

**UNCLASSIFIED**

**Exhibit R-2, RDT&E Budget Item Justification:** PB 2023 Army **Date:** April 2022

<b>Appropriation/Budget Activity</b> 2040: <i>Research, Development, Test &amp; Evaluation, Army / BA 4: Advanced Component Development &amp; Prototypes (ACD&amp;P)</i>	<b>R-1 Program Element (Number/Name)</b> PE 0603308A / <i>Army Space Systems Integration</i>
---	---

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	-	25.584	25.755	17.945	-	17.945	19.087	19.511	19.515	19.706	0.000	147.103
990: <i>Space And Missile Defense Integration</i>	-	25.584	25.755	17.945	-	17.945	19.087	19.511	19.515	19.706	0.000	147.103

**A. Mission Description and Budget Item Justification**

USASMD/ARSTRAT: Headquarters, Department of the Army General Order 37, dated 16 October 2006, designated USASMD/ARSTRAT as the Army proponent for space, the Army integrator for global missile defense (GMD), and the Army Service Component Command (ASCC) of the USSTRATCOM. Army Regulation (AR) 10-87, Army Commands, Army Service Component Commands, and Direct Reporting Units, dated 4 September 2007, and AR 5-22, The Army Force Modernization Proponent System, dated 19 August 2009, designated USASMD/ARSTRAT as the Army specified proponent for Space/High Altitude capabilities. As the Army proponent for space and high altitude, USASMD/ARSTRAT is responsible for developing warfighting concepts, conduct warfighting experiments to validate those concepts, identify capabilities needed to implement the validated concepts, and develop Doctrine, Organizations, Training, Material, Leadership & Education, Personnel, Facilities and Policy (DOTMLPF-P) solutions.

The Friendly Force Data Integration and Management (FFDIM) Capability Definition Package (CDP), a Joint Capabilities Integration and Development System (JCIDS) requirements document (October 2017) validated the Joint Friendly Force Tracking (JFFT) Testbed's development, testing and integration capabilities and Friendly Force Tracking (FFT) System Expert support provided by U.S. Army Space and Missile Defense Command (USASMD) as U.S. Strategic Command's (USSTRATCOM's) Army Service Component Command (ASCC). In addition, Chairman of the Joint Chiefs of Staff Instruction 3910 (FFT Operations Guidance) directs USSTRATCOM's ASCC to execute eight specified FFT mission support responsibilities that include providing a testing and development capability to support joint, interagency and coalition partners FFT operations. USASMD/ARSTRAT: Headquarters, Department of the Army General Order 37, dated 16 October 2006, designated USASMD/ARSTRAT as the Army proponent for space, the Army integrator for global missile defense (GMD), and the Army Service Component Command (ASCC) of the USSTRATCOM. Army Regulation (AR) 10-87, Army Commands, Army Service Component Commands, and Direct Reporting Units, dated 4 September 2007, and AR 5-22, The Army Force Modernization Proponent System, dated 19 August 2009, designated USASMD/ARSTRAT as the Army specified proponent for Space/High Altitude capabilities. As the Army proponent for space and high altitude, USASMD/ARSTRAT is responsible for developing warfighting concepts, conduct warfighting experiments to validate those concepts, identify capabilities needed to implement the validated concepts, and develop Doctrine, Organizations, Training, Material, Leadership & Education, Personnel, Facilities and Policy (DOTMLPF-P) solutions.

**UNCLASSIFIED**

**Exhibit R-2, RDT&E Budget Item Justification:** PB 2023 Army **Date:** April 2022

<b>Appropriation/Budget Activity</b> 2040: <i>Research, Development, Test &amp; Evaluation, Army / BA 4: Advanced Component Development &amp; Prototypes (ACD&amp;P)</i>	<b>R-1 Program Element (Number/Name)</b> PE 0603308A / <i>Army Space Systems Integration</i>
---	---

