Exhibit R-2, RDT&E Budget Item Justification: PB 2023 Air Force											Date: April 2022	
Appropriation/Budget Activity 3600: *Research, Development, Test & Evaluation, Air Force* / BA 4: *Advanced Component Development & Prototypes (ACD&P)*					R-1 Program Element (Number/Name) PE 0604257F / *Advanced Technology and Sensors*							
COST ($ in Millions)	**Prior Years**	**FY 2021**	**FY 2022**	**FY 2023 Base**	**FY 2023 OCO**	**FY 2023 Total**	**FY 2024**	**FY 2025**	**FY 2026**	**FY 2027**	**Cost To Complete**	**Total Cost**
Total Program Element	-	25.901	23.745	13.311	0.000	13.311	10.155	10.344	10.563	10.798	Continuing	Continuing
644818: *Imaging and Targeting Support*	-	17.068	14.641	13.311	0.000	13.311	10.155	10.344	10.563	10.798	Continuing	Continuing
645148: *Common Airborne Sense and Avoid (C-ABSAA)*	-	8.833	9.104	0.000	0.000	0.000	0.000	0.000	0.000	0.000	Continuing	Continuing

Note

FY2023, PE 0604257F (Advanced Technology and Sensors), Project 645148, (Common Airborne Sense and Avoid) funds were transferred to align funding with Air Force project priorities and requirements. Project 645148 was strategically paused.

A. Mission Description and Budget Item Justification

The Advanced Technology and Sensors (ATS) program coordinates the development of advanced technologies (sensors, data links, targeting support, and quick reaction capabilities) in support of multiple airborne reconnaissance platforms, both manned and unmanned. Its objectives are to develop, demonstrate, and rapidly transition advanced, interoperable, multi-platform solutions to reduce the find, fix, target, and track kill chain timeline, and to provide safe separation and collision avoidance for remotely piloted aircraft. This program coordinates the development of common collection, processing, and dissemination solutions for near-real time intelligence, surveillance, and reconnaissance. The ATS program also increases interoperability by developing common standards and interfaces.

The funds in this program are distributed in priority order for the goal of building a comprehensive Geospatial Intelligence (GEOINT) capability for the USAF. On an annual basis, developmental technologies are reviewed against warfighter capabilities and requirements based on strategic roadmaps and on the results of the Airborne Sensors for ISR Analysis of Alternatives, as prefaced in the Challenging Targets Initial Capabilities Document. Efforts advancing the technological maturity of promising sensors and processing capabilities are reviewed and prioritized into a recommended list for senior executive direction to implement in the coming year. The program office has the ability to rapidly initiate an Imaging & Targeting Support (I&TS) project in order to expedite development and acquisition of urgently needed capabilities for the warfighter.

The Air Force is pursuing a software-intensive approach to maintain safe separation, avoid collisions, and provide the ability to safely integrate with other airspace users. The software solutions identified in this Information System Capability Development Document (IS-CDD) are open and modular and accept inputs from any type of sensor or data link and will operate any legacy and future Group 4 and 5 RPA. The effort includes technology maturation, risk reduction, EMD and life-cycle costs, such as: 1) prototyping activities, 2) streamlined development, test and implementation of the software, 3) development of open system architecture using modular design, standards-based interfaces, and widely-supported consensus-based standards, and 4) collaboration with the Federal Aviation Agency (FAA), National Aeronautics and Space Administration (NASA), and other services to develop national policy and standards.

Exhibit R-2, RDT&E Budget Item Justification: PB 2023 Air Force	Date: April 2022
Appropriation/Budget Activity 3600: *Research, Development, Test & Evaluation, Air Force* / BA 4: *Advanced Component Development & Prototypes (ACD&P)*	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*

This program element may include necessary civilian pay expenses required to manage, execute, and deliver weapon system capability. The use of such programs funds would be in addition to the civilian pay expenses budgeted in program element 0605827F, 0605828F, 0605829F, 0605831F, 0605832F, 0605833F, 0605898F, 0606398F.

