11th squadron and crossed into enemy territory. Before the objective was reached their plane was struck by anti-aircraft explosives, thrown out of control and into a vrille. Although out of control and with a badly missing engine which was forcing them to fall away from the protection of the squadron, they proceeded to the objective and dropped their bombs. By this time their motor had stopped entirely. They were then attacked by an enemy combat plane, but by diving with a dead propeller and with the continuous firing . . . [on] the enemy plane [Lieut. Stokes] crashed in the tree tops of a forest [within Allied lines].

Aerial view of the railroad yards at Conflans.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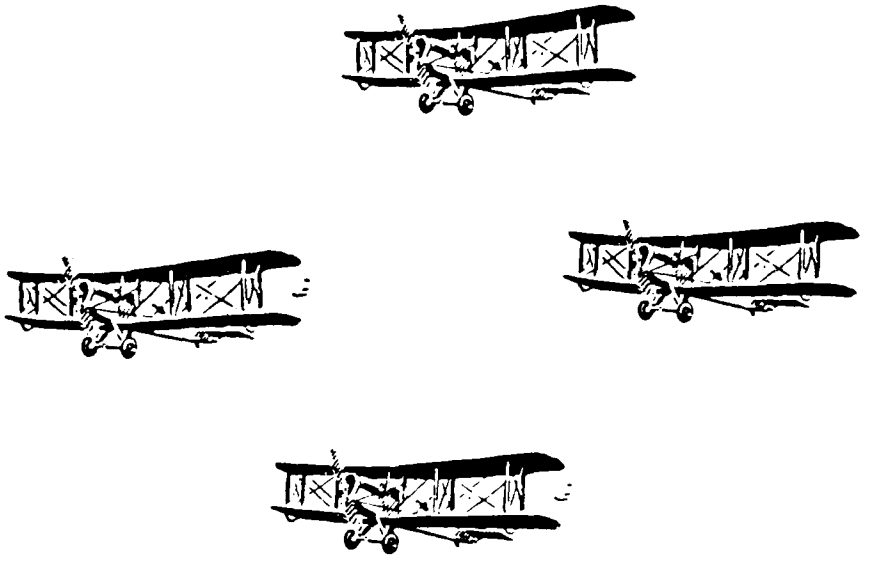

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First Day Bombardment Group

The First Day Bombardment Group, comprising four squadrons, completed its organization and began operations under its own group commander on September 12, 1918. Prior to this date the 96th Aero Squadron had been operating independently, equipped with French planes of the Breguet type. The other three squadrons, the 11th, 20th and 166th were in course of equipment with American-built planes of the DeHaviland-4 type, but only the 96th, 11th and 20th were ready for work at the opening of the St. Mihiel offensive.

The most effective work at the outset was done by the 96th by virtue of its experience, the completeness of its equipment and the comparative immunity of the Breguet plane under enemy aircraft fire, but the other squadrons also achieved a high degree of efficiency with practice and the perfection of materiel.

The operations during this offensive were conducted from the airdrome at Amanty. Flying was made difficult and the quality of the flying field was impaired by the incessant bad weather. Propellers were broken in attempting to take off, visibility was poor, high flying often impossible, and close formations difficult.

In expectation of the attack great concentrations of enemy aircraft had apparently been made in this sector. As previous experience in the sector did not warrant the expectation of such formidable resistance as was afterwards met there were great losses on our part in attempting expeditions with small formations and without protection from pursuit planes.

. . . . . .

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First Pursuit Wing.[a]

On August 26th, 1918 the elements of the First Pursuit Wing completed their organizational training and the Wing was formed comprising the Second Pursuit Group, commanded by Lieutenant Colonel Davenport Johnson, which contained the 13th, 22nd, 49th and 139th Aero Service Squadrons, the Third Pursuit Group, commanded by Lieutenant Colonel William Thaw, which contained the 28th, 93rd, 103rd, and 213th Aero Service Squadrons, and the First Day Bombardment Group which, at the time of the organization of the Wing was commanded by Major J. L. Dunsworth and comprised only the 96th Aero Squadron as a functioning organization. The 11th and 20th Aero Squadrons joined the Group on September 11th and the 166th Aero Squadron on September 23rd.

On August 26th, the First Army was still completing its move from the sector north of Chateau-Thierry to the St. Mihiel salient. The importance of the circulation on the roads in our rear areas together with the necessity of not showing strength over the lines laid upon the Wing the difficult task of attempting to prevent aerial photography by the enemy without ever crossing our lines.

The principles employed in this period were laid down in Operations Memorandum Number 3, Headquarters, First Pursuit Wing, August 29th, 1918, Paragraphs #4, 5, 6, 7, 8, 9 and 10.[b] Especial attention is invited to this Memorandum as a document giving the lessons learned by American Pursuit Aviation in the Operations in the Chateau-Thierry Area in July.

The Second Pursuit Group was stationed on the Toul Airdrome, 5 kilometers northeast of Toul on the Toul-Dieulouard road. The Third Pursuit Group was stationed on Vancouleurs Airdrome No. 1, 3 kilos N.W. of Vancouleurs on Vancouleurs-Commercy road. The First Day Bombardment Group was stationed on the Amanty airdrome on the Gondrecourt—Maxey-sur-Vaise road.

The sector assigned to the First Pursuit Wing was as given in Paragraph 1, Operations Order No. 1, Headquarters, First Pursuit Wing, August 29th 1918 and was modified from time to time as shown in Paragraph 1, of subsequent operations orders.

The methods employed to prevent enemy reconnaissance are laid down in Paragraph 2 of the various operations orders. Special attention is invited to Paragraph 2, Operations Order Number 3, Paragraph 2, Operations Order Number 5, Paragraph 2, Operations Order Number 6.[c]

On September 10th, Groupe de Combat 16, commanded by Captaine Meni of the French Army reported to the Wing Commander for duty. This placed a total of approximately 275 Pursuit Airplanes at the disposal of the Wing Commander, of which he should count upon between 160 and 170 being in commission. . . .

The atmospheric conditions of September 10th, 11th and 12th were most unfavorable for aviation. High winds, low clouds and intermittent rain prevailed at all times. On September 11th, however, despite the very unfavorable weather conditions Lieutenants Freeman, Este, Schoen, Pointer, Hambleton, flying in the downpour, made reconnaissances of the salient as deep as Vigneulles and Thiaucourt, determining upon orders of the Army the facts that the enemy was preparing to withdraw from the salient but that he had not already withdrew. These flights, made in the face of the most adverse weather conditions imaginable and at an altitude of 400 meters or less in spite of heavy anti-aircraft machine gun fire deserve special mention not only on account of the danger entailed but because of the value of the information secured.

On September 12th, 1918 at 5 h 00 the First Army commenced the wiping out of the St. Mihiel salient. Throughout the day there were high winds and rain fell intermittently. The Third Pursuit Group had just received its equipment of bombs and bomb-dropping devices. The St. Mihiel operations afforded an ideal opportunity for their employment. All the enemy's guns and wagons in the point of the salient found themselves compelled to retire over the Vigneulles—Chambley and the Vigneulles—St. Benoit roads. On these roads traffic was constantly thrown into confusion by our bombing and machine gunning attacks, and by the destruction of four motor trucks on which direct hits were observed and which then blocked this forced point of passage on line of the enemy's retreat.

Captaine Meni of G. C. 16 personally made a low visual reconnaissance in the area of Montsec and LeMont and brought back the first information of the taking of these commanding heights by American Troops.

Liberty D.H. 4 airplanes of the 11th and 20th Aero Squadrons which had arrived at the First Day Bombardment Group within twenty-four hours cooperated with the Second Pursuit Group in the protective patrols of the sector.

The 96th Aero Squadron bombed the retreating enemy troops from a low altitude and inflicted damage. 1st Lieutenant Gundelach and 2nd Lieutenant Way, the bombing team of this squadron which had led most of the squadron's raids during the months of organizational training from July to September, were killed when their plane crashed while the pilot was attempting a forced landing in the rain.

Simultaneously with our Army's attack on September 12th the enemy concentrated his Air Service in force on our front. Before September 12th enemy Pursuit patrols of more than six planes were but rarely encountered, and when encountered it was almost invariably by our Day Bombardment Airplanes, deep in the enemy lines, attacking Longuyon, Conflans, Spincourt or Dommary-Baroncourt. On the morning of September 13th two patrols of 15 Fokkers were

encountered by our pilots or those from Escadre No. 1 of the French Army.

Throughout the advance of our infantry, from hour to hour, its progress was followed through direct reports of our pilots, reports from the Corps Air Service, reports from the Corps Observation Wing, whose offices adjoined those of the First Pursuit Wing Headquarters, and reports from Escadre No. 1, of the French Army. In this connection mention is made of the work of Captain LeMaignon, tactical assistant to Commandant Menard who commanded Escadre No. 1. This Officer who had fought as a cavalryman in this sector in 1914 assisted materially in the selection of profitable bombing objectives for our pursuit planes through his knowledge of the roads and terrain in the salient.

By September 12th at shortly after midnight infantry patrols from the south and those from the east met near Vigneulles. Still the enemy was in retreat. The Chambley—Mars-la-Tour road was jammed with his reinforcements coming up and his wagons retreating. The Third Pursuit Group made five expeditions bombing and harassing with machine guns these ground elements while the Second Pursuit Group assisted by two-seated D.H. 4's from the 11th and 20th Squadrons maintained protective patrols of the sector. In the course of these patrols Lieutenant D. H. Putman, 139th Aero Squadron, Second Pursuit Group was shot through the heart and brought down near Limey in combat with 8 Fokkers. In his last fight he brought down an enemy plane before he was killed. At the time of his death Lieutenant Putman was leading American pilot in number of enemy air-craft brought down.

By September 14th the weather cleared. At once the indications that this sector would no longer be a quiet one in the air, which had appeared the day before, were confirmed. Our dispositions immediately took the form of employing shock action to meet and defeat the enemy reinforcements in the air. Patrols of a minimum strength of one squadron were employed where before we had found that patrols of a single flight would suffice to cope with the enemy's formations.

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24th Aero Squadron

. . . On August 22nd . . . the squadron moved to Gondreville, Dept. Muerthe et Moselle, becoming part of the 1st Army Observation Group, commanded by Major John N. Reynolds. At this place Salmson 2A2 airplanes and other supplies were secured necessary for field service and pilots and observers were assigned. On September 1st, 1st Lieut. Maury Hill took command of the Squadron and 12 days after-

ward on the morning of September 12th, which was incidentally the first day of the St. Mihiel drive, 1st Lieut. Maury Hill as pilot and 1st Lieut. John W. Cousins, operations Officer as observer made the first service flight over the enemy lines.

During the ten days following the first service flight, the days during which the First Army was completing the St. Mihiel operation, straightening its lines and repelling hostile counter attacks, the squadron made a total of 13 Service flights, some of them in formations of the 91st Aero Squadron, but most of them 24th formations. On September 15th, in the course of one of these flights, 2nd Lt. Roe E. Wells, pilot and 2nd Lt. Albert W. Swinebread, Observer, had the distinction of bringing down in combat the first enemy plane with which the squadron is officially credited. It was during these days, too, that the squadron experienced its first losses, 1st Lt. John J. Goodfellow, pilot, and 1st Lt. Elliot M. Durand, Jr., observer, being reported missing after combat with enemy chasse on Sept. 14th, and 1st Lt. William L. Bradfield, pilot and 1st Lt. Arthur L. Clark, observer, missed on Sept. 17th and some weeks later discovered to be prisoners in Germany. As a whole, however, this period was invaluable to the squadron, giving both pilots and observers experience in meeting actual conditions over the lines and as well laying foundations for the necessary team work between pilots and their observers and between the pilots in the various flights. It was at this time that permanent flight organizations were effected, the Squadron being divided into three flights, A, B, C, with 1st Lt. Raymond P. Dillon, 2nd Lt. Roe E. Wells, and 1st Lt. Walter J. Smith, respectively, in command as flight leaders.

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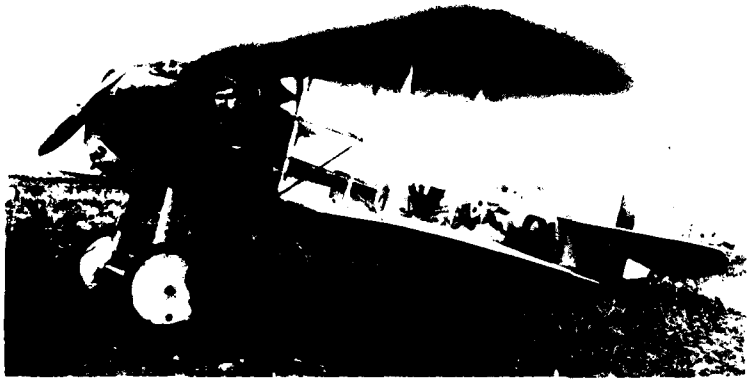
91st Aero Squadron

On the 5th [of September] Major Reynolds announced that he had been placed in command of the First Army Observation Group, of which the 91st, 24th, and 9th were to be members. . . .

The work that had been going on since our arrival at the front was not [now] about completed. Our whole sector had been photographed and rephotographed at intervals of two weeks. Dumps and strategic points, and all information of value for an attacking army, had been noted and tabulated, when on the 11th of September came the news that the Squadron had been awaiting for some time.

The Major announced to us that evening that the first all-American push was to start the next morning with a terrific artillery preparation, followed by the "doughboy's" rush over the top at daybreak in an attempt to wipe out the famous St. Mihiel salient. All night long the big



1st Lt. Everett R. Cook, Commanding Officer, 91st Aero Squadron.

guns kept up their work and the first missions over in the morning reported that the whole front from Pont-a-Mousson to St. Mihiel was on fire.

Worse flying weather can hardly be imagined than that in which we flew during the 12th, 13th and 14th, the three main days of the attack, but missions left and returned with their informations on a regular schedule interrupted only by an occasional shower of driving rain. Missions were constantly carried out from altitudes varying between fifty to one hundred meters far over the enemy lines in an endeavor to get the information asked for; and even darkness did not stop the flying, missions searching for enemy batteries, going out in the evening of the 12th and 13th, and returning by the aid of flares long after dark. On account of the low clouds it was almost impossible to keep formations together, but in every case when a ship became separated from the others, it went over the course and performed the mission, most of the time flying through the clouds, and coming back into them whenever the fire from the ground became too hot, or whenever the enemy chasse attacked them. On the 13th Lts. Diekema and Hammond flew to Mars-la-Tour, then over to Gorze and back to Chambley, at no time being over two hundred meters up. At the same time Lt. Strahm and Capt. Wallis while on a mission just south of Metz were attacked by a Fokker at about 800 meters altitude. About seventy-five rounds from Captain Wallis pair of Lewis guns, however, sufficed and the enemy machine crashed near Orly Ferme, making the second official Bosche for this team.

The operations of the 14th cost the Squadron another of its old teams. Lt. Hughey and Capt. Roper went out on a visual mission early in the morning and to this day nothing has been heard from them. The Archies gave Coles, one of the new men, a chance to distinguish

himself. One of the shell bursts tore off half of both lower wings; although the plane became almost unmanageable Lt. Coles managed to bring the plane back to the field and make a good landing. For his first trip over the lines, his coolness was remarkable; his first remark on landing being: "How long will it take to put another pair of wings on? I like to fly that boat; she handles so well." Lt. Strahm and Captain Wallis had a combat with six red-nosed Pfalz, and Captain Tabachnik had his machine guns shot out of his hands during another fight, while "Tom" Jervey and Guilbert fought off eighteen Fokkers in a running fight all the way from Conflans to St. Mihiel.

Two more official Boche were added to the Squadron list on the 15th. The first Flight started out on a photographic mission from Gorze north, but had barely started taking pictures when the formation of four was attacked by six Pfalz scouts. Two of them dove for Coles' ship which was flying as protection in the rear, and at first burst a machine gun bullet pierced his neck, forcing him to make for the line as he wanted to land the observer safely before he fainted from loss of blood. The other three jumped on Kenney's machine, but his observer, Bedham, who had just jumped up in the cock-pit from taking pictures, poured a few bursts into one of the enemy machines, sending him down in flames.

Kenney's ship, however, was badly shot up, one of the elevators being almost off, so he turned back toward the field. In spite of thus losing the rest of the flight, Lts. Diekema and Hammond climbed back to regain the altitude lost during the combat and continued on their mission, which was accomplished without further attack, although several formations of enemy planes were seen around them.

