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Exhibit R-2, RDT&E Budget Item Justification: PB 2021 Air Force **Date:** February 2020

Appropriation/Budget Activity 3600: <i>Research, Development, Test & Evaluation, Air Force I BA 5: System Development & Demonstration (SDD)</i>	R-1 Program Element (Number/Name) PE 0604800F / F-35 - EMD
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COST (\$ in Millions)	Prior Years ⁽⁺⁾	FY 2019	FY 2020	FY 2021 Base	FY 2021 OCO	FY 2021 Total	FY 2022	FY 2023	FY 2024	FY 2025	Cost To Complete	Total Cost
Total Program Element	51,175.835	67.999	7.628	5.423	0.000	5.423	0.000	0.000	0.000	0.000	0.000	51,256.885
653831: <i>Joint Strike Fighter</i>	50,956.248	67.999	7.628	5.423	0.000	5.423	0.000	0.000	0.000	0.000	0.000	51,037.298

Program MDAP/MAIS Code: 198

⁽⁺⁾ The sum of all Prior Years is \$219.587 million less than the represented total due to several projects ending

A. Mission Description and Budget Item Justification

The F-35 Joint Strike Fighter (JSF) Program will develop and field an affordable, highly common family of next generation strike aircraft for the USN, USAF, USMC and allies. The three variants are the F-35A Conventional Takeoff and Landing; F-35B Short Takeoff and Vertical Landing; and the F-35C Aircraft Carrier suitable variant. The F-35A will be a stealthy multi-role aircraft, primary air-to-ground for the Air Force to replace the F-16 and A-10 and complement the F-22. The F-35B variant will be a multi-role strike fighter aircraft to replace the AV-8B and F/A-18 for the Marine Corps, replace the Sea Harrier and GR 7 for the United Kingdom, and replace the AV-8 currently employed by the Italian Navy. The F-35C will provide the Department of the Navy a multi-role, stealthy strike fighter aircraft to complement the F/A-18E/F.

The United Kingdom, Italy, Netherlands, Canada, Australia, Denmark, Norway, and Foreign Military Sales customers are also participants in the JSF program. The program shown here reflects USN, USMC, USAF, and International Partner funding.

Funding at the accomplishment/planned program level is reported as the total of all services and partners as these activities support all aircraft variants.

The System Development and Demonstration (SDD) budget funds a total quantity of 20 RDT&E test articles to include 6 ground test articles and 14 flight test articles for USN, USAF, and USMC use.

- FY07: 1 F-35A flight test article
- FY08: 1 F-35B flight test article; 1 F-35B ground test article
- FY09: 1 F-35B flight test article; 2 F-35A ground test articles
- FY10: 6 flight test articles: 3 F-35A, 2 F-35B, 1 F-35C; 3 ground test articles: 1 F-35B, 2 F-35C
- FY11: 4 flight test articles: 1 F-35A, 1 F-35B, 2 F-35C
- FY13: 1 F-35C flight test article

This program is in Budget Activity 5, System Development and Demonstration (SDD) because it has passed Milestone B approval and is conducting engineering and manufacturing development tasks aimed at meeting validated requirements prior to full rate production.

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B. Program Change Summary (\$ in Millions)	FY 2019	FY 2020	FY 2021 Base	FY 2021 OCO	FY 2021 Total
Previous President's Budget	69.001	7.628	5.434	0.000	5.434
Current President's Budget	67.999	7.628	5.423	0.000	5.423
Total Adjustments	-1.002	0.000	-0.011	0.000	-0.011
• Congressional General Reductions	0.000	0.000			
• Congressional Directed Reductions	0.000	0.000			
• Congressional Rescissions	0.000	0.000			
• Congressional Adds	0.000	0.000			
• Congressional Directed Transfers	0.000	0.000			
• Reprogrammings	-0.118	0.000			
• SBIR/STTR Transfer	-0.884	0.000			
• Other Adjustments	0.000	0.000	-0.011	0.000	-0.011