The Advanced Technology and Sensors (ATS) funding also supports innovation activities to include studies, analyses, requirements definition, and quick-reaction capability prototypes/demonstrations to accelerate planning for technology transition, technology insertion and future acquisition programs. This program element may include necessary civilian pay expenses required to manage, execute, and deliver technology and sensor capabilities. The use of such program funds would be in addition to civilian pay expenses budgeted in program element 0304260F.

This effort is in Budget Activity 4, Advanced Component Development and Prototypes (ACD&P), because efforts are necessary to evaluate integrated technologies, representative modes or prototype systems in a high fidelity and realistic operating environment.

B. Program Change Summary ($ in Millions)	FY 2021	FY 2022	FY 2023 Base	FY 2023 OCO	FY 2023 Total
Previous President's Budget	24.702	23.745	0.000	0.000	0.000
Current President's Budget	25.901	23.745	13.311	0.000	13.311
Total Adjustments	1.199	0.000	13.311	0.000	13.311
• 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	1.199	0.000			
• SBIR/STTR Transfer	0.000	0.000			
• Other Adjustments	0.000	0.000	13.311	0.000	13.311

Change Summary Explanation

FY21 increase due to approved BTR supporting AgilePod.

The FY 2022 President's Budget submittal did not reflect FY 2023 through FY 2026 funding. Therefore, an explanation of the change between the two budget positions for FY2023 cannot be made in a relevant manner.

Exhibit R-2A, RDT&E Project Justification: PB 2023 Air Force			Date: April 2022
Appropriation/Budget Activity 3600 / 4	R-1 Program Element (Number/Name) PE 0604257F / *Advanced Technology and Sensors*	Project (Number/Name) 644818 / *Imaging and Targeting Support*	

COST ($ in Millions)	Prior Years	FY 2021	FY 2022	FY 2023 Base	FY 2023 OCO	FY 2023 Total	FY 2024	FY 2025	FY 2026	FY 2027	Cost To Complete	Total Cost
644818: *Imaging and Targeting Support*	-	17.068	14.641	13.311	0.000	13.311	10.155	10.344	10.563	10.798	Continuing	Continuing
Quantity of RDT&E Articles	-	-	-	-	-	-	-	-	-	-		

A. Mission Description and Budget Item Justification

The purpose of the I&TS project is to develop, mature, demonstrate, and rapidly transition next-generation, persistent, wide area surveillance and common imagery reconnaissance sensor capabilities (active and passive systems), including sensor data processing, for multiple airborne platforms, as well as sensor products to aid in rapid targeting (e.g., geolocation models, sensor-based exploitation tools, sensor networking capabilities). Includes multi-INT integration efforts intended to cross-cue or fuse with SIGINT products in order to create a holistic ISR picture for warfighters and the IC.

Developmental efforts pursued include improved sensor performance, new and improved sensor capabilities and modes, new and/or unique modalities, and enabling technologies. Improved sensor performance includes but is not limited to: increased geolocation accuracy, increased dismount detection capability, and advanced sensor data correlation. New and improved sensor capabilities include but are not limited to: Hyperspectral Imagery (HSI), Polarimetric Imaging (PI), Ground and Dismount Moving target indicator (GMTI/ DMTI), maritime search/track, Inverse Synthetic Aperture Radar, Foliage Penetration (FOPEN), and nuclear event detection. New and improved sensor modes include but are not limited to: high resolution imagery, Ground and Dismount Moving Target Indicator (GMTI/DMTI), persistent surveillance, wide area motion imagery, and Spectral Identification. New and unique sensor modalities include but are not limited to: low frequency SAR, Hyperspectral Imagery (HSI), and Light Detection And Ranging (LIDAR). Enabling Technologies include but are not limited to: automated and assisted target detection/recognition, Artificial Intelligence (AI), Machine Learning (ML), network centric warfare, integrated multi-sensor capabilities to detect and identify obscured targets, TCPED (Tasking, Collection, Planning, Exploitation, and Dissemination) improvements related to sensors, automated registration, and imagery product quality assurance. New and improved sensor capabilities that involve massed sensing involving SUASs and low-cost sensors for Attritable aircraft.