Maj. Martin F. Scanlon.

At almost the same time the second Flight encountered six more Pfalz just south of Briey, and during the combat the ship piloted by Powell with a new man in the rear seat—Schricker—brought down one of the opposing planes. That evening the doctors at the hospital where Coles had been taken gave out the welcome news that he would probably be out of the game only about six weeks.

During the afternoon a mission was called for to go on a visual reconnaissance to Diedenhofen. Major Scanlon volunteered as every other pilot was on some other mission at the time, and took along as observer Lt. Lawson, still weak from his wound but anxious to work. They penetrated the enemy territory to a distance of 75 kilometers, being constantly under "Archies" fire except when the Boche appeared. In the latter case they dove into clouds, emerging as soon as they had shaken off the pursuit. The flight was not only a spectacular one, but much valuable information was brought back.

Heavy rain put an end to our flying the next day, and in the evening we received word that the drive was off until further orders. . . .

Men of the 10th Balloon Company operate a winch to control balloon ascension.

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10th Balloon Company.[a]

One A.M. September twelfth the big St. Mihiel drive began, the American method of celebrating General Pershing's birthday.[b] A high wind was blowing and storms threatening. The artillery were calling for balloon observations. Headquarters wanted information as to enemy movements so in spite of weather the company endeavored to put up the balloon. Lieutenants Likens and Boyd started to go up. The balloon had hardly left the ground, probably had reached seventy five meters, when a strong gust of wind caught the balloon and crashed it into the ground, a beautiful nose dive right into the trees. One minute later there was nothing but torn balloon fabric draped over the trees. Lieutenant Likens managed to escape without injury, but Lieutenant Boyd was severely and permanently injured; he was sent to the hospital and later from there back to the States.

That same afternoon another balloon was inflated and ready for action. Next day the company moved forward to keep up with the army which was advancing as fast as the enemy were retreating. The night of the thirteenth the company camped in the woods at Bois de la Hazelle between Bernecourt and Flirey. Next night the company moved forward again this time to a position just north of Flirey. A beautiful moon lit up the road and the country for miles around. But traveling was slow, the road was congested for miles. Forward fifty meters, then stop. The balloon was flying at a low altitude, perfectly visible in the moon light and a wonderful target for night bombers. Several times the Boche planes came close to the roads. The balloon was hauled down and held close to the ground to prevent detection by the Boche; everyone held their breaths until the plane passed over for it did not seem possible that the pilot could miss seeing the balloon, the big white sausage sitting on the road: if it had been located it would have meant sure bombing from the planes. However, the company and the balloon reached the new camp without mishap. On the following afternoon the company again moved to position about one kilometer north of that held the day before. The new camp was in the Bois des Ramparte about two kilometers south of Essey. During the few days that the company was in position at this place they had two very successful regalages with French Artillery, one on a railroad station and the other on a cross road where traffic was assembled, besides securing much valuable information for the infantry and artillery concerning enemy movements.

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11th Balloon Company

The company first made its entry into the line on August 29th, north of Toul. The Balloon Bed and camp were located near Gezoncourt. The Balloon was assigned to the Army Artillery to observe for 1st Heavy Artillery Grouping, First Army.

This grouping commenced firing at 2 A.M. on September 12th and did not fire after 7 A.M. the same date, so that all artillery observation work was performed for Corps and Divisional Artillery. This firing was principally on villages inhabitated by the enemy and upon frequented roads. A great deal of valuable information relative to enemy activity was furnished to the General Staff.

The initial flight was made at 6:05 A.M. on September 12th at Gezoncourt. The Company moved 8 kilometers north of Mamey following the advance on September 14th. On September 15th at 12:25 P.M. the balloon was attacked by a Fokker plane, fifty six bullets entering envelope but same did not burn. . . .

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1st Balloon Company

Our next move took us to our new position on the St. Mihiel front. From August 23rd, to the 29th, the company lay on reserve in the woods, one and one half kilometers east of Tremblecourt . . . Nothing of note happened during this period with the exception that the company perfected the new formation for balloon handling.

The Sixth Balloon Company turned over their inflated balloon and camp to us on the 29th of August. A trial flight was made in the afternoon. The company also moved into barracks—our first since Baccarat. Visibility was very good the next day and the balloon was in the air the whole day. The next four days were cloudy and rainy, and the balloon did nothing more than test the visibility. . . .

The balloon ascended at 6:15 A.M. on September 3rd., with Lieut. W.S. Anderson in the basket. At 9:35 A.M. the balloon was attacked and burned, by an enemy avion. The observer jumped, and landed safely. From Sept. 4th to the 11th, there were no ascensions made, due to poor visibility; but the company was busy at our advanced bed, and on telephone lines.

On September 12th, the company was in readiness to move at 2:00 A.M., but could not do so on account of traffic and road conditions. We moved forward at 6:45 A.M., September 13th., and camped for the night at a point four kilometers east of Limey, on the Limey—Metz road. The balloon ascended at 6:55 A.M. on September 15th, with Lieut. Frank R. Barton in the basket. At 12:22 the balloon was attacked and burned by an enemy plane. The observer jumped, and landed safely. The plane was seen to land out of control inside our lines. Credit for this plane was claimed by our machine gunners. A new balloon was received in the afternoon, and was fully inflated by 9:50 P.M. The balloon was in ascension from 6:30 A.M. on Sept. 16th., to 6:27 P.M. The three following days were rainy and cloudy, and the company kept in out of the weather.

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2d Balloon Company

During the St. Mihiel drive there were no unusual occurrences except the balloon being ordered to a position three kilometers from the front so that it would be prepared to be in ascension on the morning of the attack. With adverse weather conditions and high wind the balloon was maneuvered over obstacles of all sorts and seemingly impossible

roads, it arrived at the front in good condition and was ready for duty. After this move the Signal Corps realized what it meant for a Balloon Company to maneuver its balloon over lines in a high wind, marking the eve of their crossing roads on which a balloon may be maneuvered with "let down" wires, thus avoiding any repetition of the tearing down of wires experienced on the eve of the St. Mihiel drive.

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5th Balloon Company

On September 8th, the Company was transferred to the First Army Corps, First American Army, with Lieut. McFarland commanding the Corps balloons and was ordered to the vicinity of Dieulouard, near Pont-a-Mousson, where a position was to be established but no ascensions were to be made until the day of the attack. The Company was the Corps Balloon for the First Army Corps, First Army. Before daybreak on the day of the attack, the balloon ascended and in spite of a violent storm remained in ascension for four hours, and during the afternoon another attempt was made to work but it was found to be impossible. However, during the second and third day considerable time was spent in the air and much information was obtained. On the third day of the attack, September 14th, the balloon was attacked and burned while adjusting fire at a distance of 26 kilometers on the railroad bridge directly west of Metz. 1st Lt. Maurice R. Smith and 1st Lt. Joseph M. Fox jumped and landed safely. Corporal Coakley, at great risk of injury, succeeded in saving the balloon basket. . . .

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42d Balloon Company

The 42nd Balloon Company arrived in Toul, September 2nd, reporting to Commanding Officer, Balloon Wing, First Army Corps, for duty. The company took its station for the operation at Ville-au-Val, in the sector of the 82nd Division, during the night of September 5th.

Orders prevented the balloon making ascensions until the D day, to avoid giving the enemy evidence of unusual activity. The period, Sept. 5-11, was spent in the construction of a balloon emplacement, establishment of telephone communications with the intelligence centers of the 82nd and 90th Divisions, and the First Army, Corps, and with the Artillery operating in the sector. The observers made flights with the 11th Balloon Company, to become acquainted with the terrain.

Pursuant to orders from Wing Commander, the balloon was inflated during the night of September 10th. Faulty rigging was adjusted September 11th, preparatory to commencement of operations. On the trial flight, September 12th, the balloon was damaged by a tear in the fabric of the rudder. High winds and cloudy weather prevented further ascension during the day. During the period September 13th to 20th, inclusive, the balloon was kept in the air when weather conditions permitted, the observers keeping the enemy areas under scrutiny, reporting movements, hostile batteries, conflagations, effect of shell fire, etc., to Division and Corps Intelligence centers. In accordance with specific requests, hourly, reports on observations on certain areas were rendered to the 82nd Division. An adjustment was made with the 319th Field Artillery. . . .

. . . The recent enemy positions were located at a distance of approximately five kilometers. Observations were made, up to a distance of twenty five kilometers. The Division lines not changing, no movement was made by the company during the operations.

The company suffered but one casualty, a member of the telephone detail, gassed while repairing lines. No damage was done to the Balloon by acts of the enemy.

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I Corps Balloon Wing

At the beginning of the St. Mihiel offensive, the Balloon Wing, First Army Corps was stationed at Saizerais, with the following companies in line: First, Second, Fifty and Forty-Second Balloon Companies.

The First Balloon Co., stationed at La Queue de Themard [?], was assigned to the Second and Fifth Divisions. Its mission was to make general surveillance and visual reconnaissance of the divisional areas, the spotting of enemy batteries, and the adjusting and control of the divisional artillery.

The Second Balloon Company, stationed at Bois de Remenauville, was given a special mission, as advance surveillance balloon. It was ordered to maneuver to a point within four kilometers of the line, the night before the attack. Its duties were to report directly to the First Army Corps, message center, the progress of operations on the whole Corps front. It was to spot all enemy batteries and report the activity of the enemy artillery. It was also ordered to follow closely the progress of our infantry and tanks.

The Fifth Balloon Co., stationed at Bois de Cute, was assigned to Corps Heavy Artillery for all aerostation duties connected with adjustment, control of fire, and surveillance of enemy artillery.

The Forty-Second Balloon Co., stationed at Ville-au-Val, was assigned to the Eighty-Second and Nintieth Divisions for all aerostation duties, including general surveillance of divisional areas, visual reconnaissance, spotting of enemy batteries, and adjustment and control of fire. It was also ordered to be especially watchful for all enemy troop movements by road or rail in the vicinity of Metz.

In order that an efficient liaison might be continually maintained between the balloons and the divisional artillery with which they were working, an observer was sent from each company to the divisional artillery headquarters, and kept on continuous duty there during the hours of daylight. The Balloon Wing Commander ordered the companies to ascend at dawn the morning of the attack, and to remain in the air during the hours of daylight, weather and visibility permitting. Unfortunately visibility was so poor on the morning of September 12th that observation was impossible. The same was true of the following day, although late in the afternoon of the 13th the Second Balloon Co. ascended and observed on our artillery fire.

On the morning of the 14th the Fifth Balloon Company ascended at dawn and reported on enemy artillery, enemy aeronautic activity and friendly shell fire. At 8:45 A.M. they were attacked and burned by an enemy plane. The observers, Lieut. Smith and Fox, jumped and landed safely. The Second and Forty-Second Companies were in ascension throughout the day, making excellent reports on enemy activity and shell fire, but no adjustment of artillery was possible. An allied plane, flying at a low altitude, hit the cable of the Second Balloon Co. a short distance below the warning cone, and crashed to the ground not far from the winch position, killing both pilot and observer.

On September 15th all the companies of the Wing were in ascension, giving lengthy reports on general observations, covering enemy movements, hostile and friendly fire. The Second Balloon Co. made two successful adjustments for the corps Heavy Artillery. The Fifth Balloon Company reported the burning of three enemy balloons and made two adjustments. At noon of this day the balloons of the 1st and 2nd Companies were attacked and burned by an enemy plane. The observers jumped and landed normally.

On the 16th, the Fifth Balloon Co. spotted five enemy batteries, and made two adjustments of fire. The Second Company made two adjustments, all the companies making excellent reports on general observations.

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I Corps Air Service

On 11 Sept. 1918, the 1st Army Corps of the 1st American Army held a 19 kilometer sector from Limey to Port-sur-Seille with five divisions at its disposal. The 82nd Division held the sector from Port-sur-Seille to Bois-le-Pretre, the 90th Division from the eastern edge of Bois-le-Pretre to Mamey. The front line to the Corps boundary at Limey was held by detachments of the 90th Division. The 5th and 2nd Divisions were deposited in depth behind these detachments, the 5th Division from Mamey to Remenauville, the 2nd Division from Remenauville to Limey. The 78th Division was concentrated in rear as Corps reserve.

The Air Service Units at the disposal of the 1st Army Corps were:

The Chief of Air Service and Staff at Saizerais.

1st Corps Observation Group:

Group Commander and Staff at Toul;
1st Aero Squadron at Toul;
12th Aero Squadron at Toul;
50th Aero Squadron at Bicqueley;
208th French Squadron at Bicqueley;
214th French Squadron at Bicqueley;
Flight "B" 648th Aero Supply Squadron at Toul;
1st Photo Section at Toul.

1st Corps Balloon Wing:

Balloon Wing Commander and Staff at Saizerais;
1st Balloon Co. at 369.670-224. 750;
2nd Balloon Co. at 374.870-228.650;
5th Balloon Co. at 377.800-229.450;
42nd Balloon Co. at 382.150-228.800.

Airdromes: Toul, Bicqueley, and Saizerais (advanced landing field, no hangars).

The 1st Aero Squadron was assigned to 2nd Division, the 12th Aero Squadron to the 5th Division and the 50th Aero Squadron to both the 90th and 82nd Divisions for all aviation duties, including visual reconnaissance, surveillances, infantry contact patrols, adjustment and control of fire of Division Artillery, alert planes for special missions and photographic mission required by 1st Army Corps. The 208th and 214th French Squadrons were assigned to Corps Heavy Artillery for all adjustments, counter battery work, control of fire, surveillance of enemy artillery and alert planes for Corps Artillery Commander.

The following scheme of employment of the Air Service during the contemplated offensive operations were submitted, approved, and placed in effect on D day at H hour:

Each Squadron was ordered to keep two planes constantly on the alert from the half hour before dawn throughout the hours of daylight.

Squadrons assigned to Divisions would receive orders for missions direct from the Division Commander—by telephone, radio, or special courier—or through the C.A.S. 1st A.C. Missions for the Divisional Artillery were to be ordered by the Divisional Artillery Commander direct or through the Divisional Commander, or C.A.S., 1st A.C.

Each Squadron was ordered to keep a Liaison Officer at the Headquarters of the Division to which it was assigned. This officer was responsible for seeing that the orders for missions for the Divisions were transmitted in the quickest possible way, and that the results and reports of these missions were received at Division Headquarters without delay. He was charged with keeping the C.A.S., 1st A.C. and his Squadron Commander informed as far as possible in advance of the air service requirements of the Division and the latest information on the situation in possession of Division Headquarters.

Planes returning from missions of any kind were ordered to drop messages giving full detailed reports of the results of the mission and all information obtained by them, both on their Division P.C. and on 1st Army Corps P.C.

In principle each Squadron would keep a surveillance plane constantly over its Divisional Sector of attack throughout the hours of daylight. In the case of the 50th Squadron, which was assigned to two Divisions, one plane was to combine the surveillance for both Divisions. This plane was ordered to be in continual communication by radio with Division P.C. and the Artillery Battalion assigned for fugitive targets. Contact patrol planes and planes on special missions for Division Commander were to be sent out as prearranged with the Division Commander or as ordered by him. Artillery adjustment planes were sent out as ordered by Division Artillery Commander.

The Squadrons assigned to Heavy Artillery, 1st Army Corps, would, beginning on D day, keep two planes constantly on the alert from one half hour before dawn throughout the hours of daylight. One surveillance plane was to be kept constantly over the Corps Sector of attack throughout the hours of daylight, this plane to be in continual communication by radio with the 1st Army Corps P.C. and Corps Heavy Artillery counter battery and fugitive target batteries.

Command planes and other planes on special missions were to be sent out by the 12th Aero Squadron when ordered by the Corps Commander. All planes were to drop messages on 1st Army Corps P.C. upon returning from these missions and whenever any observer had important and urgent information which should be reported in person to the Corps General Staff, he was ordered to land at the advanced field at Saizerais and proceed by motorcycle side car provided by C.A.S., 1st Army Corps, for the purpose, to so report in person at once to the Chief of Staff, or assistant Chief of Staff, G-2.

The office of the C.A.S., 1st A.C. would be maintained at Headquarters 1st A.C. An officer would be kept on duty throughout the 24 hours of the day during active operations. A liaison Officer would also be stationed at 1st A.C. message center throughout the hours of daylight.

The office of the Group Commander, 1st Observation Group, would be maintained on the Toul Airdrome. An officer was ordered to be on duty throughout the 24 hours of the day during active operations.