Change Summary Explanation

No significant Changes

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Exhibit R-2A, RDT&E Project Justification: PB 2021 Air Force										Date: February 2020		
Appropriation/Budget Activity 3600 / 5					R-1 Program Element (Number/Name) PE 0604800F / F-35 - EMD				Project (Number/Name) 653831 / Joint Strike Fighter			
COST (\$ in Millions)	Prior Years	FY 2019	FY 2020	FY 2021 Base	FY 2021 OCO	FY 2021 Total	FY 2022	FY 2023	FY 2024	FY 2025	Cost To Complete	Total Cost
653831: <i>Joint Strike Fighter</i>	50,956.248	67.999	7.628	5.423	0.000	5.423	0.000	0.000	0.000	0.000	0.000	51,037.298
Quantity of RDT&E Articles	-	-	-	-	-	-	-	-	-	-		

Note

Total cost including United States Navy (USN), United States Marine Corps (USMC), International partner contributions and United States Air Force (USAF) funding are: FY19 \$191.460M, FY20 \$10.828M, and FY21 \$6.234M. R-2 data reflects variant unique funding only.

R-2A(section B)/R-3 displays total combined Program (i.e. not Service specific), including International partners.

F-35 EMD Includes:

- USAF PE 0604800F BPAC 653831
- USN PE 0604800N Project Unit 2261
- USMC PE 0604800M Project Unit 2262

D&S Includes:

- USAF PE 0604800F BPAC 653832
- USN PE 0604800N Project Unit 3352
- USMC PE 0604800M Project Unit 3350

A. Mission Description and Budget Item Justification

The F-35 Joint Strike Fighter (JSF) Program will develop and field an affordable, highly common family of next generation strike aircraft for the USN, USAF, USMC and allies. The three variants are the F-35A Conventional Takeoff and Landing; F-35B Short Takeoff and Vertical Landing; and the F-35C Aircraft Carrier suitable variant. The F-35A will be a stealthy multi-role aircraft, primary air-to-ground for the Air Force to replace the F-16 and A-10 and complement the F-22. The F-35B variant will be a multi-role strike fighter aircraft to replace the AV-8B and F/A-18 for the Marine Corps, replace the Sea Harrier and GR 7 for the United Kingdom, and replace the AV-8 currently employed by the Italian Navy. The F-35C will provide the Department of the Navy a multi-role, stealthy strike fighter aircraft to complement the F/A-18E/F.

The United Kingdom, Italy, Netherlands, Canada, Australia, Denmark, Norway, and Foreign Military Sales customers are also participants in the JSF program. The program shown here reflects USN, USMC, USAF, and International Partner funding.

The top-line Program Element reflects the unique variant for each Service. Funding at the accomplishment/planned program level is reported as the total of all services and partners as these activities support all aircraft variants.

The System Development and Demonstration (SDD) budget funds a total quantity of 20 RDT&E test articles to include 6 ground test articles and 14 flight test articles for USN, USAF, and USMC use.

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Appropriation/Budget Activity 3600 / 5	R-1 Program Element (Number/Name) PE 0604800F / F-35 - EMD	Project (Number/Name) 653831 / Joint Strike Fighter
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FY07: 1 F-35A flight test article
 FY08: 1 F-35B flight test article; 1 F-35B ground test article
 FY09: 1 F-35B flight test article; 2 F-35A ground test articles
 FY10: 6 flight test articles: 3 F-35A, 2 F-35B, 1 F-35C; 3 ground test articles: 1 F-35B, 2 F-35C
 FY11: 4 flight test articles: 1 F-35A, 1 F-35B, 2 F-35C
 FY13: 1 F-35C flight test article