These efforts are intended to accelerate delivery of data from sensor to user for both target search and target engagement (kill-chain) activities. This project will also increase interoperability by developing and advancing common standards (e.g. Open Mission Systems (OMS), Sensor Open System Architecture (SOSA), Common Open Architecture Radar Programs (COARPS), Multi-INT Common Open Architecture Reconnaissance Program Standard (MI-COARPS), National Imagery Transmission Format, AgilePod and data reduction) and interfaces.

Activities also include studies and analysis to support both current program planning and execution and future program planning. This program element may include necessary civilian pay expenses required to manage, execute, and deliver technology and sensor capability. The use of such program funds would be in addition to the civilian pay expenses budgeted in program element 0605831F.

I&TS funding also supports innovation activities to include studies, analyses, requirements definition, and quick-reaction capability prototypes/demonstrations to accelerate planning for technology transition, technology insertion and future acquisition programs. This program element may include necessary civilian pay expenses

Exhibit R-2A, RDT&E Project Justification: PB 2023 Air Force		Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 644818 / *Imaging and Targeting Support*

required to manage, execute, and deliver technology and sensor capabilities. The use of such program funds would be in addition to civilian pay expenses budgeted in program element 0304260F.

B. Accomplishments/Planned Programs ($ in Millions)	FY 2021	FY 2022	FY 2023
Title: Imaging & Targeting Support (I&TS)	17.068	14.641	13.311

Description: Corporately prioritized Air Force Multi-INT Portfolio of projects to develop and demonstrate next generation airborne sensors and processing technologies to further the art of the possible and/or transition ISR capabilities (ex: radar improvement, next-generation HSI, LIDAR, ISR Standards, EO/IR, and data mitigation technologies).

FY 2022 Plans:
Continue to develop, modernize, and demonstrate lower TRL projects into transition ready efforts. The following FY21 efforts will continue into FY22:
- Multi-INT Object-level Targeting Imagery Fusion-engine (MOTIF)
- Autonomous Multi-IMINT Adaptive Tasking Engine (AUTOMATE)
- MI-COARPS Processor for Real-Time Embedded Performance (MICPREP)

These efforts and new proposed projects will be approved through the GEOINT Capabilities Working Group (GCWG) Executive Element process. Efforts are approved in the summer prior to the start of the new fiscal year.

New FY22 GCWG approved efforts to include:
- MAGIC Heat
- Reactive Artificial Intelligence for GEOINT On-Line Data (RAINGOD)
- Agile ATR in Highly-Contested Environment (HCE) (BirdBox V2)
- Automated On-Board GEOINT ATR and SIGINT Sensor Fusion
- Surveillance and Targeting Open Real-time Multi-INT (STORM)

FY 2023 Plans:
Will continue to develop, modernize, and demonstrate lower TRL projects into transition ready efforts. The following FY22 efforts will continue into FY23:
- MAGIC Heat
- Reactive Artificial Intelligence for GEOINT On-Line Data (RAINGOD)
- Agile ATR in Highly-Contested Environment (HCE) (BirdBox V2)
- Automated On-Board GEOINT ATR and SIGINT Sensor Fusion
- Surveillance and Targeting Open Real-time Multi-INT (STORM)

Exhibit R-2A, RDT&E Project Justification: PB 2023 Air Force		Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 644818 / *Imaging and Targeting Support*

B. Accomplishments/Planned Programs ($ in Millions)	FY 2021	FY 2022	FY 2023
These efforts and new proposed projects will be approved through the GEOINT Capabilities Working Group (GCWG) Executive Element process. Efforts are approved in the summer prior to the start of the new fiscal year. ***FY 2022 to FY 2023 Increase/Decrease Statement:*** Decrease in funding due to realignment of funds to higher Air Force priorities			
Accomplishments/Planned Programs Subtotals	17.068	14.641	13.311