The 1st Balloon Co. was assigned to the 2nd Division and the 5th Division for all aerostation duties, including surveillance and visual reconnaissance of Division Sector, spotting of enemy batteries and adjustment and control of fire of Division Artillery. The 2nd Balloon Co. was assigned to Headquarters 1st A.C. as Advanced surveillance balloon. This balloon was ordered to be maneuvered very close up to the front of attack (within 4000 M.) during the night previous to the attack. It would maintain a direct line to the 1st A.C. Message Center, and would keep the General Staff continually informed as to the progress of operation. Although reporting all enemy batteries in action and where there fire was falling, and where our own fire was falling, this balloon would not attempt to adjust or control artillery fire but would concentrate on surveillance of the whole sector and follow the course of operations of our infantry and tanks. This balloon was ordered to report to Headquarters 90th Division after reporting to Corps, anything that might particularly affect the 90th Division or concern its sector of attack. The 5th Balloon Co. was assigned to Corps Heavy Artillery, 1st Army Corps, for all aerostation duties connected with adjustment, control of fire and surveillance of enemy artillery for Corps Heavy Artillery, and the 42nd Balloon Co. was assigned to both the 82nd and 90th Divisions for surveillance and visual reconnaissance of Division Sector, spotting of enemy batteries adjustment and control of fire of Division Artillery. This Company was ordered also to pay special attention to the visual reconnaissances of the enemy's back area in the direction of Metz, especially with the view of spotting any important troop movements by roads or rail in this direction.

Balloons assigned to Divisions would receive orders direct from their Division Commander by telephone, radio or special courier, or from the C.A.S., 1st A.C. or from the Balloon Wing Commander. Missions for Divisional Artillery would be ordered by Divisional Artillery Commander direct or through the Division Commander or Balloon Wing Commander. Balloons assigned to Corps Heavy Artillery would receive orders direct from the Commanding General, Corps Heavy Artillery, or through the Balloon Wing Commander.

During active operations all balloons were to ascend at dawn, weather conditions permitting, and would remain constantly in ascension whenever observation was possible. Special orders

concerning night ascensions were to be issued in the office C.A.S., 1st A.C.

During active operations, each Balloon Company assigned to a Division would keep one officer constantly at Division Headquarters or at the Division Artillery Headquarters. Balloon Companies assigned to Corps Heavy Artillery were ordered to keep an officer constantly at Headquarters Corps Heavy Artillery.

The Air Service Units of the 1st Army corps were thus assigned, duties allotted and everything in readiness for the contemplated offensive.

In accordance with Field Order No. 49, 1st Army Corps, dated 11 Sept. 1918, the 1st Army Corps attacked the enemy positions on its front from Limey to Fey-en-Haye. Artillery preparation for the attack began at 1H:00, 12 Sept. 1918. The infantry attack began at 5H:00, 12 Sept. 1918, and advanced according to schedule to the 1st Phase Line. Resistance for the most part was very weak and ineffective and at 18H:00, 12 Sept. 1918, all Divisions, 1st A.C. had reached the Army Objective.

Due to intermittent rain, low clouds and poor oblique visibility, reconnaissance by aeroplanes was extremely difficult and on the whole only partially successful during the day. However during the first day's operations a total of 13 successful reconnaissance missions was attained. Four additional missions were successful because of combats with enemy formations. Two photographic missions were successful notwithstanding the fact that they were repeatedly attacked by hostile formations, and that weather conditions made photography extremely difficult. Three successful and one unsuccessful infantry contact patrols were carried out with the 2nd Division, one successful and one unsuccessful with the 5th Division and two unsuccessful with the 90th Division. The failure in infantry contact patrols being for the most part due to the fact that the infantry failed to display their panels or as happened in one case where the infantry was advancing in a wood and panels, tho displayed, were not visible. Eight Artillery surveillance and adjustment missions were dispatched, 6 of which were successful. During the day a total of 35 sorties were made with a total service time of 46 hrs. 39 min. Eight combats were reported with four casualties, two of our planes having failed to return and two being forced to land within our lines.

Four ascensions were made by the Balloon Companies with negligible results because of the poor oblique visibility, 8 hrs. 02 min. only were spent in the air.

The second day of the operations, 13 Sept. 1918, was governed by Field Orders No. 51, 1st A.C., which provided for the organization of the positions of the 2nd and 5th Divisions. The 90th Division exploited its advance of 12 Sept. 1918, took the town of Vilcey and Bois-de-

Presle and established outposes 1½ Km. south of Norroy. Visibility continued poor throughout the day and observation remained difficult and in fact almost impossible. Four successful reconnaissances were completed, however, and three others were rendered unsuccessful, two because of rain and fog and the third because of combat. One successful infantry contact patrol was made with the 2nd Division and three unsuccessful with the 90th Division. Four Artillery surveillance missions and seven flights for protection were made, making a total of 22 sorties with a total service time of 32 hrs. 05 min. One combat was reported, in which one of our planes was forced to land within our lines. An observer of the 50th Aero Squadron while on an infantry contact patrol, was killed by machine gun fire from the ground.

Three daylight ascensions and one night ascension were made by the Corps Balloons with a total of 9 hrs. 26 min. Results were still negligible. The lines had by this time so advanced that the balloons were too far back to render much assistance if weather conditions had permitted it. Congested traffic did not permit the movement of these units to advanced positions.

Organizations of the front line of the 1st Army Corps continued on the 3rd day of the attack, 14 Sept. 1918. Further exploitation by the 90th Division advanced the line to Norroy and Villers-sous-Preny. A marked improvement in weather conditions was noticeable throughout the day. Thirteen reconnaissance missions were carried out, two infantry contact patrols for 90th Division attempted but failed because of motor trouble. Thirteen artillery surveillances were completed with good results. Three successful and two unsuccessful photographic missions were made. One hundred thirty vertical exposures were taken, practically all of which were good. Twenty five protection flights and seven ferry flights were made, making a grand total of 66 flights and 101 hrs. 25 min. service time. No combats reported. One plane of 12th Aero Squadron was lost, however, in collision with Balloon cable and Observer and Pilot were both killed.

Thirteen daylight and one night ascensions were made by the Corps Balloons with good results. The balloons were able to advance and were now able to give valuable aid to the divisions. Two adjustments were made. A total time of 37 hrs. 18 min. were spent in the air. Balloon No. 5 was burned by an enemy plane at 9H:10. Both Observers jumped and landed safely.

On the following day of the operations, 15 Sept. 1918, conditions were somewhat stabilized and sector was fairly quiet. Weather conditions continued favorable. A total of 20 reconnaissances and 11 artillery surveillance missions were completed. In as much as the lines were now practically stationary, only one infantry contact patrol was attempted which was for the 2nd Division and was only partially successful. Three photographic missions were successfully accomplished during the day, together with two artillery adjustments.

Three protection missions dispatched, making a total of 40 flights and 64 hrs. 32 min. service time. Three combats with no results were reported.

During the day 7 ascensions were made by the Corps Balloons with total time in air of 33 hrs. 54 min. Five artillery adjustments were completed. Balloons 1 and 2 were attacked by enemy planes and burned. The Observers jumped and landed safely.

The operations may now be considered as being finished. The line of the 1st Army Corps remained practically unchanged until the 1st Army Corps was relieved by the 4th Army Corps, which took place on 18 Sept. 1918. The Corps Air Service continued to function, however. On the 16 Sept. 1918, fifteen reconnaissances, and five artillery surveillance missions of the Corps Sector were carried out. No infantry contact patrols were desired by the divisions. Three successful photographic missions were accomplished as well as one successful adjustment. A total of 11 protections and testing flights were made during the day, making a total of 35 missions with 46 hrs. 50 min. service time. No combats or casualties were reported.

The Corps Balloons during the day made 11 ascensions with a total time in air of 46 hrs. 57 min. Three adjustments were successfully completed.

. . . . . .

The St. Mihiel operation was a success. The 1st Corps reached the objective assigned by the Army in much less than the scheduled time. In addition the line east of the Moselle was advanced to Norroy. Although for the most part the atmospheric conditions were unfavorable for aerial observation. The Air Service had nevertheless been able to successfully cooperate with the advancing divisions and with the Corps, keeping them constantly informed as to the position of its front elements and giving accurate information as to what opposition they would meet. At no time during the entire operation did the Air Service fail to keep the Corps sector constantly under surveillance. Roads and towns of the enemy back area were carefully watched and suspicious indications of enemy activity were immediately noted and reported. The photographs taken were invaluable to the advancing troops and to the General Staff directing the operation. In many instances our planes gave invaluable aid to the advancing infantry by straffing enemy troops on the ground, several instances occurred where our planes succeeded in forcing entire battery personnel to abandon their posts and flee. Taken as a whole the operation was a success for the Air Service. It stimulated the confidence of the troops in the line toward the Air Service and convinced the other branches of the Army, including the General Staff, that the Air Service is an indispensable and much needed branch of the

Service if properly conducted and used. The St. Mihiel operation has been invaluable in instructing the various branches of the Army in the proper utilization, possibilities and limitations of the Aerial Arm.

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8th Aero Squadron

In conformity with Memorandum G-3, 173, Headquarters 1st Division, the following report of operations against the St. Mihiel Salient covering the period September 11th to September 14th inclusive is submitted:

Prior to the attack liaison was established between the Division Headquarters and this Squadron. A Squadron Officer was assigned to the Division for this purpose.

The work undertaken on the 11th was confined to Reconnaissance missions, trips being made at dawn and toward evening. This information was reported to the Intelligence Officer at Observation Group Headquarters, 4th Army Corps and transmitted by telephone to G-2, Headquarters 4th Army Corps. It should have reached the Division from that center.

As the Period of Preparation just prior to the attack took place during the hours of darkness no aeroplanes were used.

The plan of employment of the Air Service . . . was carried thru complete from H hour until darkness on September 13th. Additional planes, however, were added to this schedule. It was necessary to substitute for one of the Infantry Contact Planes, temporarily reported missing, to replace one of the Artillery Counter Attack Planes which crashed and to furnish an extra Infantry Contact Plane (this plane was sent out about 2:30 and never returned). In addition an Alert plane was called upon to locate our front line about five o'clock and a late evening reconnaissance was made as far back as Metz. In all, our planes were in the air for thirty-six hours and thirty minutes on this day and twenty-four separate missions were accomplished.

On September 14th the schedule of the previous day was repeated up to noon hour, from then on one Counter Attack Plane was kept constantly in the air and toward dusk a strong Reconnaissance Patrol was sent out. The first Infantry Contact Plane to leave the field never returned.

Over these two days our Infantry Contact Plane met with some success; but no work was accomplished with the artillery by the Artillery Counter Attack Planes altho valuable information was at times obtained and messages dropped on PC's of Corps, Division and

Brigades. Wireless messages were also sent and the advancement of the tanks carefully observed. The failure of the Artillery Counter Attack Plane to succeed in its work with the artillery was due to the very rapid advance of our own troops and the constant change of battery positions. It was impossible to reach the batteries by wireless. Some of the Observers attempted to get control of artillery fire by dropping written messages on batteries giving wave length, corps letter to be used, etc. This also failed.

Two planes were scheduled to regulate heavy artillery guns attached to the Division on set targets. Neither were successful. The target of one on Mount Sec was shut in by clouds and enveloped in a smoke screen. Observation was impossible. The other plane failed to get any show of panels in answer to its wireless. The wireless on this machine was tested before leaving the field and again on returning. Both times it functioned properly.

Thruout the attack three of our planes were at the disposal of the Corps Artillery.

. . . . . .

The plan adopted by the Division for employment of the Air Service could not have been improved upon.

The liaison between Divisional Headquarters and the 8th Aero Squadron both prior to and during the attack was unsatisfactory. This was in no way due to unwillingness on the part of individuals responsible to cooperate, for the most generous support was given at Divisional Headquarters to the Officers of this organization, and yet it is a fact, that imperfect liaison prevented the Division from receiving the full benefit of information gathered by the Observers and Pilots of this Squadron.

In the first place the Divisional Field Order sent thru the 4th Corps was not received until the evening of September 14th or 62 hours after H hour. In the future such data should be sent direct to the Squadron thru the Squadron Liaison Officer attached to Divisional Headquarters. This Officer had a motorcycle at his disposal for the transmission of all such information.

Altho the front line was successfully reported twice during the first day of the attack at no time were infantry panels seen by our Observers.

All messages sent by Observers were not received at the Divisional Receiving Station. This was no doubt due to inexperience on the part of the Observers, interference caused by enemy wireless, poor weather conditions, etc. It is true, however, that as important a message as "rolling barrage falling on our own troops" failed to get thru altho picked up elsewhere. It is absolutely essential that at least one radio receiving set at Divisional PC should listen in without break to the Infantry Contact Plane.

Prior to the attack I found that there were no radio receiving sets at either of the Infantry Brigade PC's. As I was told the communication between Divisional and Brigade PC's is seldom maintained during an attack and as I understand that information gathered by the Infantry Contact Plane is often of more immediate interest to the Brigade than to the Division, I set up two of the Squadron radio receiving sets together with four Operators in order that the Brigade Headquarters might get all information wirelessed by the Infantry Contact Plane direct. These instruments never reached Brigade Headquarters. The Operators volunteered to string telephone wire. All four were grateful to be of some use. It is my understanding that each Brigade PC is entitled to a radio receiving set under the present table of organization. Certainly these instruments could be used to advantage.

On returning to the Aerodrome all Observers made detailed written reports which were given to the Group Intelligence Officer and telephoned by him to G-2, 4th Corps Headquarters. These Major Truesdale, C.S.O., 1st Division, told me were not forwarded to the Division. They contain the most complete and valuable information gathered by the Squadron.

Thruout the attack there were no means of communication between Divisional Headquarters and the Divisional Squadron, except courier which was of no practical value because of distance and road congestion. The most important single item necessary to bring about complete liaison between Divisional Headquarters and the Divisional Squadron and to make possible the maximum use by the Division of all information gathered by Observers and Pilots of the Squadron is a direct telephone line between the two Headquarters. This might be accomplished thru the Balloon central.

John Gilbert Winant
1st Lieut., A.S., U.S.A.

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90th Aero Squadron

Beginning with August 10th, 1918, the Ninetieth Squadron started to prepare itself for the part it was to play in the coming operations of the First American Army. During the period intervening between August 10th and the St. Mihiel Drive the work of the squadron consisted of daily reconnaissances and the taking of photographs over the hostile lines. The observers were also given some opportunity for actual reglage on enemy positions. For the [42nd Division?] many infantry liaisons were carried out during the divisional maneuvers.

During this preparatory period the squadron kept in close touch with the divisions with which it worked by detailing an observer each week

as liaison officer to these divisions. This plan was entirely successful. It assured the squadron at all times of the closest liaison with the division in every way. And on the other hand it gave the division an aerial advisor who would suggest the best means of aerial cooperation for securing any desired results. In this manner both the division and the squadron came to know and appreciate accurately the other's work and the possibilities of their respective branch of the army.

From August 10th to September 11th inclusive, the Ninetieth squadron made 234 sorties as follows:

38 Reconnaissances,
37 Photographic missions
22 Infantry Liaison exercises,
10 Artillery Reglages (Exercises)
61 Protection
68 Test Flights.

On September 12th, 1918, the Ninetieth had 18 pilots, 13 observers and 3 machine gunners available for duty. The squadron had 25 machines on hand all of which were available for duty. Twenty four of these planes were Salmsons and one bi-place Spad. The planes were all armed with Vickers guns firing through the propeller for the pilot and two Lewis guns mounted on the tourelle for the observer.

The day of the attack September 12th, 1918, the Ninetieth Squadron, acting under orders from Headquarters 4th Observation Group . . . made and carried out three schedules for the day. . . . There were 24 sorties for the day, of which 7 were infantry; 7 counter attack; 1 command plane which reported to Menil-la-Tour, the 4th Corps Headquarters; 1 protection plane; 8 attempted missions.

In spite of the extremely unfavorable weather with its low hanging clouds and frequent showers which made it impossible ever to fly at an altitude above 200 meters, the squadron satisfactorily accomplished the demands made upon it and made 24 sorties in the course of the day.

September 13th, the second day of the attack was a repetition of the first. The infantry continued to advance and the squadron planes to report its progress.

Between September 14th and 16th inclusive the infantry consolidated its line and dug in. During this period the Ninetieth Squadron assisted by frequent reconnaissances of hostile territory and the taking of photographs within the German lines. . . .