<b>B. Program Change Summary (\$ in Millions)</b>	<b>FY 2021</b>	<b>FY 2022</b>	<b>FY 2023 Base</b>	<b>FY 2023 OCO</b>	<b>FY 2023 Total</b>
Previous President's Budget	25.584	18.755	0.000	-	0.000
Current President's Budget	25.584	25.755	17.945	-	17.945
Total Adjustments	0.000	7.000	17.945	-	17.945
• Congressional General Reductions	-	-			
• Congressional Directed Reductions	-	-			
• Congressional Rescissions	-	-			
• Congressional Adds	-	7.000			
• Congressional Directed Transfers	-	-			
• Reprogrammings	-	-			
• SBIR/STTR Transfer	-	-			
• Adjustments to Budget Years	-	-	17.945	-	17.945

**Congressional Add Details (\$ in Millions, and Includes General Reductions)**

**Project:** 990: *Space And Missile Defense Integration*

    Congressional Add: *Multi Function and Multi Mission Payload*

    Congressional Add: *Communications Resiliency Arrays of Distributed Local Elements (CRADLE)*

Congressional Add Subtotals for Project: 990

Congressional Add Totals for all Projects

	<b>FY 2021</b>	<b>FY 2022</b>
	-	2.000
	-	5.000
Congressional Add Subtotals for Project: 990	-	7.000
Congressional Add Totals for all Projects	-	7.000

**Change Summary Explanation**

FY 2023 funding increase reflects the fact that the FY 2022 President's Budget request did not include out-year funding.

**UNCLASSIFIED**

<b>Exhibit R-2A, RDT&amp;E Project Justification:</b> PB 2023 Army										<b>Date:</b> April 2022		
<b>Appropriation/Budget Activity</b> 2040 / 4					<b>R-1 Program Element (Number/Name)</b> PE 0603308A / Army Space Systems Integration				<b>Project (Number/Name)</b> 990 / Space And Missile Defense Integration			
<b>COST (\$ in Millions)</b>	<b>Prior Years</b>	<b>FY 2021</b>	<b>FY 2022</b>	<b>FY 2023 Base</b>	<b>FY 2023 OCO</b>	<b>FY 2023 Total</b>	<b>FY 2024</b>	<b>FY 2025</b>	<b>FY 2026</b>	<b>FY 2027</b>	<b>Cost To Complete</b>	<b>Total Cost</b>
990: Space And Missile Defense Integration	-	25.584	25.755	17.945	-	17.945	19.087	19.511	19.515	19.706	0.000	147.103
Quantity of RDT&E Articles	-	-	-	-	-	-	-	-	-	-		

**A. Mission Description and Budget Item Justification**

This Program Element (PE) funds the Force Development activities of the United States Army Space and Missile Defense Command (USASMDC) Space and Missile Defense Center of Excellence (SMDCoE). The SMDCoE is the warfighting function lead and Department of the Army force modernization proponent for integration of current and future Space and High Altitude (SHA) systems to enable Army forces on the battlefield. The SMDCoE workforce supports the research and doctrine development from one of the SMDCoE principle locations in Huntsville, AL; Colorado Springs, CO; and Joint Base Langley-Eustis. As the Army proponent for SHA, the SMDCoE is responsible for developing warfighting concepts, identifying and validating needed capabilities, conducting warfighting experiments, and developing Doctrine, Organizations, Training, Material, Leadership & Education, Personnel, Facilities and Policy (DOTMLPF-P) solutions for the Army to leverage the SHA domains in support of Army operations. The SMDCoE focuses on providing solutions for capability gaps of land domain forces in a multi-domain battle environment in two ways: First, by leveraging the benefits of the SHA domains to enable decentralized land force operations in support of the Army's mission command philosophy; and second by delivering synchronized capabilities from, through and into the space domain in direct support of land domain forces. Effective integration of SHA capabilities enable the application of strategic land power and execution of Multi-Domain Operations (MDO). Additionally, SHA capabilities anchor the Army's ability to penetrate and disintegrate enemy anti-access and area denial (A2AD) systems and exploit the resultant freedom of maneuver to achieve strategic objectives and force a return to competition on favorable terms. Under the direction of an experienced member of the Senior Executive Service (SES), the SMDCoE receives guidance from the USASMDC Commanding General and works in close coordination with the Army Combined Arms Center, Army Futures Command, the United States Strategic Command, the United States Space Command the Missile Defense Agency.