B. Accomplishments/Planned Programs (\$ in Millions)

	FY 2019	FY 2020	FY 2021 Base	FY 2021 OCO	FY 2021 Total
<p>Title: System Development and Demonstration (SDD) (F-35 JSF)</p> <p>Description: SDD execution of the Air System with (Lockheed Martin), including International Commonality Effort which includes airframe, vehicle systems, mission systems, autonomic logistics, systems engineering, and integrated test efforts.</p> <p>FY 2020 Plans: Continue SDD execution of the Air System with (Lockheed Martin), including International Commonality Effort which includes, airframe, vehicle systems, mission systems, autonomic logistics, systems engineering, and integrated test efforts. Activity aligned to IMS in accordance with variant IOC. Conduct SDD closure activities including FCA/PCA(Functional Configuration Audit/Production Configuration Audit) in order to establish production specification and transition to post-SDD, production and sustainment.</p> <p>FY 2021 Base Plans: Continue SDD execution of the Air System with (Lockheed Martin), including International Commonality Effort which includes, airframe, vehicle systems, mission systems, autonomic logistics, systems engineering, and integrated test efforts. Activity aligned to IMS in accordance with variant IOC. Conduct SDD closure activities including FCA/PCA(Functional Configuration Audit/Production Configuration Audit) in order to establish production specification and transition to post-SDD, production and sustainment.</p> <p>FY 2021 OCO Plans: N/A</p> <p>FY 2020 to FY 2021 Increase/Decrease Statement: FY21 funding decrease is due to reduction in domestic and International controls as SDD phase draws to closure.</p>	103.767	10.828	6.234	0.000	6.234
<p>Title: Test and Evaluation (T&E) (F-35 JSF)</p>	64.613	0.000	0.000	0.000	0.000

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Exhibit R-2A, RDT&E Project Justification: PB 2021 Air Force	Date: February 2020
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Appropriation/Budget Activity 3600 / 5	R-1 Program Element (Number/Name) PE 0604800F / F-35 - EMD	Project (Number/Name) 653831 / Joint Strike Fighter
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B. Accomplishments/Planned Programs (\$ in Millions)	FY 2019	FY 2020	FY 2021 Base	FY 2021 OCO	FY 2021 Total
<p>Description: Government-executed Initial Operational Test & Evaluation (IOT&E) activities. Elements of IOT&E include preparation, execution, & evaluation of flight and ground based tests which assess all aspects (lethality, mission effectiveness, cyber security) of the F-35 Air System in an operationally relevant environment.</p> <p>FY 2020 Plans: IOT&E conclusion and reporting requirements.</p> <p>FY 2021 Base Plans: N/A</p> <p>FY 2021 OCO Plans: N/A</p> <p>FY 2020 to FY 2021 Increase/Decrease Statement: N/A</p>					
<p>Title: Development Support (F-35 JSF)</p> <p>Description: SDD Support efforts for airframe, air vehicle systems, mission systems, weapons integration, mission support, and autonomic logistics development activities.</p> <p>FY 2020 Plans: N/A</p> <p>FY 2021 Base Plans: N/A</p> <p>FY 2021 OCO Plans: N/A</p> <p>FY 2020 to FY 2021 Increase/Decrease Statement: N/A</p>	23.080	0.000	0.000	0.000	0.000
Accomplishments/Planned Programs Subtotals	191.460	10.828	6.234	0.000	6.234
Other Service Funding Adjustment	123.461	3.200	0.811	-	0.811
Air Force Subtotals	67.999	7.628	5.423	0.000	5.423

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C. Other Program Funding Summary (\$ in Millions)

Line Item	FY 2019	FY 2020	FY 2021	FY 2021	FY 2021	FY 2022	FY 2023	FY 2024	FY 2025	Cost To	Total Cost
			Base	OCO	Total					Complete	
• RDTE 05 PE 0604800N 2261: JSF SDD (CV)	58.769	1.490	0.250	-	0.250	0.264	0.247	0.247	0.252	0.000	61.519
• RDTE 05 PE 0604800N 3352: F-35C Sustainment/ Capability Enhancements (CV)	4.766	-	-	-	-	-	-	-	-	0.000	4.766
• RDTE 05 PE 0604800M 2262: JSF SDD (STOVL)	64.692	1.710	0.561	-	0.561	0.584	0.596	0.608	0.621	0.000	69.372
• RDTE 05 PE 0604800M 3350: F-35B Sustainment/ Capability Enhancements (STOVL), BPAC 3350	-	-	-	-	-	-	-	-	-	0.000	0.000
• RDTE 05 International 1: International SDD	-	-	-	-	-	-	-	-	-	0.000	0.000

Remarks

This is a joint program with no executive service. Service Acquisition Execution (SAE) authority alternates between the Department of the Navy and the Department of the Air Force and currently resides with the Navy.

Program Element 0604800N/0604800M continues USN development efforts budgeted in 0603800N prior to 2002.

The United Kingdom, Italy, Netherlands, Canada, Australia, Denmark, and Norway are participants in the SDD phase of JSF.