During this attack the Ninetieth Squadron was assigned to the 42nd Division. Throughout the attack the squadron continually kept an observer as liaison officer at the Headquarters of the Division.

In the attack the chief work of the observer consisted of finding and reporting to the rear the position of our front line troops, the location of hostile batteries, surveillance for counter-attack, the photographing of hostile strong-points and the harassing of the retreating enemy by machine gun fire.

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135th Aero Squadron

. . . the opening of the St. Mihiel attack on the morning of September 12th, 1918. Our squadron was still working with the 89th Division and in addition was working for the Fourth Army Corps Artillery.

This memorable morning opened up with bad weather. Rain was falling and the clouds were unusually low. The first mission of the morning fell to the lot of 2nd Lt. J. E. Bowyer, pilot, and 1st Lt. A. T. Johnson, observer. It was raining when they took off and the Officer in charge of flying asked Lt. Bowyer if he did not think it was raining too hard. Lt. Bowyer replied by saying "What is a little bit of rain when there is duty to be performed?" They went up, on their mission and were flying low, thru our artillery barrage, when they were struck by a shell, instantly demolishing the machine and killing both occupants. Both of these Officers have been recommended for the Distinguished Service Medal.

1st Lt. W. C. Suiter, pilot, and 2nd Lt. G. E. Morse, Observer, were sent out on a long reconnaissance behind the "Hindenburg Line". They executed their perilous mission with great bravery and returned with valuable information which was dropped by them at the dropping ground. Having completed this they started out on counter-battery work when they were attacked by a number of enemy planes and brought down in flames. Both of these officers were killed. The Distinguished Service Cross was posthumously conferred upon both of these officers.

1st Lt. G. M. Chritzman, pilot, and 1st Lt. M. J. Reed, observer, had a very desperate battle with seven enemy planes. During the course of the conflict their machine was riddled by thirty-two bullets, the altimeter in the observer's cock-pit was shot away, the radio key was shot away and the control wires on one elevator were shot away while the other one was hanging on by one strand of wire. By brilliant work they were able to elude the enemy and return safely to the air-drome but the machine was a wreck and had to be salvaged.

1st Lt. G. D. Ream, pilot, had joined the Squadron six days prior to the St. Mihiel attack. The machine that was assigned to him was not working smoothly and for that reason he had not had an opportunity to go up in it and get acquainted with the sector. On the morning of the 12th the machine was taken up for a test flight and pronounced as fit, so later in the morning Lt. Ream with 2nd Lt. P. G. Hart, as observer, went up on a mission. He was attacked by a number of enemy planes and in the fight that ensued he received twenty-nine bullet holes in his machine. Despite the fact that he did not know the sector and it was his first experience, he showed wonderful skill in handling his machine and extreme coolness under fire and returned safely from his mission,

accomplishing excellent results. Not satisfied with this he went out again in the afternoon with 1st Lt. J. H. Nathan, as observer, and was again attacked by the enemy. In this fight however they shot down an enemy plane, for which they received official credit.

1st Lt. T. J. D. Fuller, Jr., pilot, and 1st Lt. V. Brookhart, observer, went up the same morning. It was Lt. Fuller's first trip over the lines and there was a strong wind blowing into Germany and the clouds were very low. They became lost and landed in Switzerland, thinking they were in France. Some peasants shouted to them that they were on Swiss soil and they took off again, but Swiss Guards, who were armed with machine guns, shot into their engine and compelled them to land. They were interned in Switzerland for the duration of the war.

Lt. W. A. Coleman, pilot, and 2nd Lt. W. E. Belzer, observer, were awarded the Distinguished Service Cross for bravery in this attack. Lt. Coleman was also officially credited with the destruction of one enemy plane on the 12th of September.

2nd Lt. O. E. Bennell, observer, had his hand caught in the propeller of the radio generator when he attempted to remove some string from it that was clogging up the propeller. Two of the fingers on his right hand were almost cut off, causing him great pain and suffering. Despite the fact that this occurred during the first ten minutes of his flight he carried on with his work without calling his pilot's attention to it and remained in the air for one hour and forty minutes and returned with valuable information. Refusing medical aid he wrote his observer's report and handed it in before he would consent to have his wounds dressed.

Too much praise cannot be given the enlisted men of the Squadron for their admirable conduct during this drive. For three days they worked practically day and night, keeping the machines in commission and it was due to their great work that every mission got away on schedule time.

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3d Balloon Company

The St. Mihiel offensive was preceded by many days of inclement weather. This resulted in concealing our movements, inasmuch as enemy observation was impossible. The bad weather continued during the first two days of the operation rendering balloon work very difficult and at times impossible. The Third Company entered the attack as the balloon of the 42nd Division. All artillery missions assigned to the company were successfully carried out for the artillery brigade of the division. Work was also done for the Corps and Army Artillery located near to our balloon. Chronologically stated the Third Balloon Com-

pany entered the St. Mihiel sector on Sept. 5, 1918, making camp in the wood south of Mandres. On Sept. 12, 1918, the company moved to Seicheprey and on Sept. 14th, 1918 to Saizerais. The work of the company during the first few days following the initial two day attack proved invaluable to the division because through lack of organization ground observation posts were not established and the balloons performed their duties satisfactorily. During two days when many enemy batteries were in action their location was observed by the balloon, and reported by no other sources. A photograph of one of the balloon adjustments revealed an enemy battery destroyed. This information and photograph was given out by G-2 of the Division. . . .

A burning balloon falls to the earth.

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9th Balloon Company

(a) The 9th Balloon Company arrived at Raulecourt (Meurthe et Moselle) August 14, 1918 with one hundred and sixty-eight (168) men and six (6) officers, of whom 1st Lieut. C. M. Flett, A.S. was Company Commander, 1st Lieut. Roland T. Ingels, A.S. Maneuvering officer, 1st Lieut. Sheldon V. Clark and 2nd Lieut. Samuel E. White, A.S. observers and 1st Lieut. Rea Murphy, A.S. and 2nd Lieut. John S. Holloran, Jr., A.S. student observers.

(b) Ascensions were made every day when weather permitted, from August 16th until September 11, 1918, in order that the observers could familiarize themselves with the sector and the company to familiarize with the balloon on the front. During this time on August 28, 1918, the balloon was attacked and burned by a German Airman; 1st Lieut. Sheldon V. Clark, A.S. and Corporal 1185209[?] Lionel S. Bailey jumped from burning balloon in parachutes and landed safely.

(c) On the morning of September 12, 1918, the beginning of the St. Mihiel offensive, the balloon ascended at 4:50 AM in a high wind, registering 45 miles per hour, with Lieut. S.V. Clark and 2nd Lieut. Samuel E. White, A.S. as observers. The telephone connections were broken by high wind and balloon forced to descend at 5:40 A.M. Balloon ascended at 7:00 A.M., 400 meters, with 1st Lieut. C.M. Flett and 2nd Lieut. S.E. White, A.S. as observers. Several reports were phoned from balloon as to movement of enemy troops, enemy artillery, etc. Balloon was attacked at 7:45 by enemy plane but our machine gun fire kept him from burning balloon. Regulated our artillery fire on Mount Sec until 8:50 A.M. when balloon descended on account of low clouds and poor visibility. Left Raulecourt (Meurthe et Moselle) the 14th hour on Sept. 12, 1918, with Company enroute to Xivray (Marvoisin) arriving at 20 o'clock with balloon. Co-ordinates of point of ascension were 356.070-232.250. No ascension was made in A.M. on account of wind, rain and low clouds. Telephone connections were made to Artillery Central at Richecourt, giving 1st Division advance P. C. G-2 and G-3. Left Xivray (Marvoisin) September 13th at 15th hour enroute to St. Benoit (Meurthe et Moselle) and owing to strong wind, anchors were torn from the ground, allowing balloon to rise and was badly torn and damaged. Arrived at St. Benoit (Meurthe et Moselle) September 14th and 15th hour. Obtained billets, secured hydrogen from Raulecourt and made forward balloon bed at 356.600-245.750 also making balloon bed at 356.400-243.500. Inflated balloon at 18th hour. Just as balloon was inflated an enemy plane flew over, at high altitude, getting the location of our position. That night our balloon was badly damaged by enemy fire.

(d) September 16th left St. Benoit (Meurthe et Moselle) at 12:30

enroute for Lamarche (Meurthe et Moselle). Inflated balloon on arrival and prepared balloon bed. Ascensional point from Lamarche was along road to coordinates 357.800-240.900. At the 20th hour balloon ascended to 100 meters, 1st Lieut. S. V. Clark, A.S. as observer. Visibility was poor and at 20:15 balloon descended to ground. . . .

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69th Balloon Company

After a brief training period of three weeks, the Company was ordered to the Front.

The Company arrived at Toul August 17th, 1918, and was transported to its position near Griscourt that night.

We began operations in conjunction with the 7th Balloon Company the following day.

Soon the preparations for the St. Mihiel Drive commenced and the Company was shifted by steps to its battle position near Neuf Etang. Our own balloon, #250, was inflated the night previous to the attack and we were all in readiness for H hour of D day.

At 5:00 A.M., September 12th, 1918, our balloon was in ascension and was not deflated during the move forward with the Corps artillery. There was a strong gusty wind which made it almost impossible to fly the balloon. This Company has the distinction of being the only one to regulate the fire of artillery on the morning of the attack.

The artillery moved forward the following night and we followed with our balloon in ascension. Due to congested traffic on the roads it took us until 9:00 the next day to get to a resting place South of the Bois de Jury. Here we were just a few meters within our old front lines.

We were very lucky as telephonic communications were immediately established through an old telephone exchange. We were honored that day by a visit by our Commander of Army Balloons, Major Paegelow.

The next day we moved forward again, crossing old No Man's land and entering Boche territory of a few days previous. We took a position near Maizerais.

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88th Aero Squadron

The Squadron had two days before the opening of the St. Mihiel operation, changed station from Goussancourt to Ferme-de-Greves,

twelve kilometers Southeast of Chateau-Thierry. It was then serving with the 3rd American Army under the VI French Army. It received orders, verbally at Headquarters Air Service, First Army, on noon 11th September to move with all possible speed and to report at Souilly for such duty as called for by the 5th Observation Group. The Squadron Commander reached Ferme-de-Greves, late on the night of 11th September with the orders for change of station. The squadron flew its planes to Souilly the following morning and made two reconnaissances that afternoon. That evening the flying personnel of the Squadron stood sixteen pilots and eleven observers, all available for duty. Fourteen airplanes were available. One hundred and fifty kilometers had been covered in its change of station, on a forenoon blustery with rain and wind.

The Souilly field had adequate hanger and barracks space for only two American Squadrons. The 99th and 104th American Squadrons and a French Escadrille were under orders for the Souilly field and arrived between the 11th and 17th. On the 14th the Squadron changed station to the Pretz-en-Argonne Airdrome, fifteen kilometers Southwest of Souilly.

The Squadron throughout its part in the St. Mihiel attack served under the 5th Observation Group, commanded by Lt. Colonel A. R. Christie. The work was principally with the 26th Division, at the Northern end of the battle line, with Headquarters at Dieue-sur-Meuse. The enemy line was . . . the same as it had been for many months: one section was that on which two observers of the Squadron had worked on in the previous April. The Division advanced its line some seven kilometers on the first day, reaching and holding the Army Objective. Because of this favorable progress the Air Service work became Divisional Reconnaissance with special attention to signs of enemy retreat or counter-attack. The following reconnaissances were made:

12	September	2
13	do	6
14	do	6
15	do	3, including one unsuccessful.
17	do	1

The Squadron experienced but one combat, on 14th September, the Squadron Commander, Capt. K. P. Littauer, pilot, and Lieut. Theodore E. Boyd, observer, were shot down while accompanying as protection, a photographic mission from the 99th Aero Squadron. The formation had not been carefully maintained and enemy pursuit planes were able to cut Capt. Littauer out of the formation and attack him alone. The plane was practically riddled and the puncturing of the radiator forced the pilot to seek a landing. Lieut. Boyd had been several times wounded in the leg and arm but was able to assist the pilot orient his course.

On September 17th the Squadron was relieved from the 5th Corps

and re-assigned to the 3rd Corps, per orders Hdqrs. Air Service, 1st Army.

What is particularly worth while during our participation in this first "All-American" battle is that the Squadron coming two days before from the most strenuous and intensive service along the Vesle was able to move on a night's notice and to report the following noon with a full personnel and equipment prepared to operate.

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6th Balloon Company

On the evening of August 29th the Sixth Balloon Company was relieved by the Second Company. It proceeded by its own transportation to Toul, where all the balloon companies of the 5th Army Corps, First Army, were assembled.

On Sept. 2nd the company started by its own transportation to Villers-sur-Meuse. Preparations were begun for an anticipated offensive. The sector was studied from maps, charts and aerial photos. Special maps and charts were prepared. Transportation was overhauled and put in first-class condition. Balloon positions were selected both in the front and rear. The roads over which the balloon was to travel were placarded with such signs as "Balloon road, No overhanging wires" and "Reserved for balloon".

On the night of Sept. 11th, in the midst of a driving rain, the balloon was inflated and made ready for ascension on the following morning.

. . . . . .

The allied artillery barrage began at 1 A.M. on the morning of Sept. 12th and the infantry advanced at 8 A.M. The balloon ascended, with Lieut. Nixon in the basket, but due to poor visibility and a strong wind it was compelled to descend at once. During the day, the artillery roared and the infantry advanced rapidly against the retreating enemy and by evening it was found necessary to move the balloon forward. At 9 o'clock that evening the truck train was assembled with the supplies and equipment and started forward. The roads were extremely muddy, narrow, slippery, rough and congested, making travel very slow and difficult. Many times during the night the trucks, buried axle deep in the mud, were pulled out by the human strength of the company. It was necessary to fell trees and cut branches from them, in order that the balloon might pass without breaking the cable. About 2 A.M. the train was halted in a small valley just outside of Mouilly, the balloon was

bedded and the men of the company, extremely fatigued, spread out their blankets in the midst of the mud, rain and roaring artillery to sleep. The following morning was cloudy. A heavy mist hung in the valleys. The balloon did not ascend. Before noon, information was received that the infantry was pushing forward rapidly against the retreating Huns that it would be necessary to advance the balloon. Immediately after noon the heavily loaded truck train proceeded over "No Mans land" into the region evacuated by the enemy.

Many obstacles were encountered during this advance. The shell-pitted roads had not yet been put in condition by the engineers. The Grande Tranchee de Colonne, over which the train traveled, was congested with artillery, ammunition, supply, ration and ambulance trains and troops. The roads were totally overhung with camouflage on wires, extending boughs of trees and telephone and high tension wires, all of which had to be cut down and cleared away in order that the balloon might pass.

But overcoming these obstacles, the balloon pushed forward a distance of twenty-three kilometers, arriving at a stone quarry just outside of Hattonchatel, where less than 24 hours previously an enemy balloon had been operating.

The third morning of the offensive furnished the Sixth Balloon Company its first opportunity to operate effectively. Shortly after daybreak the balloon ascended with Lieut. Taylor in the basket. Visibility was good. A great deal of information was to be obtained. The infantry had been advancing so rapidly for two days and nights that the exact location of the lines was not known. Some enemy snipers were thought to be within our lines. The observer succeeded in furnishing some very valuable information. About 9 o'clock in the morning three series of explosions occurred in rapid succession, seemingly, a very short distance from the balloon. The observer located the places of the explosions, less than three kilometers from the winch. Two of these series were aerial bombs, dropped on neighboring villages. The third was a hand grenade combat. The incidents were reported to proper authorities, who contended that grenade fighting could not be at the place reported as the infantry had passed that point several hours previously. A few hours later, however, the observation was confirmed and several hundreds of enemy troops were captured at this location and taken prisoners.

Late in the evening it was learned that the Sixth Balloon Company had moved out of its sector, going too far to the right and beyond the artillery. That night it returned part way over the Grande Tranchee and took up its position in a valley between St. Remy and Dommartin in time to ascend on the following morning. At this position the balloon operated for several days, adjusting for various batteries of artillery in that vicinity and gathering information. Very close liaison was carried on with the artillery while at this position. Several artillery

officers made flights in the balloon for liaison purposes.

During the St. Mihiel offensive the Sixth Balloon Company was attached to and worked with the 26th Division.