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

	<b>FY 2021</b>	<b>FY 2022</b>	<b>FY 2023</b>
<b>Title:</b> Architecture Development, War games and Demonstrations	11.651	10.179	10.240
<b>Description:</b> Perform Army Force Modernization Responsibilities for the SHA Altitude Domains.			
<b>FY 2022 Plans:</b> USASMDC Space and Missile Defense Center of Excellence (SMDCoE) will continue the full spectrum of JCIDS concept to capability development efforts to enhance the resiliency and effectiveness of critical space-based and space enabled assets and JCIDS capability development activities for space superiority, theater missile warning, high altitude, and emerging concepts/technology for the full range of Navigation Warfare, tactical space layer, hypersonics, counter hypersonics, and directed energy. SMDCoE will participate in robust campaign of learning with the Army, Army Futures Command, Joint and sister service wargaming, experimentation, live prototyping, studies, assessments, and exercises to learn, validate, develop, and integrate the concepts and technology described above. SMDCoE will provide support to PEO IEWS and PEO M&S to acquire and field space			

**UNCLASSIFIED**

<b>Exhibit R-2A, RDT&amp;E Project Justification:</b> PB 2023 Army		<b>Date:</b> April 2022		
<b>Appropriation/Budget Activity</b> 2040 / 4	<b>R-1 Program Element (Number/Name)</b> PE 0603308A / Army Space Systems Integration	<b>Project (Number/Name)</b> 990 / Space And Missile Defense Integration		
<b>B. Accomplishments/Planned Programs (\$ in Millions)</b>		<b>FY 2021</b>	<b>FY 2022</b>	<b>FY 2023</b>
<p>superiority and enhanced missile warning capabilities. USASMDC Space and Missile Defense Center of Excellence (SMDCoE) will execute these funds in FY 2022.</p> <p><b>FY 2023 Plans:</b> Continue to develop concepts, transition technologies, and provide acquisition support for SHA technologies to assure uninterrupted access to space based technologies and leverage the capabilities provided for Army force operations on the battlefield.</p> <p><b>FY 2022 to FY 2023 Increase/Decrease Statement:</b> Adjustment to economic assumptions.</p>				
<p><b>Title:</b> Joint Friendly Force Tracking (J-FFT) Testbed</p> <p><b>Description:</b> Development and deployment of J-FFT capabilities.</p> <p><b>FY 2022 Plans:</b> J-FFT Testbed supports SMDC Force Tracking Mission Management Center (FT MMC) Special Operations Command (SOCOM) Africa Command (AFRICOM) Air Force Rapid Capabilities Office (AF RCO) Joint Staff J6 and other U.S. Government agencies by providing agile capability development and integrated solutions to validated requirements that enable interoperable force tracking data exchange and satisfy joint, agency and coalition warfighting needs for timely, accurate Common Operational Picture (COP) displays and decision making. JFFT development will continue to respond to the growth in FFT device use by enabling the number of device types, data types, and displays supported by the various FFT and HF TTL data architectures. The JFFT Testbed is scheduled to develop and deliver new capabilities for added functionality in data visualization and management. JFFT will continue to exploit, expand and provide mission owners with approved infrastructures at all classification levels that achieve improved performance and reduce costs. JFFT Testbed will remain a key contributor to support North Atlantic Treaty Organization Capability Team activities and other coalition assessments and exercises that advance US and coalition FFT interoperability. USASMDC Space and Missile Defense Center of Excellence (SMDCoE) will execute these funds in FY 2022.</p> <p><b>FY 2023 Plans:</b> J-FFT will continue to exploit, expand and provide mission owners with approved infrastructures at all classification levels that achieve improved performance and reduce costs. Ensure J-FFT technologies remain a key contributor to support coalition assessments and exercises that advancing US and allies FFT interoperability.</p> <p><b>FY 2022 to FY 2023 Increase/Decrease Statement:</b> Efficiencies and cost savings measures are expected to result in an approximate 8.5% reduction in J-FFT testbed funding levels from FY2022.</p>		3.170	3.498	3.200
<p><b>Title:</b> Organizational Development as Part of the SRC40 Proponecy Mission</p>		2.853	2.567	2.355