Note: The USAF/USN/USMC procurement lines include Aircraft Procurement and Advanced Procurement only. Initial Spares and Repair Parts for all services are reflected in separate lines. International Partner Funding also includes funds provided under the Italy and Netherlands Bilateral agreements.

RELATED RDT&E: Funding prior to JSF SDD (FY94-FY01): USN PE 0603800N \$1,950.617M; USAF PE 0603800F \$1,907.352M; DARPA PE 0603800E \$118.056M; and International Partner contributions of \$253.921M for a total of \$4,229.946M.

D. Acquisition Strategy

The SDD program consists of a cost-reimbursement contract awarded to Lockheed Martin Aeronautics Company to develop the F-35 Air System, consisting of three aircraft variants and its associated logistics support system, for the U.S. Services and international participants. Similarly, a cost-reimbursement contract was awarded to Pratt & Whitney to develop the F135 propulsion system. Ground and flight testing will be conducted during development to accomplish validation and verification, with the extensive use of modeling and simulation to offset the risk of this large, complex, and concurrent lifecycle program. A comprehensive logistics support environment, including an integrated training system for aircrew, maintenance, and support personnel, is also being developed.

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On 25 April 2011, the Department of Defense terminated the development of the General Electric Rolls-Royce Fighter Engine Team F136 propulsion system.

The F-35 Program has made international involvement a key element of the acquisition strategy. This includes international partnership in the development, production, and sustainment phases of the lifecycle. Additional international participation includes Foreign Military Sales arrangements.

In Fiscal Year (FY) 2007, separate cost-type contracts were awarded to Lockheed Martin Aeronautics Company and Pratt & Whitney to begin low rate initial production for F-35 air vehicles, propulsion systems, and sustainment for the fielded systems. Transition to fixed-price-type procurement contracts occurred with the fourth low rate lot. To provide logistics support for delivered aircraft, Performance-Based Logistics cost-type contracts will be awarded to Lockheed Martin Aeronautics Company and Pratt & Whitney.

At the completion of Low Rate Initial Production, a Defense Acquisition Board review, and Milestone Decision Authority approval, the F-35 Program will enter Full Rate Production. Fixed-price procurement contracts will be awarded for F-35 air vehicles and propulsion systems for the U.S. Services and international participants. Multiyear procurement authority for the F-35 Air System will be requested for Full Rate Production. Concurrently, multiple-year, fixed-price-type Performance Based Logistics contracts for sustainment will be requested to support multi-Service and multi-national requirements.

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Exhibit R-3, RDT&E Project Cost Analysis: PB 2021 Air Force **Date:** February 2020

Appropriation/Budget Activity 3600 / 5	R-1 Program Element (Number/Name) PE 0604800F / F-35 - EMD	Project (Number/Name) 653831 / Joint Strike Fighter
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Product Development (\$ in Millions)				FY 2019		FY 2020		FY 2021 Base		FY 2021 OCO		FY 2021 Total	Cost To Complete	Total Cost	Target Value of Contract
Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost			
Product Development	C/CPAF	Not specified. : TBD	0.000	-		-		-		-		-	0.000	0.000	-
Lockheed Martin - SDD	SS/CPIF	Lockheed Martin : Ft. Worth, TX	32,378.580	94.464	Dec 2018	10.828	Dec 2019	6.234	Dec 2020	-		6.234	3.419	32,493.525	32,495.150
Lockheed Martin - SDD Fee	SS/CPIF	Lockheed Martin : Ft. Worth, TX	1,745.043	9.303	Dec 2018	-		-		-		-	0.000	1,754.346	1,754.193
Prior Year No Longer Funded in FYDP	Various	Various : TBD	12,211.151	-		-		-		-		-	0.000	12,211.151	-
Subtotal			46,334.774	103.767		10.828		6.234		-		6.234	3.419	46,459.022	N/A

Remarks
 Contract type prior to 2013 was CPAF.
 Cumulative Award Fee earned in prior years for Lockheed Martin is 97%.
 Cumulative Award Fee earned in prior years for Pratt and Whitney is 98%.