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7th Balloon Company

The night of Aug. 28th we proceeded to Toul where we were encamped outside the city limits for two days. The morning of Sept 1st we left Toul under our own transportation and late that night arrived in a position making camp in the Bois de Loupe, near Rattentout. The balloon bed was constructed in a ravine working entirely at night, and the following week was devoted to preparing our maps, preparing our telephone lines and in liaison with the artillery of the 5th Army Corps which we were designated to work with.

Sept. 9th in order to improve our tactical disposition we exchanged positions with the 12th Company which moved from a position one half a kilometer west of Sommedieue. This necessitated the reconstruction of telephone lines and the preparation of new maps, but on the morning of Sept. 12th when the offensive opened the balloon was in the air.

The first two days of the offensive the visibility and a high wind made it impossible to accomplish much work of value. It was advisable after the second day to advance our point of ascension, altho by being on the extreme left flank of the salient our position was not so much affected as were the other balloons. The original point of ascension was about a kilometer north of camp and maneuvering thru Sommedieue which was a maze of telephone wires, camouflage and wireless antennae, we constructed a new balloon bed and selected a new ascensional point about two and one half kilometers from our original camp. The chart-room and telephone system remained intact, however.

The third day we accomplished some work, altho the balloon was shelled by the enemy with 240 mm calibre with time fuse. Altho uncomfortably close no damage was done. Favored by fine visibility the following day we accomplished a splendid day's work. Spotting a supply train and securing two direct out of ten salvos fire, we also spotted and destroyed an enemy anti-aircraft battery, and directed artillery fire against three other enemy batteries, putting them effectively out of action. This was in addition to making many observations of moment and it should have been possible to have regulated four times as much artillery fire had not the offensive been successfully terminated, and the artillery been under orders to restrict its fire. On Sept. 16th our artillery moved out and it was impossible to perform more work with them. The company received its baptism of fire the

same day when the enemy dropped fifteen shells of 240 mm calibre in the proximity of the camp. Fragments were blown into the officers' quarters, one truck was struck twice and several men were knocked down by concussion. The kitchen and non-commissioned officers quarters were also damaged. The company found refuge in a dugout and fortunately no one was injured. The same morning Lieuts. Riggs and Burt were again forced to jump when an enemy avion dove at the balloon. The attack failed to develop however.

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8th Balloon Company

The company was awakened early on the morning of September 1st, and after a hasty breakfast, the truck train left Toul at 5:00 A.M. and started on the journey to a new position about six kilometers north of Rattentout. The company lived in pup-tents which were pitched in a thick woods, which provided both good shelter from the elements and from the watchful eyes of enemy observation planes. The balloon was never inflated at this point although telephone lines were installed and an outpost maintained.

On September 10th the company moved to a position about two kilometers north-east of Rattentout which had been selected by Lieut. Jennings immediately upon receipt of orders to move. The inflation of the balloon was completed about midnight in a pouring rain and the next morning telephone lines had been completed and everything was ready for ascension.

At 4:00 A.M. on September 11th [12th] the artillery preparation for the St. Mihiel drive started, and soon the order to fly the balloon was received. As the weather conditions were very unsuitable for balloon work, this order was later rescinded, and the balloon was deflated the next day and placed on the winch-tender. The truck train that conveyed the company to a new position at Amblonville Farm, and inflation of the balloon was at once begun, and by midnight inflation was completed. The following morning the balloon ascended at 5:50 A.M., with Lieuts. Ross and Temple in the basket, and much aerial activity was displayed. About noon an American Salmson plane was forced to land near the balloon position, the motor being out of commission and the observer having been badly wounded.

September 15th, after operating the balloon until 16:00 o'clock, the company moved to a more advanced position in the village of les Eparges. The old French lines run through the town and the surrounding country, including the roads, had been badly torn up by shell fire. Rainy weather for most of the time at this place made it impossible to do much observing. . . .

Partially inflated balloon.

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12th Balloon Company

On the morning of September 1st, 1918 left Toul on Company's transportation, arriving at Sommedieue in the evening. We stayed at this place until the evening of September 11th when we moved to Rattentout and inflated our balloon to take part in the St. Mihiel offensive, which was to start the following day.

On the morning of September 12th after a short trial flight the balloon left the ground with George W. Hinman, 1st Lieut. A.S. and Roland S. Tait, 1st Lieut. A.S. as observers. On account of poor visi-

bility and high wind the balloon was hauled down. The point of ascension was in a valley and as the balloon neared the ground a sudden gust of wind caused it to nose-dive, which snapped the cable and fouled both parachutes. The balloon thus freed rose rapidly and with the wind behind it was last seen entering the clouds and heading directly for the enemy lines.

Since the armistice we have had the pleasure of seeing Lieutenants George W. Hinman and Roland S. Tait and hearing the story of their trip, landing and treatment in German Prison Camps. After attaining an altitude of approximately 4000 metres they started valving and in about 40 minutes after the accident had managed to make a safe landing in the vicinity of Conflans.

The accident of September 12th left us without observers, Harold C. Fischer 2nd Lieut. A.S., who was assigned to us as an observer, acting as Maneuvering Officer at the time. Permission was received from Major John H. Jouett, A.S. to allow M. E. Mayer L. Cohn and Private Robert F. Scott to fly. On the evening of September 12th we obtained and inflated a new balloon and on the following day maneuvered it by hand to a new position near Rupt-en-Woevre, where four ascensions were made, but nothing of importance noted.

We were forced to move again on September 14th by the rapid advance of our troops, this time to position near Mouilly. We made five ascensions at this point but on account of low visibility we were unable to work to any advantage. We were attached to a 400 m.m. Railway Battery at this time and their objective was Conflans and Mars-la-Tour, so our work was confined to general observation work of the front.

On September 16th we changed our position two kilometres east. On the first flight we were attacked by an enemy plane and the observers, M.E. Mayer L. Cohn and Private Robert F. Scott were forced to jump, both landing safely. The balloon was not burned so another flight was made by Ashley C. McKinley, 1st Lieut. A.S. and M. E. Mayer L. Cohn, which was uneventful.

During the St. Mihiel Operations thirty three (33) enemy planes and thirty two (32) enemy balloons were sighted. The shell fire was light and ineffective, but the night bombers were very active bombing and machine gunning camps and roads.

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First Army Balloons

I. Organization

(A) Assignment and Distribution. Twenty-one allied balloons took part in the offensive in the Saint Mihiel sector, from September 12th to September 16th, 1918. Fifteen of these balloons were American; six were French.

. . . . . .

(C) Preliminary Reconnaissance. The positions of advance and retreat were thoroughly reconnoitered before the attack began, in so far as proximity to the front permitted. Thirty-five positions—alternative, advance and retreat—were actually inspected on the ground. The territory beyond the front line was carefully studied by means of maps and photographs. Definite itineraries of advance were planned and the positions beyond the lines so determined that each balloon maintained, approximately, its place in the axis of its sector.

(D) Supply. Hydrogen was distributed to the companies from the gas depots at Chaudeney and Rattentout. Arrangements had been made with the Commandant d'Aerostation of the VIII.eme Armee for an original supply of 1500 tubes at Chaudeney and for a daily provision thereafter of 100 tubes per day.

Spare balloons, baskets, parachutes and accessories were available at the First Air Depot. No shortage in equipment was encountered.

(E) Telephone connections were established between Headquarters Commander Army Balloons and each corps balloon office; between each corps balloon office and each balloon assigned to the corps; between balloons and artillery groups and groupments; between balloons and corps or divisional intelligence offices.

Indicatives and wave-lengths were designated by the Army Radio Officer, so that each balloon could keep in touch by wireless with the Artillery squadrons and with Artillery groups and groupments.

(F) Administration. All air service units—American and French—were under the tactical direction of the Chief Air Service, First Army. The French companies were attached for administrative control to the 8th French Army, 2nd French Army or 2nd Colonial Corps, depending upon the sector in which the company was operating.

II. Missions

(A) Intelligence.

(1) Surveillance. The weather during the first two days of the attack was rainy and stormy. Visibility was poor and strong wind made ascension perilous. The balloons, however, in practically every

instance, were up at daybreak on the morning of the attack. One balloon in each corps was in ascension during the night preceding the attack and during each night while the attack continued. Surveillance was constantly maintained; movements of the troops were watched; fires and explosions were noted; enemy aeronautical service and artillery were observed.

The American balloons, on September 16th, reported enemy shells falling 116 times; reported enemy balloons 50 times, reported enemy planes 119 times; reported circulation on roads 23 times; and spotted 35 enemy batteries. The total hours of ascension of American balloons on this date were 142 hours, 33 minutes.

(2) Reports. Reports were rendered by all balloons at frequent intervals. Written operations reports were submitted daily to the corps balloon office by balloons assigned to Army Artillery. Telephonic reports were rendered by balloons assigned to corps, at indeterminate intervals, to G-2 at Divisional and Army Corps Headquarters. Telephonic reports were made by the Army Artillery balloons to Army Artillery headquarters, to the A.I.S. and to G-2 of the corps in the sector in which the Army balloon was functioning. The adjutant at each corps balloon office submitted a consolidated report daily to G-2 and G-3 of the corps, and to the Commander Army Balloons. The adjutant at each corps balloon office rendered a consolidated telephonic report daily to G-2 and G-3 of the corps, and to the Commander Army Balloons. The adjutant at each corps balloon office made miscellaneous reports, written and telephonic, at varying periods, to G-2 and G-3 of the corps, and to Commander Army Balloons. The assistant in the office of the Commander Army Balloons prepared memoranda throughout each day for distribution to the Chief of Staff, Information Officer and Operations Officer at Air Service Headquarters.

Divers reports on specialized matters were rendered to various authorities. Hostile aeronautics were reported by designated companies to contiguous D.C.A. Hostile balloons in ascension were reported by the Commander Army Balloons to the First Pursuit Group. Confirmation of enemy planes brought down by our aviators was given to the squadrons, for the record of pilots concerned.

(B) Regulation of Fire. The weather during the first two days of the attack prohibited the regulation of artillery fire. The balloons, on subsequent days, however, conducted important and successful adjustments. On September 16, the 2nd. Company regulated 157 shots for batteries of 155's; on the same day, the 3rd. Company adjusted 118 shots for batteries of 155's; on the same day, the 11th Company regulated 128 shots for batteries of 155's.

III. Casualties and Losses

The casualties and losses during the offensive may be summarized as follows:

Sept. 12 Balloon No. 10. Balloon was driven into the trees by a high wind and so torn as to render it unserviceable. 1st Lt. David G. Boyd had his leg broken and back sprained when the basket was thrown against the ground. Balloon No. 12. The cable of the balloon was snapped by a strong wind when the balloon was close to the ground. One parachute was smashed by being crashed against the ground. The balloon was last seen at an altitude of 3000 meters, traveling towards the enemy lines. 1st Lieut. G. W. Hinman, A.S., U.S.A. and 1st Lt. Roland S. Tait, A.S., U.S.A. remained in the basket.

Sept. 13 Balloon No. 20 (French). Balloon was punctured by diving into a tree.

Sept. 14 Balloon No. 5. Balloon was burned by an enemy plane. Balloon No. 2. An American plane (Salmson) collided with the cable of balloon No. 2, wrecking the plane and killing the pilot and observer in the plane, but causing no appreciable damage to the balloon.

Sept. 15 Balloon No. 1. Balloon was burned by an enemy plane. Balloon No. 2 Balloon was burned by an enemy plane.

Sept. 16 Balloon No. 9. Balloon was deflated by enemy shrapnel.

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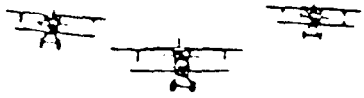
Air Service, First Army
Employment and Operation of Air Service During Recent Activity—St. Mihiel Drive

In the course of the four days' operation more than three thousand separate sorties were made, totalling in all more than four thousand hours in the air. Of the total number of sorties made throughout the attack, planes of the French Aerial Division carried out over one thousand individual sorties. During the four days' operation no less than seventy-five combats were engaged in, as the result of which nine enemy planes were driven down in flames and approximately fifty-four driven down out of control. Thirty hostile balloons were also destroyed during this period.

Pursuit units maintained a continuous aerial barrage over the sector, attacking enemy patrols and enemy balloons wherever found. As a result of these activities, the work of our Corps Observation was greatly facilitated and instances were extremely few where our observation missions were interrupted by enemy aircraft.

Pilots and observers of all units fired a total of over thirty-four thousand rounds of machine gun fire, many rounds of which were



directed at convoys on roads and artillery and troop concentrations in the rear of the enemy's lines. Our Pursuit aviation did much damage to and caused great confusion in the enemy's columns by launching small bombs.

Our units carried out a great number of very valuable reconnaissance missions. The changing condition of our front lines was reported, and contact continuously maintained with our advancing infantry. In addition to this, over three hundred and fifty adjustments were carried out on ammunition dumps, battery positions, convoys and other important targets. Army Observation planes made many visual reconnaissance missions, in some cases to a depth of fifty kilometers, reporting back to the Army Command the movements of the enemy in his extreme rear areas. On the 14th and 15th of September weather conditions permitted our observation planes to carry out a considerable number of photographic missions in the course of which more than a thousand plates were exposed. These were of great value in assisting Army and Corps Commanders in locating their advancing units, as well as determining the offensive disposition being made by the enemy.

Numerous bombing raids in the enemy's rear areas by our Day Bombardment Group and by the French Aerial Division; Independent Force, Royal Air Forces; and French Night Bombing Group under Commandant Villome, all acting in conjunction with the Air Service of the First Army. The objectives of these bombing missions included important enemy railroad junctions as well as the cities of Metz, Conflans, Briey, Thionville and many other towns in that vicinity. A total of over one hundred and twenty-five tons of bombs were dropped during the four days of the attack.

Low clouds and haze interfered with balloon observation during the first two days of the attack. Nevertheless our balloons were moved forward rapidly as our lines advanced. They rendered very valuable assistance in locating our forward lines, and a great amount of the regulation of artillery fire was conducted by our balloons. In most cases the targets consisted of retreating enemy convoys, crossroads, battery positions and concentration of enemy troops in rear areas. In all seventy-nine ascensions were made covering a total of two hundred hours. During this time twenty-seven adjustments were made and fifty-five hostile batteries were spotted.

Weather conditions during the entire operations were extremely unfavorable for the Air Service. Low clouds with intermittent rain and heavy wind storms handicapped to a certain extent the activity of our Aviation, but notwithstanding this handicap at all times during the operation our aviation dominated and unquestionably held the supremacy of the air.

While air units were employed on the St. Mihiel front we attempted to cover the whole front with light patrols at different altitudes and thereby establishing an aerial barrage. Our idea of concentration was

not used until later so it may be said that our units practically worked independently at this time. The unit of operations for pursuit work was the squadron covering a large area and trying to clear the air for a certain distance inside the enemy's lines. Before the drive started our pursuit aerial barrage consisted of two patrols, one at approximately 2500 to 3500 meters, and the other from 3500 to 5500 meters. It was considered that the enemy's aerial forces in this vicinity were very small but as soon as the drive started it was found that there was a fair concentration of enemy planes. During the operation it was found that the enemy had little or no trouble in breaking our pursuit barrage, by concentrating his forces at any point he desired. After the drive was over, enemy aerial forces in large numbers remained in the vicinity of the sector and a number of combats with those forces took place. There were several very astonishing feats accomplished at this time by army photographic planes where pictures were taken of the back areas giving valuable information; and these pictures were taken under extremely bad weather conditions at low altitudes. While and after the air service units were moving to the Verdun sector, the planes continued patrolling the old area on the St. Mihiel front to deceive the enemy and cause no suspicion of plans for attacking elsewhere.

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William Mitchell

Summary of Air Service Operations St. Mihiel—September 12th to 20th, 1918.

Weather

The weather was unfavorable for aerial operations during the greater part of the period.

Fog, low clouds and occasional showers prevailed, making conditions unfavorable for observation, and due to low ceiling unfavorable for photography.

Enemy Activity

On September the 12th and 13th, enemy aircraft were not able to make any impression on our aerial forces. Such pursuit squadrons as he employed were maintained in large patrols close to his anti-aircraft defense. As a rule, combats with our pursuit were avoided by the enemy, who endeavored to neutralize our observation work over his lines. His anti-aircraft was exceedingly active and his ground troops took every opportunity to deliver a heavy machine gun fire at our planes. His balloons, which were maintained far back in his lines, were unable to remain in ascension due to the activity of our pursuit aviation.