**UNCLASSIFIED**

<b>Exhibit R-2A, RDT&amp;E Project Justification:</b> PB 2023 Army		<b>Date:</b> April 2022		
<b>Appropriation/Budget Activity</b> 2040 / 4	<b>R-1 Program Element (Number/Name)</b> PE 0603308A / Army Space Systems Integration	<b>Project (Number/Name)</b> 990 / Space And Missile Defense Integration		
<b>B. Accomplishments/Planned Programs (\$ in Millions)</b>		<b>FY 2021</b>	<b>FY 2022</b>	<b>FY 2023</b>
<p><b>Description:</b> Provide PNT/NAVWAR capability development support for the Army.</p> <p><b>FY 2022 Plans:</b> Continue to participate in the Force Design Update (FDU) process. The U.S. Army Space and Missile Defense Command (USASMDC) Space and Missile Defense Center of Excellence (SMDCoE) will participate in the recurring process used to gain HQDA approval of organizational structure changes and designs through the FDU and FDU Jr. processes. This includes the development of Operational &amp; Organizational Concept Papers, Organization Design Papers, Cost Benefit Analyses, Unit Reference Sheets, and Manpower Requirements Criteria determination. Participate in the Total Army Analysis (TAA), the Army's annual process to examine the projected Army force qualitatively and quantitatively. USASMDC will support TAA Rule of Allocation development, Capability Demand Analysis and Resourcing phases to ensure SRC40 units are properly accounted for in the future Program Objectives Memorandum (POM) Force. This is performed to analyze the projected Army Force against future demands and levels of funding/authorizations to build the POM Force. USASMDC SMDCoE will review the USASMDC Troops, Organization and Equipment (TOE) requirements documents conducted as part of a cyclic process as well when needed during other Force Design processes (i.e.-Basis of Issue Plan (BOIP) Modernization Path (MODPATH) reviews, Notification of Change reviews, SSN-LIN Automated Management and Integrating System (SLAMIS) reviews, etc.). Participate in BOIP Development. BOIP Development is collection of processes including the cyclic review of Army-wide BOIPs under development, development of Feeder Data for USASMDC proponent item BOIPs, and validation of BOIP MODPATHs to USASMDC TOEs. Complete the Space Forces Force Structure Review which is a Cost-Benefit Analysis-like structured three-phased process consisting of a Needs Analysis, Gap Analysis, and Solutions Analysis to identify and document organizational based capability needs and gaps, develop a prioritized list of those gaps, and identify potential materiel and/or non-materiel solutions.</p> <p>U.S. Army Space and Missile Defense Command (USASMDC) Space and Missile Defense Center of Excellence (SMDCoE) will execute these funds in FY 2022.</p> <p><b>FY 2023 Plans:</b> Continue to identify, develop, integrate and provide the Assured-Positioning, Navigation, and Timing (A-PNT) Cross Functional Team to guide development and fielding of capabilities to achieve the PNT overmatch necessary to support future Army operations.</p> <p><b>FY 2022 to FY 2023 Increase/Decrease Statement:</b> Efficiencies and cost savings measures are expected to result in an approximate 8% reduction in Organizational Development efforts from FY2022.</p>				
<b>Title:</b> Position, Navigation, and Timing Navigation Warfare (PNT/NAVWAR)		3.033	2.157	2.150

**UNCLASSIFIED**

<b>Exhibit R-2A, RDT&amp;E Project Justification:</b> PB 2023 Army		<b>Date:</b> April 2022
<b>Appropriation/Budget Activity</b> 2040 / 4	<b>R-1 Program Element (Number/Name)</b> PE 0603308A / Army Space Systems Integration	<b>Project (Number/Name)</b> 990 / Space And Missile Defense Integration