C. Other Program Funding Summary ($ in Millions)

N/A

Remarks

D. Acquisition Strategy

Imaging and Targeting Support efforts are prioritized on an annual basis by the GCWG, in accordance with the validated gaps in the Challenging Targets Initial Capabilities Document. Resulting funded efforts are then contracted for and/or executed by either various program offices, laboratories, industry, and/or other government agencies.

Acquisition strategy is to maximize commercial and national development efforts and investment through multiple contracting methods, including the use of Engineering Change Proposals to modify existing contracts and new contracts that were awarded both competitively or on a sole source basis.

Exhibit R-3, RDT&E Project Cost Analysis: PB 2023 Air Force		Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 644818 / *Imaging and Targeting Support*

Product Development ($ in Millions)

Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	FY 2021 Cost	FY 2021 Award Date	FY 2022 Cost	FY 2022 Award Date	FY 2023 Base Cost	FY 2023 Base Award Date	FY 2023 OCO Cost	FY 2023 OCO Award Date	FY 2023 Total Cost	Cost To Complete	Total Cost	Target Value of Contract
SHERLOC	SS/CPFF	Collins : Westford, MA	-	0.018	May 2021	-		-		-		-	Continuing	Continuing	-
H-Chip	SS/CPFF	EO Vista : Acton, MA	-	1.895	Dec 2020	-		-		-		-	Continuing	Continuing	-
Predator/Reaper Off-board Sensing and Improved Targeting (PROSIT)	SS/CPFF	Various : Various, OH	-	0.047	Jul 2021	-		-		-		-	Continuing	Continuing	-
AgilePod	SS/CPFF	Various : Various	-	5.469	May 2021	-		-		-		-	Continuing	Continuing	-
COARPS Compliant Detection Removal and Characterization (DRACO)	SS/CPFF	Lockheed Martin : Goodyear, AZ	-	0.351	Mar 2021	-		-		-		-	Continuing	Continuing	-
Automated Electro-Optical Mobile Target Classification Deep Learning	SS/CPFF	Ball Aerospace : Dayton, OH	-	2.640	Apr 2021	0.811	Mar 2022	-		-		-	Continuing	Continuing	-
Aether Spy	SS/CPFF	Various : Various	-	0.422	Sep 2021	-		-		-		-	Continuing	Continuing	-
MOTIF	SS/CPFF	SRI : Ann Arbor, MN	-	1.300	Apr 2021	0.902	Sep 2022	-		-		-	Continuing	Continuing	-
Real Time Turbulence Mitigation	SS/CPFF	Centauri : Chantilly, VA	-	0.230	Apr 2021	0.000	Dec 2021	-		-		-	Continuing	Continuing	-
AUTOMATE	SS/CPFF	SRI : Ann Arbor, MN	-	1.150	Apr 2021	0.279	Sep 2022	-		-		-	Continuing	Continuing	-
MICPREP	SS/CPFF	General Dynamics : Bloomington, MN	-	0.000	Sep 2021	0.725	Jun 2022	2.029	Nov 2022	-		2.029	Continuing	Continuing	-
LIDAR for Mid to High Alt	SS/CPFF	Ball Aerospace : Dayton, OH	-	0.600	Aug 2021	-		-		-		-	Continuing	Continuing	-
Multi ATR	SS/CPFF	BAE Systems : Durham, NC	-	0.400	Sep 2021	-		-		-		-	Continuing	Continuing	-
MAGIC Heat	SS/CPFF	BAE Systems : Durham, NC	-	-		0.897	Mar 2022	2.000	Jan 2023	-		2.000	Continuing	Continuing	-
RAINGOD	SS/CPFF	Northrop Grumman : Dayton, OH	-	-		2.250	Apr 2022	0.750	Jan 2023	-		0.750	Continuing	Continuing	-
BirdBox V2 ATR in HCE	SS/CPFF	Various : Dayton, OH	-	-		1.596	Feb 2022	1.910	Nov 2022	-		1.910	Continuing	Continuing	-