On September 14th, it became evident that the enemy had materially reinforced his aviation, which consisted largely of Pfalz and Fokker pursuit formations. On this date and the day following, the enemy was very aggressive, and took advantage of every opportunity to engage in combat with our aerial forces. His pursuit was invariably employed in formations of from nine to fifteen or more planes. Determined efforts were made to destroy our balloons and observation planes. Due to this policy a great number of combats ensued, with results which conceded the superiority of the air to our forces.

September 15th marked the end of the enemy aerial activity. Due undoubtedly to our aggressive tactics which consistently worsted his, and also to the efficient work done by our bombing units in attacking enemy airdromes, his aviation became practically inactive and remained so until the end of the operation (September 20th). He maintained a barrage of pursuit far within his own lines, which consistently avoided combat, and only a few sporadic attempts were made to penetrate our line with his reconnaissance. His balloons were exceedingly nervous and were invariably hauled down upon the approach of our patrols.

During this operation little activity was observed of the enemy reconnaissance aviation, except his balloons and one or two isolated photographic missions.

Activity of Our own Aviation

Our aviation adopted and maintained a policy of aggressiveness which gained and maintained undoubted superiority of the air throughout the operation.

The pursuit maintained a barrage over our front continually, and in addition employed strong offensive patrols which penetrated the enemy lines and operated in his back areas. Every enemy aircraft seen in the air was attacked, and in addition troops and convoys were consistently attacked on the ground with small bombs and machine gun fire. Balloons were forced down or burned, in the air or in their beds, and anti-aircraft guns were attacked with success.

The activities of the bombardment units proceeded day and night, in spite of adverse weather conditions. Dumps, railroads and troop concentrations were attacked continually by day, and the Independent Air Force, R.A.F., maintained continued activity against such centers as Metz, Courcelles, Chambley, Sablons, Briey and Buhl. The total weight of bombs dropped by our day and night units during the operation exceeds one hundred and fifty tons.

Due principally to the low ceiling of clouds and generally unsatisfactory weather conditions, observation work was carried out under difficulties. Infantry contact was maintained throughout the operation, and in addition thorough surveillance of the front was maintained which kept our command constantly supplied with valuable information. The infantry contact planes in particular were subjected to hardships and dangers in their missions, due to the extreme activity of enemy anti-aircraft and the increased heavy and accurate machine gun fire of enemy ground troops. In addition a large number of combats were experienced with enemy aircraft as the low ceiling made it impossible for our pursuit to maintain an absolutely impenetrable barrage.

Conclusions

Experience proved that the best results are obtained from pursuit when employed to maintain a barrage constantly over the front in conjunction with strong combat patrols dispatched to areas in which enemy activity is reported. In order to achieve the maximum results, the closest liaison must be maintained between the pursuit aviation and the anti-aircraft stations, observation aviation and advanced observation posts. In the St. Mihiel operation, this liaison was lacking to some

degree. It is most important that a liaison be established between the pursuit and advanced observation posts, particularly balloons, in order that enemy aerial activity may be reported without delay. Anti-aircraft fire should be directed against enemy aircraft as long as practicable, in order to indicate their position to our pursuit patrols.

If the effect produced by the enemy pursuit planes firing on our troops is any indication, the moral results of strafing troops with machine guns and small bombs is decidedly worth the development of this type of offensive aviation. The ideal conditions for harassing were realized during the last days of this operation and its benefits were reaped to the utmost. The enemy's withdrawal was limited to a minimum of well defined and exposed route, and the enemy aerial activity was negligible.

Our bombing operations demonstrated that large formations are not only maneuverable but are desirable at high altitude. It has also been demonstrated that more uniform results are obtained by having one observer only sight on the objective. He is the leader of the formation. The other planes release their bombs when the first are seen to leave the racks. Due to the comparative inexperience of our bombing units, objectives close to our lines were concentrated on, in order that the cooperation of our pursuit planes could be utilized as protection. This resulted in concentrated aerial activity in enemy areas with undoubted effect on the enemy's morale.

Observation planes worked uniformly at comparatively low altitudes, particularly during the infantry contacts. This was due in some measure to the weather conditions, but principally to the fact that only by low flying can friendly troops be distinguished from enemy when the aviators' signals are persistently disregarded.

As the tendency indicates that low flying is becoming more and more a necessity for many purposes, the question of protection against fire from the ground assumed more and more importance. This is particularly true in considering the development of attack squadrons.

Appendices

A: Order of Battle First Army 12 September 1918

(Corps and Divisions with Supporting Aviation)

First Army: Gen. John J. Pershing
I Corps: Maj. Gen. Hunter Liggett
- 2d Balloon Company
- 5th Balloon Company

82nd Division: Maj. Gen. William P. Burnham
- 50th Aero Squadron
- 42d Balloon Company

90th Division: Maj. Gen. Henry T. Allen
- 50th Aero Squadron
- 42d Balloon Company

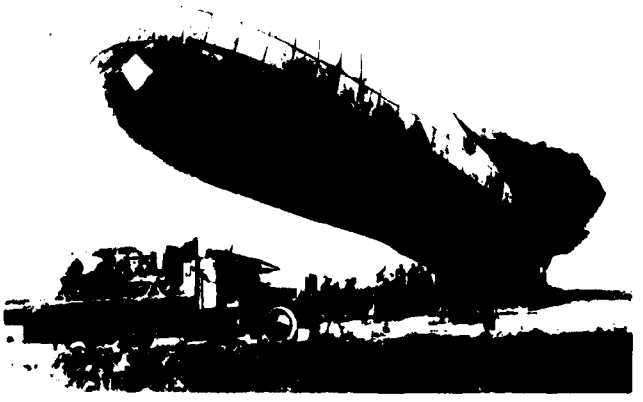
5th Division: Maj. Gen. John E. McMahon
- 12th Aero Squadron
- 1st Balloon Company

2d Division: Maj. Gen. John A. Lejeune
- 1st Aero Squadron
- 1st Balloon Company

78th Division (Corps Reserve): Maj. Gen. James H. McRae

Maj. Gen. Joseph T. Dickman, commander IV Corps, discussing the progress of the St. Mihiel offensive with aides.

IV Corps: Maj. Gen. Joseph T. Dickman
69th Balloon Company
89th Division: Maj. Gen. William M. Wright
135th Aero Squadron
43d Balloon Company
42d Division: Maj. Gen. Charles T. Menoher
90th Aero Squadron
3d Balloon Company
1st Division: Maj. Gen. Charles P. Summerall
8th Aero Squadron
9th Balloon Company
3d Division (Corps Reserve): Maj. Gen. Beaumont B. Buck
V Corps: Maj. Gen. George H. Cameron
99th Aero Squadron
7th Balloon Company
26th Division: Maj. Gen. Clarence R. Edwards
88th Aero Squadron
104th Aero Squadron
6th Balloon Company
[15th Colonial Division (French)]
8th Balloon Company
4th Division (8th Brigade in line, remainder of division, less 4th Field Artillery Brigade, in reserve): Maj. Gen. John L. Hines
12th Balloon Company
Army Reserve
35th Division: Maj. Gen. Peter E. Traub
80th Division: Maj. Gen. Adelbert Cronkhite
91st Division: Maj. Gen. William H. Johnston



B: Air Service, First Army 12 September 1918

Army Air Service Commander: Col. William Mitchell

Balloon Officer: Maj. John A. Paegelow

ARMY AVIATION

1st Pursuit Group: Maj. Harold E. Hartney
27th Aero Squadron: 1st Lt. Alfred A. Grant
94th Aero Squadron: Capt. Kenneth Marr
95th Aero Squadron: Capt. David McK. Peterson
147th Aero Squadron: 1st Lt. James A. Meissner
1st Pursuit Wing: Maj. Bert M. Atkinson
2d Pursuit Group: Maj. Davenport Johnson
13th Pursuit Squadron: Capt. Charles J. Biddle
22d Aero Squadron: Capt. Ray C. Bridgman
49th Aero Squadron: 1st Lt. George F. Fisher
139th Aero Squadron: 1st Lt. David E. Putnam
(Putnam was acting for Maj. L. C. Angstrom, who had been ill and who returned to duty as squadron commander on 13 September.)
3d Pursuit Group: Maj. William Thaw
28th Aero Squadron: 1st Lt. C. Maury Jones
93rd Aero Squadron: Maj. John W. F. M. Huffer
103rd Aero Squadron: Capt. Robert L. Rockwell
213th Aero Squadron: 1st Lt. John A. Hambleton
Day Bombardment Group: Maj. J. L. Dunsworth
11th Aero Squadron: 1st Lt. Thornton D. Hooper
20th Aero Squadron: 1st Lt. Cecil G. Sellers
96th Aero Squadron: Capt. James A. Summersett, Jr.
[Night Bombardment Group]
9th Aero Squadron: 1st Lt. Thomas A. Box
Army Observation Group: Maj. John N. Reynolds
24th Aero Squadron: 1st Lt. Maury Hill
91st Aero Squadron: 1st Lt. Everett R. Cook
[Army Artillery Observation Group]
10th Balloon Company: 1st Lt. Dale Mabry
11th Balloon Company: 1st Lt. Charles E. Barber
16th Balloon Company (Reserve): 1st Lt. Oscar Roman

CORPS AVIATION

Corps Observation Wing: Maj. Bert M. Atkinson
I Corps Air Service: Maj. Melvin A. Hall
I Corps Observation Group: Maj. Stephen C. Jocelyn
1st Aero Squadron: 1st Lt. Arthur J. Coyle
12th Aero Squadron: 1st Lt. Stephen H. Noyes
50th Aero Squadron: 1st Lt. Daniel P. Morse, Jr.
Balloon Wing Company A: 1st Lt. Allan P. McFarland
1st Balloon Company: 1st Lt. Walter J. Reed
2d Balloon Company: 1st Lt. Ira R. Koenig
5th Balloon Company: 1st Lt. M. R. Smith
42nd Balloon Company: 1st Lt. Ray W. Thompson
IV Corps Air Service: Maj. Harry B. Anderson
IV Corps Observation Group: Maj. Joseph T. McNarney
8th Aero Squadron: 1st Lt. John Gilbert Winant
90th Aero Squadron: 1st Lt. William Gallup
(Gallup was acting commander during the illness of 1st Lt. W. G. Schauffler, who returned to duty on 15 September.)
135th Aero Squadron: 1st Lt. Bradley J. Saunders, Jr.
Balloon Wing Company C: Capt. Paul Patterson
3d Balloon Company: Capt. Birge M. Clark
9th Balloon Company: 1st Lt. C. M. Felt
43d Balloon Company: Capt. O. B. Anderson
69th Balloon Company: 1st Lt. James P. Haight
V Corps Air Service: Lt. Col. Arthur R. Christie
V Corps Observation Group: Maj. Martin F. Scanlon
88th Aero Squadron: Capt. Kenneth P. Littauer
99th Aero Squadron: Capt. James E. Meredith
104th Aero Squadron: 1st Lt. Clearton H. Reynolds
Balloon Wing Company B: Maj. John H. Jouett
6th Balloon Company: 1st Lt. S. W. Ovitt
7th Balloon Company: 1st Lt. Samuel T. Moore
8th Balloon Company: Capt. M. L. Witherus
12th Balloon Company: 1st Lt. Ashley C. McKinley

C: Independent Force
Royal Air Force

General Officer Commanding, Maj. Gen. Hugh M. Trenchard

Hq. Independent Force		Autigny-la-Tour
Hq. 8th Brigade		Froville
Hq. 41st Wing		Lupcourt
55 Squadron	(D.H.4)	Azelot
99 Squadron	(D.H.9)	Azelot
104 Squadron	(D.H.9)	Azelot
110 Squadron	(D.H.9a)	Bettoncourt
Hq. 83rd Wing		Xaffevillers
97 Squadron	(H.P.)	Xaffevillers
100 Squadron	(F.E.2b)	Xaffevillers
115 Squadron	(H.P.)	Roville
215 Squadron	(H.P.)	Xaffevillers
216 Squadron	(H.P.)	Autreville

D: Notes on Maps and Grids

The maps cited in the First Army's field order for the attack on St. Mihiel were French maps on a scale of 1 to 80,000 (about $\frac{1}{2}$ inch to the kilometer) that had been drawn in the first half of the nineteenth century and revised shortly before the outbreak of the war. Printed in black on white and heavily hachured, these maps gave latitude and longitude in both the sexagesimal and centesimal systems, with longitude being based on the Paris meridian. The St. Mihiel salient was covered by two sheets (Commercy and Metz), each about 31 by $19\frac{1}{2}$ inches.

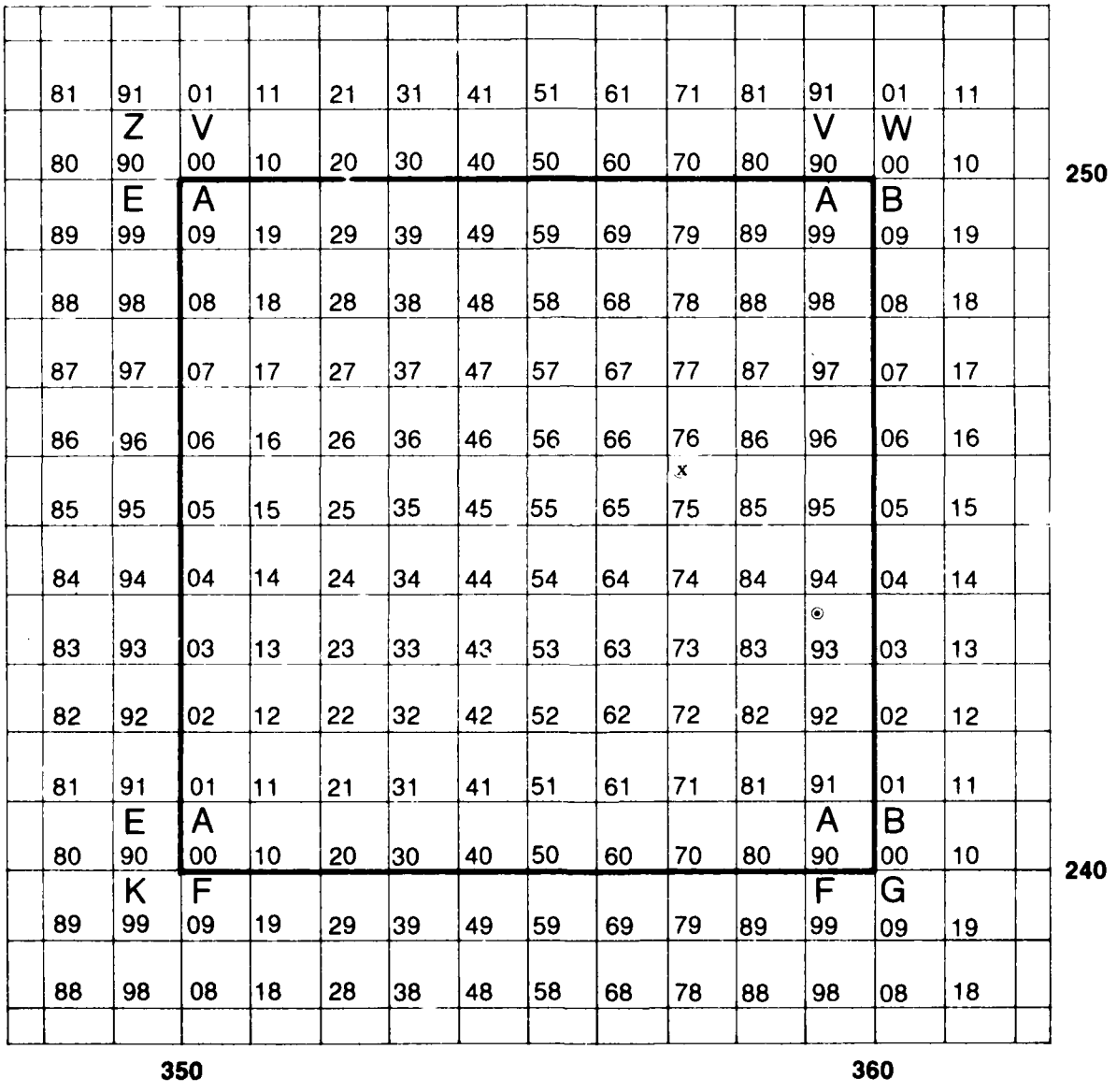
The AEF also used a number of other types of French military maps. On a smaller scale, for example, was one of 1 to 200,000 (1 inch to 5 kilometers) in sheets 26 by 16 inches. The contours, in brown, at 20-meter intervals, were not numbered and were so finely drawn and so overlaid with place names and other details that the relief was not very legible. Hills were shaded in brown, woods were green, water blue, roads red, and railroads black.