<b>B. Accomplishments/Planned Programs (\$ in Millions)</b>	<b>FY 2021</b>	<b>FY 2022</b>	<b>FY 2023</b>
<p><b>Description:</b> Requirement supports the SMDCoE responsibility to provide space and high altitude modeling and simulations, and resources underlying operating expenses and support.</p> <p><b>FY 2022 Plans:</b> Based on the results of our efforts in 2021 the USASMDC Space and Missile Defense Center of Excellence will continue to identify and advocate for PNT and NAVWAR emerging requirements through Commander, U.S. Strategic Command to the joint staff to establish and formalize joint NAVWAR requirements, in the JCIDS process. Support the Army Assured Positioning Navigation and Timing (APNT) Cross Functional Team by conducting required capability analysis and developing JCIDS documents for APNT Enabling systems and APNT Situational Awareness. Specific actions planned are</p> <ul style="list-style-type: none"> <li>* Write Alternate Navigation Concept of Operations</li> <li>* Support planning and execution of Lonestar Development Operations</li> <li>* Support planning and execution of Alternate Navigation Development Operations</li> <li>* Write and coordinate Gunsmoke requirements document</li> <li>* Write and coordinate Lonestar requirements document</li> <li>* Document Alternate Navigation requirements</li> <li>* Obtain input from the NAVWAR Community of Interest and write NAVWAR Attack CONOPS</li> <li>* Support execution of NAVWAR Attack Study</li> <li>* Facilitate inclusion of NAVWAR Attack systems in Army experiment, exercises, war games and other events to build knowledge about the Army need for this capability</li> <li>* Write and coordinate NAVWAR Attack requirements document</li> <li>* Identify how NAVWAR Attack concepts and capabilities will Multi-Domain operations</li> <li>* Provide NAVWAR and space subject matter expertise to help develop Fires Organizational and Operational Concept Document</li> <li>* Furnish NAVWAR subject matter expertise to support revision of Space Brigade Organizational and Operational Concept Division</li> <li>* Conduct analysis to determine if the fielding of a candidate NAVWAR technology would drive organizational changes</li> </ul> <p>U.S. Army Space and Missile Defense Command (USASMDC) Space and Missile Defense Center of Excellence (SMDCoE) will execute these funds in FY 2022.</p> <p><b>FY 2023 Plans:</b> Continue to support modeling and simulation, operational analysis and overarching operations to test and provide analytical rigor behind space and high altitude concepts and capability development.</p> <p><b>FY 2022 to FY 2023 Increase/Decrease Statement:</b></p>			

**UNCLASSIFIED**

<b>Exhibit R-2A, RDT&amp;E Project Justification:</b> PB 2023 Army		<b>Date:</b> April 2022
<b>Appropriation/Budget Activity</b> 2040 / 4	<b>R-1 Program Element (Number/Name)</b> PE 0603308A / Army Space Systems Integration	<b>Project (Number/Name)</b> 990 / Space And Missile Defense Integration

<b>B. Accomplishments/Planned Programs (\$ in Millions)</b>	<b>FY 2021</b>	<b>FY 2022</b>	<b>FY 2023</b>
Army Position, Navigation, and Timing Navigation Warfare (PNT/NAVWAR) funding in this program remains essentially unchanged from FY22 at less than a 0.3% decrease in FY2023.			
<b>Title:</b> APNT Integrated Space Communications <b>Description:</b> Development of a unique advanced space communications capability to explore advanced ground based space communications technologies and concepts utilizing bi-static Radio Frequency (RF) scattering and propagation with precision frequency, phase, and power management. This space communications capability will develop and demonstrate multiple advanced Army LEO space communications concepts and will also assess interfacing with multiple Joint Service space communication missions.	4.877	-	-
<b>Title:</b> SBIR/STTR Transfer <b>Description:</b> Funding transferred in accordance with Title 15 USC ?638 <b>FY 2022 Plans:</b> Funding transferred in accordance with Title 15 USC ?638 <b>FY 2022 to FY 2023 Increase/Decrease Statement:</b> Funding transferred in accordance with Title 15 USC ?638	-	0.354	-
<b>Accomplishments/Planned Programs Subtotals</b>	25.584	18.755	17.945

	<b>FY 2021</b>	<b>FY 2022</b>
<b>Congressional Add:</b> Multi Function and Multi Mission Payload <b>FY 2022 Plans:</b> This project will develop a low-cost multi-function multi-mission SAR sensor payload that can be used to provide SAR imagery for multiple mission functions including weather prediction, mission planning and other tactical and strategic operations. Project will result in a design of LEO satellite to provide high resolution, multi-spectral imagery of cloud cover, including sensor, orbital configuration and down linked high resolution multi-spectral capability for multiple missions.	-	2.000
<b>Congressional Add:</b> Communications Resiliency Arrays of Distributed Local Elements (CRADLE) <b>FY 2022 Plans:</b> CRADLE is a new bi-static communications and radar system that uses Army developed technologies to form distributed arrays using networks of local elements in theater. The successful implementation will leverage not only new advancements in beam-forming but also the Army's investment in portable communication systems.	-	5.000
<b>Congressional Adds Subtotals</b>	-	7.000