Exhibit R-3, RDT&E Project Cost Analysis: PB 2023 Air Force		Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 644818 / *Imaging and Targeting Support*

Product Development ($ in Millions)

Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	FY 2021 Cost	FY 2021 Award Date	FY 2022 Cost	FY 2022 Award Date	FY 2023 Base Cost	FY 2023 Base Award Date	FY 2023 OCO Cost	FY 2023 OCO Award Date	FY 2023 Total Cost	Cost To Complete	Total Cost	Target Value of Contract
Auto On-board GEOINT ATR and SIGINT Sensor Fusion	SS/CPFF	Lockheed Martin : Arlington, VA	-	-		2.000	Apr 2022	0.770	Nov 2022	-		0.770	Continuing	Continuing	-
STORM	SS/CPFF	Raytheon : McKinney, TX	-	-		1.427	Jun 2022	3.426	Nov 2022	-		3.426	Continuing	Continuing	-
New FY22 Technology Efforts (Prioritized by GCWG)	C/CPAF	Various : TBD	-	-		1.808	Apr 2022	-		-		-	Continuing	Continuing	-
New FY23 Technology Efforts (Prioritized by GCWG)	Various	Various : TBD	-	-		-		0.301	Dec 2022	-		0.301	Continuing	Continuing	-
		Subtotal	-	14.522		12.695		11.186		-		11.186	Continuing	Continuing	N/A

Management Services ($ in Millions)

Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	FY 2021 Cost	FY 2021 Award Date	FY 2022 Cost	FY 2022 Award Date	FY 2023 Base Cost	FY 2023 Base Award Date	FY 2023 OCO Cost	FY 2023 OCO Award Date	FY 2023 Total Cost	Cost To Complete	Total Cost	Target Value of Contract
PMA: Other Govt Cost	Various	Various : Dayton, OH	-	2.546	Mar 2021	1.946	Nov 2021	2.125	Dec 2022	-		2.125	Continuing	Continuing	-
		Subtotal	-	2.546		1.946		2.125		-		2.125	Continuing	Continuing	N/A

	Prior Years	FY 2021		FY 2022		FY 2023 Base		FY 2023 OCO		FY 2023 Total	Cost To Complete	Total Cost	Target Value of Contract
Project Cost Totals	-	17.068		14.641		13.311		-		13.311	Continuing	Continuing	N/A

Remarks

Exhibit R-4, RDT&E Schedule Profile: PB 2023 Air Force		Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 644818 / *Imaging and Targeting Support*