A French series on the relatively large scale of 1:20,000 (about 2 inches to the kilometer) was of great use to aviation units working with infantry and artillery. These maps, with each sheet covering an area of 15 by 10 kilometers, were in black and white with contour intervals of 5 meters. Contour numbers and particularly spot heights were frequently used for references, an example being "Crossroads 335.9," where two roads cross near an elevation mark of 335.9 meters. More often, however, map references were by a grid that had been adopted by the French early in 1917 and by the Allied command a year later.

The French grid[1] was in one-kilometer squares, the grid lines being numbered from west to east and from south to north, and read to the right and up. This grid gave position readings over the entire military area of the German frontier, from Switzerland to the North Sea and English Channel and westward to take in the defensive area of the French capital.[2]

Use of the grid provided a simple means for locating or describing a place or position to within an area of 1 square kilometer. For example, the town of St. Benoit en Woevre, in the middle of the St. Mihiel salient, was listed in the AEF gazetteer as being located at coordinates 357-245. This meant that the town could be found on the map in the 1-kilometer square to the right and up from the intersection of the line 357 kilometers east and the line 245 kilometers north of the base point (see Fig. 1).

Figure 1.



⊗ St. Benoit 357-245 or A-75

◉ Troop location 359.23-243.87

Further definition was obtained by assuming a subdivision of the 1000-meter grid at 100-meter intervals. Thus the place where troops were seen on a road southeast of St. Benoit (Fig. 1) might have been reported as 359.2-243.8, which located the place within 100 meters. Still greater definition, to within 10 meters or even 1 meter, was obtained by assuming further subdivisions of the grid, in which case the coordinates for the troops might be 359.23-243.87 or 359.236-243.85.

The easting, the reading on the east-west line, frequently was designated the "x" coordinate, and the northing, on the north-south line, the "y" coordinate, which would make the referene to St. Benoit x357-y245.

Often the first digit of the coordinate was dropped as being unnecessary for unambiguous reference in an area up to 100 kilometers square. This would make the reference 57-45 in the case of St. Benoit, and 59.23-43.87, or x59.23-y43.87, in the case of the troop location.

Sometimes the system was abbreviated further by dropping the first two digits of each coordinate, the reference to St. Benoit being 7-5, which was written as a single number, 75. This abbreviated system was incorporated on maps of 1:20,000 by placing in the lower left (southwest) corner of each 1-kilometer square the last figure from the number of the grid lines to the west and south (Fig. 1). To avoid ambiguity in this abbreviated system, which repeated itself every 10 kilometers, 10-kilometer blocks were grouped in 50-kilometer squares lettered in the following manner:

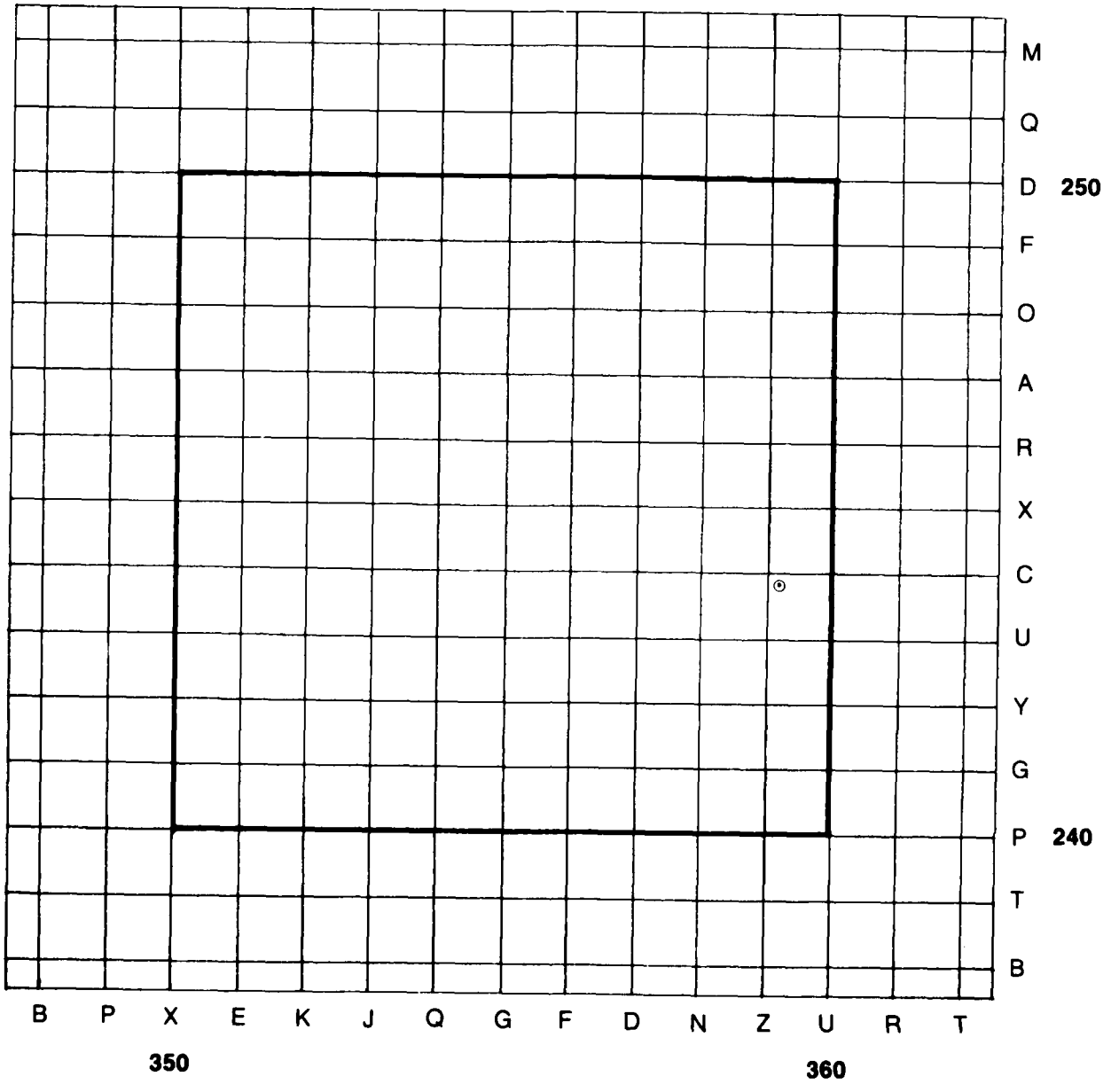
A	B	C	D	E
F	G	H	J	K
L	M	N	O	P
Q	R	S	T	U
V	W	X	Y	Z

The appropriate letter appeared in each of the four corners of each 10-kilometer block (Fig. 1). The reference for any particular place was found by reading the letter of the 10-kilometer block and the number of the proper 1-kilometer square. Under this system the reference for St. Benoit was A-75, and that for the troops, A-93. When further definition was required, the reference was extended by adding two more digits, the first the easting and the second the northing, with or without a decimal point. Thus the reference to the troops might appear as A93.28 or, simply, as A9328. Ambiguity resulting from the reptition of the lettered squares every 50 kilometers could be eliminated by using the complete coordinates, such as 357-245 for St. Benoit.

A code was used for wireless transmission of coordinates from aircraft operating with infantry or artillery. Each coordinate was encoded as a letter representing a line on the 1-kilometer grid and the digit from an assumed 100-meter subdivision of the grid. The letter code, which

Figure 2

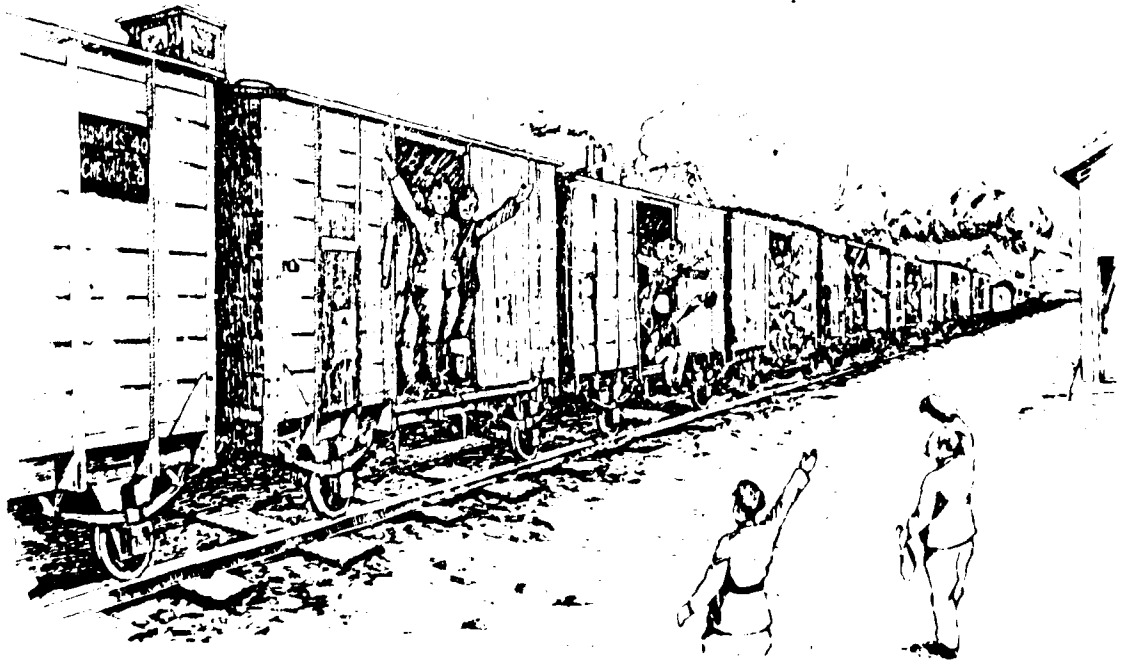
CLEF No. 324



⊙ Troop location
Z2, U8

made use of 25 letters (the letter "I" being omitted) repeated every 25 kilometers, was contained in a key (the French called it "clef") that was changed from time to time. The key specified in operations orders for the beginning of the St. Mihiel offensive was No. 324 (Fig. 2). With that key the coordinates for the troop position would be encoded as Z2, U8, the easting being given before the northing as with all other references under the various systems described above.

Lack of consistency in the formats used in recording coordinates (sometimes called coordinance) in World War I documents makes it difficult at times to determine exactly what was meant in some of the poorly typed documents of the period. The main problem comes from the use of a colon, semicolon, comma, period, or blank space in place of a dash (or hyphen) (which seems to have been the proper mark) between two coordinates of a reference. For example, 357-245 might appear as 357:245 or 357;245 or 357,245 or 357.245 or 357 245. The use of a period often raises a question as to whether it is a decimal in a coordinate or a substitute for a dash between two coordinates. A comma can be very confusing in a series of coordinates recorded by a typist who was not very careful about the spacing. The editor has not attempted to change such map reference to try to impose a uniformity that did not exist in the citation of map coordinates.



Notes

Preface

1. Doc. 11.
2. [John J. Pershing], *Final Report of Gen. John J. Pershing, Commander-in-Chief, American Expeditionary Forces* (Washington, 1920), p.42.
3. For further information about "Gorrell's History," see the introduction to the first volume in this series; also see [Timothy K. Nenninger], *Gorrell's History of the American Expeditionary Forces Air Service, 1917-1919*, Pamphlet Describing M990, National Archives Microfilm Publications (Washington, 1975).
4. [Central Intelligence Agency], *NIS* [National Intelligence Survey] *Gazetteer, France* (Washington, 1974).
5. *List of Places in St. Mihiel-Badonviller District with Their Locations* (G-2, A-3 Spec Pub No 3) (GHQ, AEF, 1918).
6. American Battle Monuments Commission, *American Operations in the St. Mihiel Region, September 12-November 11, 1918*, pocket map in ABMC, *American Armies and Battlefields in Europe* (Washington, 1938).
7. American Battle Monuments Commission, *1st Division: Summary of Operations in the World War* (Washington, 1944) and similar volumes for other divisions (see Selective Bibliography).
8. Service Historique, Etat-Major de l'Armee, Ministere de Guerre, *Les Armees Francaise dans la Grande Guerre* (Paris, 1922/1937), especially T VII, Vol. I.
9. Institut Geographique National, *Joint Operations Graphic*, Series 1501, especially sheets NM 31-12 and NM 32-10.

(The numbers for the notes for the documents correspond to the document numbers. The notes for each document are lettered except where a single note, indicating the source of the document, is used. To avoid repeating the compiler's name and the title of the work, or the repetitious use of *ibid.*, to cite the many documents from "Gorrell's History," citations to that source are restricted to series, volume, and page. Thus, a citation to "Gorrell's History," Series E, Volume 3, page 17, will appear simply as E-3,17.)

Plans and Preparations

1. a. The Air Service of the First Army had been created earlier with Brig. Gen. Benjamin D. Foulois as Chief. After some conflict with Mitchell, who had served under Foulois as Chief of Air Service of I Corps and later of 1st Brigade, Foulois had asked to be reassigned and had recommended to Pershing that Mitchell be given the First Army post. The letter in which Foulois made that recommendation was dated the day following this general order naming Mitchell Chief of Air Service, First Army (Ltr, CAS, 1st Army to C-in-C AEF, subj: Assignment of Col Wm Mitchell, 25 Jul 18, in Albert F. Simpson Historical Research Center, file 168.68-5). Foulois stated later that he had talked with Pershing "relative to the Air Service activities at Chateau Thierry" (where Mitchell was) and about "my general duties" before submitting the letter of 25 July recommending Mitchell for the Chief of Air Service, First Army (Ltr, Foulois to Pres Inf Eff Bd, subj: Pers Svc Rcd, 14 Oct 19, p. 152, in AFSHRC 168.68-5). In another letter to Pershing on 25 July 1918, which had to do with Foulois' own reassignment, Foulois referred to a meeting he had with Pershing that same day (Ltr, CAS, 1st Army to C-in-C, AEF, subj: Relief from duty as CAS, 1st Army, 25 Jul 18, in AFSHRC 168.68-5). In a memorandum for Maj. Gen. Mason M. Patrick, Chief of Air Service, AEF, on 26 July 1918, Foulois said, "Upon my return to G.H.Q. yesterday, the Commander-in-Chief sent for me, in connection with my present duties and recommendations regarding the technical and tactical development of the combat Air Service. "Continuing, Foulois said that he had recommended Mitchell's

"promotion to my position as Chief of Air Service [First Army], which the Commander-in-Chief promptly approved" (Ltr, CAS, 1st Army to CAS, AEF, subj: Relief from duty with 1st Army, 26 July 18, in AFSHRC 168.68-5). Since the general order designating Mitchell as Chief of Air Service, First Army, was dated 24 July, that date being confirmed by Pershing's diary (John J. Pershing, *My Experiences in the World War* [New York, 1931], Vol II, pp 171, 175), Pershing's decision as to Mitchell's reassignment apparently was made before Foulois formally submitted his recommendation by means of the letter dated 25 July. Mitchell said that he was "formally notified" of his reassignment on 27 July (William Mitchell, *Memoirs of World War)*, (Washington, 1960], p. 233).

b. This document is from Historical Division, Department of the Army, *United States Army in the World War, 1917-1919* (hereafter cited as Army, *World War)*, (Washington, 1948), Vol XVI, p 393.

2. From Information Section, Air Service, AEF, *Air Service Bulletin*, Vol VII, No 305, 24 Dec 18. This document was included in the second volume (Doc 45) in this series.

3. C-4, 107.

4. a. C-4, 432.

b. Doc 37, Vol II, this series.

c. Aviation in the First Army did not develop sufficiently during the war to require the formation of observation and bombardment wings.

5. Army, *World War*, Vol VIII, p 131.

6. a. C-4, 418

b. This circular was published in *Air Service Bulletin*, Vol VII, No 305, 24 Dec 18, with only minor changes, mostly in format.

c. See Doc 2, which is dated August 6th, 1918. The editor has been unable to determine which date is correct.

d. This code does not seem to fit any found by the editor. In the *Bulletin* the last part of the sentence, following the word "call," was deleted.

e. This sentence was omitted from the *Bulletin*.

7. N-2, 404. This memorandum was published in Mitchell's *Memoirs*, pp 235-237.

8. a. [Frank P. Lahm,] *The World War I Diary of Col. Frank P. Lahm, Air Service, A.E.F.*, Albert F. Simpson, ed. (Hist Rsh Div, ASI, AU, 1970), pp 120-121.

b. From Army, *World War*, Vol VIII, p 157.