Support (\$ in Millions)				FY 2019		FY 2020		FY 2021 Base		FY 2021 OCO		FY 2021 Total	Cost To Complete	Total Cost	Target Value of Contract
Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost			
Support	C/CPAF	Not specified. : TBD	0.000	-		0.000		0.000		0.000		0.000	0.000	0.000	-
AFFTC/Eglin	Various	Various : Various	0.000	-		0.000		0.000		0.000		0.000	0.000	0.000	0.000
Miscellaneous	Various	Various : Various	148.727	22.569	Nov 2018	0.000		0.000		0.000		0.000	0.000	171.296	0.000
NAWC Patuxent River	Various	NAWC AD : Patuxent River, MD	0.000	-		0.000		0.000		0.000		0.000	0.000	0.000	0.000
Prior Year no longer funded in FYDP	Various	Various : Various	1,223.521	-		0.000		0.000		0.000		0.000	0.000	1,223.521	0.000
Subtotal			1,372.248	22.569		0.000		0.000		0.000		0.000	0.000	1,394.817	N/A

Test and Evaluation (\$ in Millions)				FY 2019		FY 2020		FY 2021 Base		FY 2021 OCO		FY 2021 Total	Cost To Complete	Total Cost	Target Value of Contract
Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost			
Test and Evaluation	C/CPAF	Not specified. : TBD	0.000	-		-		-		-		-	0.000	0.000	-

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Exhibit R-3, RDT&E Project Cost Analysis: PB 2021 Air Force **Date:** February 2020

Appropriation/Budget Activity 3600 / 5	R-1 Program Element (Number/Name) PE 0604800F / F-35 - EMD	Project (Number/Name) 653831 / Joint Strike Fighter
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Test and Evaluation (\$ in Millions)				FY 2019		FY 2020		FY 2021 Base		FY 2021 OCO		FY 2021 Total	Cost To Complete	Total Cost	Target Value of Contract
Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost			
NAWC China Lake	Various	NAWC WD : China Lake, CA	43.257	0.000	Nov 2018	-		-		-		-	0.000	43.257	-
Development Test and Evaluation	Various	NAWC AD : Patuxent River, MD	811.512	0.181	Nov 2018	-		-		-		-	0.000	811.693	-
Edwards AFB	Various	Edwards AFB : Edwards AFB, CA	743.319	0.000	Nov 2018	-		-		-		-	0.000	743.319	-
Other (including Classified PIDs)	Various	Various : Various	0.000	-		-		-		-		-	0.000	0.000	-
OT - AFOTEC/AFFTC	Various	OT AFOTEC/ AFFTC : Various	0.000	0.000		-		-		-		-	0.000	0.000	-
OT - JITC/OPTEV	Various	OT JITC/OPTEV : Various	0.000	0.000		-		-		-		-	0.000	0.000	-
OT - Various	Various	Various : Various	16.126	64.432	Nov 2018	-		-		-		-	0.000	80.558	-
Prior Year no longer funded in FYDP	Various	Various : TBD	741.413	-		-		-		-		-	0.000	741.413	-
Subtotal			2,355.627	64.613		-		-		-		-	0.000	2,420.240	N/A

Management Services (\$ in Millions)				FY 2019		FY 2020		FY 2021 Base		FY 2021 OCO		FY 2021 Total	Cost To Complete	Total Cost	Target Value of Contract
Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost			
Management Services	C/CPAF	Not specified. : TBD	0.000	-		-		-		-		-	0.000	0.000	-
Travel	C/CPAF	Various : Various	27.261	0.511	Dec 2018	-		-		-		-	0.000	27.772	0.000
Prior Year not funded in FYDP	Various	Various : Various	866.338	-		-		-		-		-	0.000	866.338	0.000
Subtotal			893.599	0.511		-		-		-		-	0.000	894.110	N/A

Remarks
Cumulative Award Fee earned in prior years for Stanley is 99%.