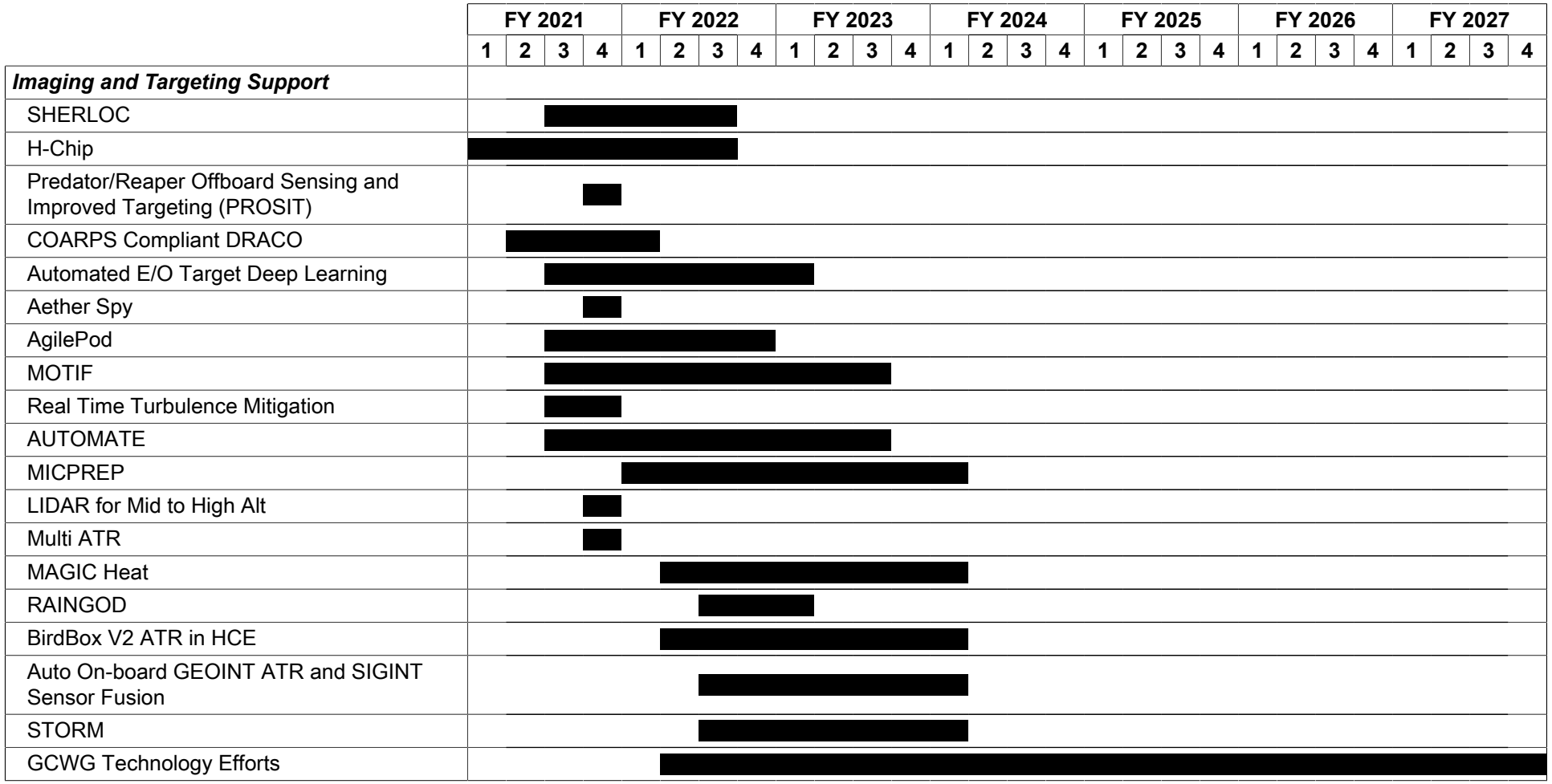

Exhibit R-4A, RDT&E Schedule Details: PB 2023 Air Force		Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 644818 / *Imaging and Targeting Support*

Schedule Details

	Start		End	
Events by Sub Project	**Quarter**	**Year**	**Quarter**	**Year**
Imaging and Targeting Support				
SHERLOC	3	2021	3	2022
H-Chip	1	2021	3	2022
Predator/Reaper Offboard Sensing and Improved Targeting (PROSIT)	4	2021	4	2021
COARPS Compliant DRACO	2	2021	1	2022
Automated E/O Target Deep Learning	3	2021	1	2023
Aether Spy	4	2021	4	2021
AgilePod	3	2021	4	2022
MOTIF	3	2021	3	2023
Real Time Turbulence Mitigation	3	2021	4	2021
AUTOMATE	3	2021	3	2023
MICPREP	1	2022	1	2024
LIDAR for Mid to High Alt	4	2021	4	2021
Multi ATR	4	2021	4	2021
MAGIC Heat	2	2022	1	2024
RAINGOD	3	2022	1	2023
BirdBox V2 ATR in HCE	2	2022	1	2024
Auto On-board GEOINT ATR and SIGINT Sensor Fusion	3	2022	1	2024
STORM	3	2022	1	2024
GCWG Technology Efforts	2	2022	4	2027