9. Army, *World War*, Vol VIII, p 32.

10. a. C-3, 48.

b. For GO 120, see Doc 1 above. GO 81 has been included in the Vol 2 (Doc 37), this series. GO 8 is Doc 4 above.

c. Thomas DeWitt Milling, who had played an important part in the development of military aviation in the United States before the war, had been commanding U.S. aviation in the Toul sector.

d. Joseph C. Morrow, Jr., a graduate of the U.S. Military Academy in 1909, had been with the 1st Aero Squadron at Texas City, later on duty at the school at San Diego, and more recently with the U.S. Air Service in England. He soon would be named Chief of Air Service, III Corps, his place on Mitchell's staff being taken by Maj. Thomas S. Bowen, who served as operations officer during the Battle of St. Mihiel. Bowen, who also was a graduate of the Military Academy in 1909, had attended the school at San Diego and had served with the 1st Aero Squadron in Mexico.

e. Townsend F. Dodd, who had served with the 1st Aero Squadron during the Punitive Expedition, had gone to France as Aviation Officer on Pershing's staff but had soon been replaced by Mitchell, who outranked him. At the time of his appointment as Information Officer of the First Army Service, he was Chief of the Engineering Section under Brig. Gen. Benjamin D. Foulois in the Zone of Advance.

f. John A. Paegelow, who had entered the army as a private in 1897, had later been commissioned, obtained a

balloon pilot's license, and volunteered for aviation duty. Sent to France at the end of 1917 as commander of the 2d Balloon Squadron, he subsequently had served as Balloon Officer, I Corps.

g. Bert M. Atkinson had commanded the 1st Pursuit Organization and Training Center at Toul and later the 1st Pursuit Group.

h. Lewis H. Brereton had commanded the 12th Aero Squadron and later the Air Service of I Corps.

i. See editor's introduction to Doc 4. At the end of the war, Brereton said he thought the wing had performed a useful function during the formative period of corps aviation but that it had soon outlived its usefulness. His recommendation was to make the job a staff function in the Office of the Army Air Service Commander.

j. Reynolds had been commanding the 91st Aero Squadron.

k. Harold E. Hartney, a Canadian, had served with the Royal Flying Corps and had been seriously injured when shot down by Richthofen in February 1917. Afterwards, with a commission in the U.S. Army, he had commanded the 27th Aero Squadron.

l. James L. Dunsworth had commanded the 90th and 96th Aero Squadrons in combat. On 10 September, he became commander of the new Day Bombardment Group, made up of the 11th, 20th, and 96th Squadrons.

11. AFSHRC 168.68-5.
12. Army, *World War*, Vol VIII, p 172.
13. C-4, 397.
14. C-7, 258.
15. C-4, 399.
16. C-4, 398.
17. C-3, 313. This memorandum was published as a circular (No 1) of AS, First Army, 1 Sep 18. See "Gorrell's History," C-4, 433.
18. Army, *World War*, Vol VIII, p 177.
19. C-3, 50.
20. Army, *World War*, Vol VIII, p 177.
21. C-4, 400.
22. Army, *World War*, Vol VIII, p. 192.
23. Army, *World War*, Vol VIII, p 194.
24. C-4, 437.
25. a. C-4, 479.
    b. See App. E.
26. C-4, 401.
27. C-4, 482.
28. Army, *World War*, Vol VIII, p 200.
29. C-3, 52.
30. C-4, 126.
31. C-4, 127.
32. a. Army, *World War*, Vol VIII, p 203.
    b. C-4, 351
    c. Omitted. See Doc 52.
33. C-4, 402.
34. Army, *World War*, Vol VIII, p 240.
35. C-4, 128.
36. C-4, 129.
37. C-7, 262.
38. Army, *World War*, Vol VIII, 228.
39. C-4, 361.
40. C-7, 264.
41. a. C-4, 404.
    b. Such planes apparently were not employed in the Battle of St. Mihiel.
42. C-4, 130.
43. C-4, 443.
44. [War Department], *Records of the World War, Field Orders, 1918, 5th Division* (Washington, 1921), p 66.
45. Army, *World War*, Vol VIII, p 233.
46. C-4, 405.
47. [War Department], *Records . . . 5th Division*, p 103.
48. C-3, 51.
49. N-3, 606. See the editor's introductory note to Doc 44 above.
50. a. From Army, *World War*, Vol VIII, p 240.
    b. A note in Army, *World War*, states that this and the other parts bracketted in the document were added in ink and signed by Colonel McCleave, G-3.
51. C-4, 132.
52. a. C-3, 455.
    b. Some other documents show the 9th Squadron under the Army Observation Group commanded by Maj. John Reynolds.
53. C-3, 377.
54. C-3, 431.

12 September 1918

55. a. C-4, 5.

b. Forces under Haig and Petain were on the offensive north of the Aisne.

56. C-4, 131.

57. C-4, 483.

58. C-4, 407.

59. C-9, 150. This order, issued before Hartney received Battle Orders No. 1 (Doc 55) from Mitchell at the conference on the afternoon of 11 September, provided for the same kind of limited operations that the group had been engaged in just prior to the battle. Note, for example, the restriction on crossing enemy lines.

60. C-9, 151.

61. E-6, 123.

62. E-13, 56.

63. C-7, 190.

64. C-10, 216.

65. C-10, 218.

66. C-10, 220.

67. E-3, 220.

68. E-3, 221.

69. E-5, 35.

70. E-5, 36.

71. C-11, 73.

72. C-11, 75.

73. C-11, 76.

74. C-11, 77.

75. C-11, 78.

76. C-11, 79.

77. C-11, 80.

78. C-11, 431.

79. C-11, 432.

80. C-11, 433.

81. E-16, 144.

82. E-21, 129.

83. E-21, 130.

84. E-4, 171.

85. E-14, 189.

86. E-5, 265.

87. a. E-10, 58.

b. The first column lists the observers, the second the pilots.

c. Marked on a map in this squadron's operations room.

88. E-9, 387.

89. E-9, 388.

90. E-9, 389.

91. E-9, 390.

92. E-9, 426.

93. E-9, 427.

94. E-9, 428.

95. a. E-6, 196.

b. See Doc. 96. The general editorial policy has been to include reports thus referenced. Some, however, apparently were not included in "Gorrell's History" or perhaps have been overlooked by the editor.

c. Blank space in report.

d. The standard format for the summary had 20 items, lettered "a" through "t" (see Doc. 97 for example). The operations officer sometimes, as in this case, used only the items for which he had data to report.

96. a. E-6, 257. This document is a compilation, made by the squadron, from the reports filed by the various pilots.

b. This balloon was officially credited as Luke's first victory.

97. E-12, 229.

98. E-12, 355.

99. E-12, 351.

100. E-12, 352.

101. E-12, 353.

102. E-12, 354.

103. E-13, 110.

104. E-18, 209.

105. E-18, 220. This report was prepared on a blank form provided for use of the pilots, observers, and operations officers of the various squadrons of the First Army. The histories of some units contain only extracts, usually the narrative portion, from these reports (see, for example, Doc. 96).

106. E-18, 221.

107. C-9, 534.

108. E-3, 382.

109. E-5, 137.

110. E-5, 110.

111. E-5, 138.

112. E-5, 139.

113. E-5, 141.

114. C-10, 69. A printed form, "Report of Operations—Aero Squadron," was used by the Operations Office of the 2d Pursuit Group. It had 13 columns. The first column, used to number the various sections of the report, had no heading. The others were for (2) the nature of the mission; (3) place; (4) time mission was received; (5) time of start; (6) time of return; (7) time in air; (8) direction; (9) distance in kilometers; (10) altitude in meters; (11) pilot, (12) number of planes; and (13) result. The report for 12 September was divided into five sections (col. 1), which were identified (col. 2) as patrols, protections, etc., with the missions for each type being numbered. The other

columns were filled in as appropriate for each mission, columns 3, 5, 6, 10, 12, and 13 being used, for example, for the first patrol. Because of difficulties of using this format in this volume, a different format has been used for the data reported by the group.

115. C-10, 71. The reporting time was changed on 12 September (Doc. 56), which accounts for the supplementary reports submitted by this and other units for that day.

116. E-7, 126.

117. a. E-7, 194.

b. The date in the report was 14 September, and the time of return 13:40. Other documents, including the Daily Operations Report (Doc 116) and the squadron's Condition of Planes Report, indicate that the date should be 12 September, and the time of return 14:30.

118. E-7, 190.
119. E-11, 100.
120. E-11, 334.
121. E-11, 333.
122. E-11, 332.
123. E-16, 201.
124. E-16, 116.
125. E-16, 115.
126. E-16, 114.
127. E-16, 202.
128. E-21, 210.
129. E-21, 211.
130. E-21, 298.
131. E-21, 299.
132. C-11, 268.
133. C-11, 269.
134. C-11, 270.
135. M-10, 62.
136. E-14, 111.
137. E-14, 112.
138. C-8, 86.
139. C-7, 289.
140. E-2, 119.
141. E-5, 329.
142. E-10, 145.
143. E-1, 40.
144. E-3, 114.
145. E-8, 81.
146. C-12, 143.
147. M-10, 212.
148. M-10, 7.
149. M-10, 121.
150. E-15, 16.
151. E-17, 24.
152. N-3, 615.
153. E-5, 267.
154. E-3, 142.
155. a. C-3, 159.
b. Not identified.
156. C-4, 176.
157. C-4, 179.
158. C-3, 376.
159. C-3, 429.
160. C-3, 454.

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161. Army, *World War*, Vol VIII, p 258.
162. C-4, 8.
163. C-4, 484.
164. C-9, 152.
165. C-9, 153.
166. C-9, 154.
167. E-6, 124.
168. E-13, 57.
169. E-13, 57.
170. C-7, 192.
171. C-10, 221.
172. C-10, 223.
173. E-3, 222.
174. E-5, 37.
175. C-11, 81.
176. C-11, 82.
177. C-11, 83.
178. C-11, 435.
179. C-11, 436.
180. C-11, 437.
181. E-16, 145.
182. E-21, 133.
183. E-21, 134.
184. E-14, 190.
185. E-10, 60.
186. E-9, 429.
187. E-9, 440.
188. E-9, 430.
189. a. E-6, 197.
b. Blank space in report.
190. E-6, 196.
191. E-6, 258.
192. E-12, 230.
193. E-12, 357.
194. E-12, 74.
195. E-12, 75.
196. a. E-12, 356.
b. Chambers and Kaye landed at Toul, where they learned about Putnam (see Note at end of report). Leaving Toul at 18:10, they arrived at their home base at 19:10 (see Doc. 287).
197. E-13, 111.
198. E-18, 210.
199. E-18, 211.
200. E-18, 222.
201. E-18, 223.
202. E-18, 224.
203. C-9, 536.
204. E-3, 383.
205. E-3, 384.
206. E-3, 385.
207. E-3, 386.
208. E-3, 389.
209. E-3, 390.
210. M-10, 52.
211. a. E-5, 142.
b. Howard and Parrott, pilot and observer,

were from the 20th Aero Squadron, as was the DH-4 Liberty airplane.

c. 20th Squadron.

212. a. E-5, 153.

b. Seaver and Stokes were from the 20th Squadron.

213. a. E-5, 144.

b. Porter and Parrott from 20th Squadron.

214. E-5, 145.
215. C-10, 72.
216. E-7, 127.
217. E-7, 191.
218. E-7, 192.
219. E-11, 99.
220. E-11, 338.
221. E-11, 336.
222. E-11, 337.
223. E-11, 335.
224. E-16, 203.
225. E-16, 113.
226. E-16, 111.
227. E-21, 212.
228. E-21, 300.
229. E-21, 301.
230. E-21, 302.
231. E-21, 303.
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Appendix D

1. This grid, "Quadrillage kilometrique systeme Lambert," was named after a German scientist and mathematician of the eighteenth century, Johann Heinrich Lambert, who developed the conformal conic projection on which it was based.

2. The Cartographic Information Division of Air University Library calculated, on the basis of a projection of the grid from maps used in the Battle of St. Mihiel, that the point of origin was approximately 1° East of Greenwich meridian (or 1° 20" West of the Paris Meridian) and about 46° 49" North.

Glossary of Terms and Abbreviations

AA, AAA	antiaircraft artillery
ABMC	American Battle Monuments Commission
AC	army corps
AEF	American Expeditionary Forces
aero	aeronautical
AFSHRC	Albert F. Simpson Historical Research Center
AGD	Adjutant General's Department
alt	altitude
Amer E F	American Expeditionary Forces
APO	Army Post Office
app	appendix
ar	army
art	artillery
AS	Air Service
ASI	Aerospace Studies Institute
ASSC	Air Service, Signal Corps
assnd	assigned
asst	assistant
AU	Air University
B	balloon
bd	board
BIO	Branch Intelligence Officer
Brig	Brigadier
CA	corps d'armee
CAC	corps d'armee colonial; Coast Artillery Corps
Capt	Captain
CARC	Coast Artillery Reserve Corps
CAS	Chief of Air Service
Cdte	Commandant
C-in-C	Commander-in-Chief
Co, co	company
CO	commanding officer
Col	Colonel
constr	construction
Cpl	Corporal
cs	current series
CS	Chief of Staff
DCA	Antiaircraft Corps
demol	demolition
dept	department
DFW	airplane developed or produced by Deutsche Flugzeugwerke
DH	de Havilland (British, or American built, aircraft)
div	division
do	ditto
doc	document
dy	duty
EA	enemy aircraft
EF	Expeditionary Forces
eff	efficiency
FA	Field Artillery
FE	Farman Experimental (airplane)
fme	ferme (farm)
FO	field order
Fr (fr)	French
GAC	Groupe d'Armees du Centre
GAE	Group d'Armees de l'Est
GB	groupe de bombardment
GC	groupe de chasse, groupe de combat
Gen	General
GHQ	general headquarters
GO	general orders
GS	General Staff
H, h	hour
hdqrs	headquarters
hist	historical
HP	Handley Page (aircraft)
Hq	headquarters
IGD	Inspector General's Department
Inf	infantry
JA	judge advocate; Judge Advocate General's Departments
kg	kilogram
kilo	kilometer; kilogram
Lieut	Lieutenant
Lt	Lieutenant
ltr	letter

LVG	airplane produced or developed by Luft-Verkehrs-Gesellschaft
M, m	mile; meter; minute
Maj	Major
MC	Medical Corps
ME	Master Electrician
memo	memorandum
m/m	millimeter
NA	National Army
NCO	noncommissioned officer
no	number
O, obs	observer
observ, observa	observation
P, p	pilot; page
par	paragraph
PC	Post of Command
PCT	[Post of Command of Telegraphy?]
pers	personal
photo	photographic
PL	patrol leader
P of A	point of ascension
pres	president
pub	publication
Pvt	Private
QMC	Quartermaster Corps
QMRC	Quartermaster Reserve Corps
RAF	Royal Air Force
rcd	record
rec	reconnaissance
rec'd	received
regim	regiment
RR	railroad
rsh	research
SC	Signal Corps
sec, sect	section
Sgt	Sergeant
Sig RC	Signal Reserve Corps
SO	special orders
SOS	Services of Supply
spec	special
sqdn, sqn	squadron
subj	subject
svc	service
T	tome
temp	temporary
USA	United States Army
vis	visibility
VB	Viven Bessiere (grenade, bomb, or cartridge thrown by discharger fitted to an infantry rifle)
vol	volume; voluntary
Z of A	Zone of Advance

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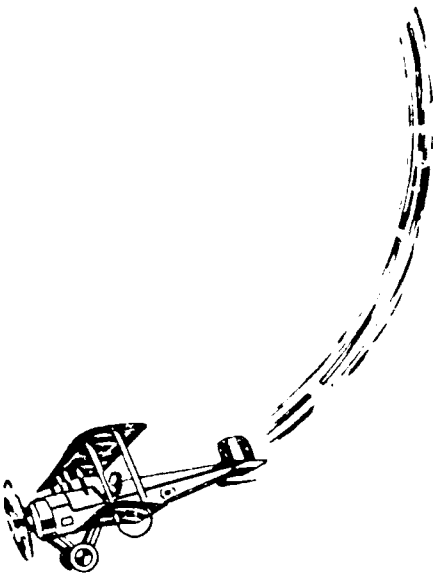

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