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Exhibit R-3, RDT&E Project Cost Analysis: PB 2021 Air Force **Date:** February 2020

Appropriation/Budget Activity 3600 / 5	R-1 Program Element (Number/Name) PE 0604800F / F-35 - EMD	Project (Number/Name) 653831 / Joint Strike Fighter
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	Prior Years	FY 2019	FY 2020	FY 2021 Base	FY 2021 OCO	FY 2021 Total	Cost To Complete	Total Cost	Target Value of Contract
Cost Category Subtotals	50,956.248	191.460	10.828	6.234	0.000	6.234	3.419	51,168.189	N/A
Other Service Funding Adjustment	-	123.461	3.200	0.811	-	0.811			-
Project Cost Totals	50,956.248	67.999	7.628	5.423	0.000	5.423	3.419	51,168.189	-

Remarks
 The project information shown here reflects USN, USMC, USAF and International Partner funding total for each contract. By agreement USN and USMC funding shares are approximately equal and when combined are equal to the USAF share.

NOTE 1: Prior Years reflect \$22,252.708M USAF/\$19,901.107M USN/\$3,808.970M USMC /\$5,013.470M International/Total \$50,976.248M
 FY 2019 reflects \$ 67.999M USAF/\$ 58.769M USN/\$ 64.692M USMC/\$ 0.000M International/Total \$191.462M
 FY 2020 reflects \$ 7.628M USAF/\$ 1.490M USN/\$ 1.710M USMC/Total \$10.828M
 FY 2021 reflects \$ 5.423M USAF/\$ 0.250M USN/\$ 0.561M USMC/Total \$6.234M

JSF EMD Includes:
 USAF PE 0604800F BPAC 653831
 USN PE 0604800N Project Unit 2261
 USMC PE 0604800M Project Unit 2262

D&S Includes:
 USAF PE 0604800F BPAC 653832
 USN PE 0604800N Project Unit 3352
 USMC PE 0604800M Project Unit 3350

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Exhibit R-4, RDT&E Schedule Profile: PB 2021 Air Force **Date:** February 2020

Appropriation/Budget Activity 3600 / 5	R-1 Program Element (Number/Name) PE 0604800F / F-35 - EMD	Project (Number/Name) 653831 / Joint Strike Fighter
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	FY 2019				FY 2020				FY 2021				FY 2022				FY 2023				FY 2024				FY 2025							
	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4				
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 17 Full Funding / Production / Delivery																																
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 18 Full Funding / Production / Delivery																																
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 19 Full Funding / Production / Delivery																																

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Exhibit R-4A, RDT&E Schedule Details: PB 2021 Air Force		Date: February 2020
Appropriation/Budget Activity 3600 / 5	R-1 Program Element (Number/Name) PE 0604800F / F-35 - EMD	Project (Number/Name) 653831 / Joint Strike Fighter

Schedule Details

Events by Sub Project	Start		End	
	Quarter	Year	Quarter	Year
JSF Variants - CV, STOVL & CTOL				
Acquisition Milestones: F-35C Initial Operational Capability	2	2019	2	2019
Test & Evaluation: Test and Evaluation: Initial Operational Test and Evaluation (IOT&E)	1	2019	4	2020
Defense Acquisition Reviews: System Development Reviews: Interim Program Review (IPR) FY18	1	2019	1	2019
Defense Acquisition Reviews: System Development Reviews: Interim Program Review (IPR) FY19	1	2020	1	2020
Defense Acquisition Reviews: System Development Reviews: Interim Program Review (IPR) FY20	1	2021	1	2021
Defense Acquisition Reviews: System Development Reviews: Interim Program Review (IPR) FY21	1	2022	1	2022
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 13 Full Funding / Production / Delivery	2	2019	1	2020
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 14 Full Funding / Production / Delivery	2	2020	1	2021
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 15 Full Funding / Production / Delivery	2	2021	1	2022
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 16 Full Funding / Production / Delivery	2	2022	4	2023
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 17 Full Funding / Production / Delivery	2	2023	4	2024
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 18 Full Funding / Production / Delivery	2	2024	4	2025
Production Lots (Full Funding / Production / Delivery: U.S. Aircraft): LOT 19 Full Funding / Production / Delivery	2	2025	4	2025

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Exhibit R-4A, RDT&E Schedule Details: PB 2021 Air Force **Date:** February 2020

Appropriation/Budget Activity	R-1 Program Element (Number/Name)	Project (Number/Name)
3600 / 5	PE 0604800F / <i>F-35 - EMD</i>	653831 / <i>Joint Strike Fighter</i>

Note

Schedule details reflect fiscal years