Exhibit R-2A, RDT&E Project Justification: PB 2023 Air Force			Date: April 2022
Appropriation/Budget Activity 3600 / 4	R-1 Program Element (Number/Name) PE 0604257F / *Advanced Technology and Sensors*	Project (Number/Name) 645148 / *Common Airborne Sense and Avoid (C-ABSAA)*	

COST ($ in Millions)	Prior Years	FY 2021	FY 2022	FY 2023 Base	FY 2023 OCO	FY 2023 Total	FY 2024	FY 2025	FY 2026	FY 2027	Cost To Complete	Total Cost
645148: *Common Airborne Sense and Avoid (C-ABSAA)*	-	8.833	9.104	0.000	0.000	0.000	0.000	0.000	0.000	0.000	Continuing	Continuing
Quantity of RDT&E Articles	-	-	-	-	-	-	-	-	-	-		

A. Mission Description and Budget Item Justification

The Common-Airborne Sense and Avoid (C-ABSAA) project provides Group 4 and 5 Remotely Piloted Aircraft (RPA) with the ability to safely and effectively operate in all classes of airspace worldwide. The C-ABSAA project acts as a replacement for the sense and avoid capability of the pilot on board a manned aircraft.

The Air Force is pursuing a software intensive approach to maintain safe separation, avoid collisions, and provide the ability to safely integrate with other airspace users. The software solutions identified in this Information System Capability Development Document (IS-CDD) are open and modular and accept inputs from any type of sensor or data link and will operate any legacy and future Group 4 and 5 RPA. The effort includes technology maturation, risk reduction, and software processes and initiatives, such as: 1) prototyping activities, 2) system integration, test and implementation of software, 3) development of open system architecture using modular design, standards-based interfaces, and widely-supported consensus-based standards, 4) development of model based system engineering processes, standards and documentation and, 5) collaboration with the Federal Aviation Agency (FAA), National Aeronautics and Space Administration (NASA), and other services to develop national policy and standards.

The program element may include necessary civilian pay expenses required to manage, execute, and deliver technology and sensor capabilities. The use of such program funds would be in addition to the civilian pay expenses budgeted in program element 0605831F.

B. Accomplishments/Planned Programs ($ in Millions)	FY 2021	FY 2022	FY 2023
Title: Sense and Avoid (SAA)-Related Activities	8.833	9.104	0.000
Description: Conduct risk reduction and prototyping activities to improve affordability, reduce cost, schedule and technical risk entering next milestone. Received Joint Staff approval of Information Systems CDD requirements. C-ABSAA uses an iterative and incremental approach to design, code, integrate, test and implement high quality software in a cost effective and timely manner. The software utilizes Open System Architecture (OSA) design, COTS, Application Programming Interfaces (APIs), and maximum software and interface module independence. Program will also develop and certify Government simulation tools and equipment. ***FY 2022 Plans:*** FY 2022 Plans: - Complete and close remaining C-ABSAA Technology Maturation & Risk Reduction actions to posture for future efforts			

Exhibit R-2A, RDT&E Project Justification: PB 2023 Air Force		Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 645148 / *Common Airborne Sense and Avoid (C-ABSAA)*

B. Accomplishments/Planned Programs ($ in Millions)	FY 2021	FY 2022	FY 2023
- Complete review and acceptance of Technical Data Package - Allocate remaining funds to expedite existing projects or start new projects within the Advanced Technology & Sensors program under the Imaging and Targeting Support project ***FY 2023 Plans:*** - Program strategically paused. Funding transferred to United States Air Force higher priority needs. ***FY 2022 to FY 2023 Increase/Decrease Statement:*** Funding transferred to United States Air Force higher priority needs.			
Accomplishments/Planned Programs Subtotals	8.833	9.104	0.000

C. Other Program Funding Summary ($ in Millions)

N/A

Remarks

D. Acquisition Strategy

Program strategically paused. Pre-milestone B information archived for future use when needed.

Exhibit R-3, RDT&E Project Cost Analysis: PB 2023 Air Force			Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 645148 / *Common Airborne Sense and Avoid (C-ABSAA)*	

Product Development ($ in Millions)

Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	FY 2021 Cost	FY 2021 Award Date	FY 2022 Cost	FY 2022 Award Date	FY 2023 Base Cost	FY 2023 Base Award Date	FY 2023 OCO Cost	FY 2023 OCO Award Date	FY 2023 Total Cost	Cost To Complete	Total Cost	Target Value of Contract
C-ABSAA Technology Development	C/Various	Various : Various	-	4.113	Nov 2020	4.104	Dec 2021	-		-		-	0.000	8.217	-
		Subtotal	-	4.113		4.104		-		-		-	0.000	8.217	N/A

Management Services ($ in Millions)

Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	FY 2021 Cost	FY 2021 Award Date	FY 2022 Cost	FY 2022 Award Date	FY 2023 Base Cost	FY 2023 Base Award Date	FY 2023 OCO Cost	FY 2023 OCO Award Date	FY 2023 Total Cost	Cost To Complete	Total Cost	Target Value of Contract
Program Management Administration (PMA)	Various	Various : Various	-	4.720	Oct 2020	5.000	Dec 2021	-		-		-	0.000	9.720	-
		Subtotal	-	4.720		5.000		-		-		-	0.000	9.720	N/A

	Prior Years	FY 2021		FY 2022		FY 2023 Base		FY 2023 OCO		FY 2023 Total	Cost To Complete	Total Cost	Target Value of Contract
Project Cost Totals	-	8.833		9.104		-		-		-	0.000	17.937	N/A

Remarks

Program strategically paused. FY23 funding transferred to United States Air Force higher priority needs.

Exhibit R-4, RDT&E Schedule Profile: PB 2023 Air Force		Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 645148 / *Common Airborne Sense and Avoid (C-ABSAA)*

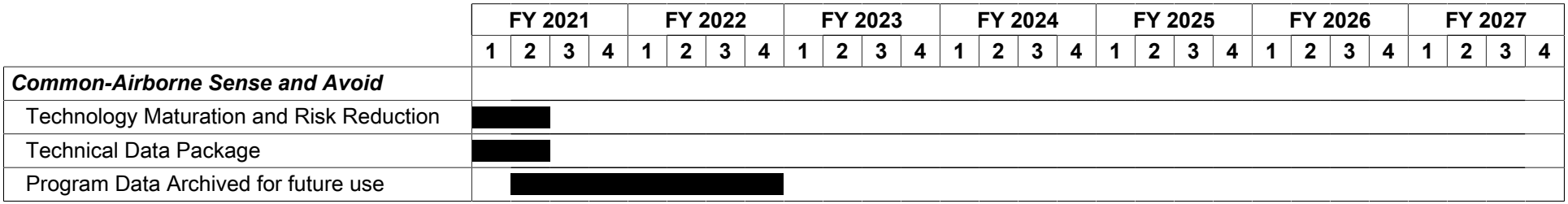

Exhibit R-4A, RDT&E Schedule Details: PB 2023 Air Force		Date: April 2022
Appropriation/Budget Activity 3600 / 4	**R-1 Program Element (Number/Name)** PE 0604257F / *Advanced Technology and Sensors*	**Project (Number/Name)** 645148 / *Common Airborne Sense and Avoid (C-ABSAA)*

Schedule Details

	Start		End	
Events by Sub Project	**Quarter**	**Year**	**Quarter**	**Year**
Common-Airborne Sense and Avoid				
Technology Maturation and Risk Reduction	1	2021	2	2021
Technical Data Package	1	2021	2	2021
Program Data Archived for future use	2	2021	4	2022