UNCLASSIFIED

Exhibit R-2A, RDT&E Project Justification: PB 2023 Army		Date: April 2022
Appropriation/Budget Activity 2040 / 4	R-1 Program Element (Number/Name) PE 0603308A / Army Space Systems Integration	Project (Number/Name) 990 / Space And Missile Defense Integration

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

N/A

**Remarks**

SMDCoE space and high altitude capability development efforts have a natural association and linkage with Army Strategic Missile Defense (SMD) capability development also performed within the SMDCoE. Emerging space and high altitude technologies and concepts often influence SMD identification, tracking and response.

**D. Acquisition Strategy**

N/A

**UNCLASSIFIED**

Exhibit R-3, RDT&E Project Cost Analysis: PB 2023 Army												Date: April 2022			
Appropriation/Budget Activity				R-1 Program Element (Number/Name)				Project (Number/Name)							
2040 / 4				PE 0603308A / Army Space Systems Integration				990 / Space And Missile Defense Integration							
<b>Management Services (\$ in Millions)</b>				FY 2021		FY 2022		FY 2023 Base		FY 2023 OCO		FY 2023 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Government Personnel and Operations support	TBD	SMDC/ARSTRAT : Huntsville, AL and Colorado Springs,	-	17.537		18.401		14.745		-		14.745	Continuing	Continuing	-
SBIR/STTR Transfer	TBD	Various : Various	-	-		0.354		-		-		-	0.000	0.354	-
<b>Subtotal</b>			-	17.537		18.755		14.745		-		14.745	Continuing	Continuing	N/A
<b>Product Development (\$ in Millions)</b>				FY 2021		FY 2022		FY 2023 Base		FY 2023 OCO		FY 2023 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
APNT Integrated Space Communications	TBD	Various : Huntsville AL, Wilmington, MA, Boulder CO, VA	-	4.877		-		-		-		-	0.000	4.877	-
Communications Resiliency Arrays of Distributed Local Elements (CRADLE) (CA)	TBD	SMDC : Various	-	-		5.000		-		-		-	0.000	5.000	-
Multi-Function and Multi-Mission Payload	TBD	Various : Various	-	-		2.000		-		-		-	0.000	2.000	-
<b>Subtotal</b>			-	4.877		7.000		-		-		-	0.000	11.877	N/A
<b>Support (\$ in Millions)</b>				FY 2021		FY 2022		FY 2023 Base		FY 2023 OCO		FY 2023 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
J-FFT Testbed and Development	TBD	SMDC/ARSTRAT : Colorado Springs, CO	-	3.170		-		3.200		-		3.200	0.000	6.370	-
<b>Subtotal</b>			-	3.170		-		3.200		-		3.200	0.000	6.370	N/A

**UNCLASSIFIED**

<b>Exhibit R-3, RDT&amp;E Project Cost Analysis: PB 2023 Army</b>								<b>Date: April 2022</b>			
<b>Appropriation/Budget Activity</b> 2040 / 4				<b>R-1 Program Element (Number/Name)</b> PE 0603308A / Army Space Systems Integration				<b>Project (Number/Name)</b> 990 / Space And Missile Defense Integration			
	<b>Prior Years</b>	<b>FY 2021</b>	<b>FY 2022</b>	<b>FY 2023 Base</b>	<b>FY 2023 OCO</b>	<b>FY 2023 Total</b>	<b>Cost To Complete</b>	<b>Total Cost</b>	<b>Target Value of Contract</b>		
<b>Project Cost Totals</b>	-	25.584	25.755	17.945	-	17.945	Continuing	Continuing	N/A		

**Remarks**

**UNCLASSIFIED**

<b>Exhibit R-4, RDT&amp;E Schedule Profile: PB 2023 Army</b>		<b>Date:</b> April 2022
<b>Appropriation/Budget Activity</b> 2040 / 4	<b>R-1 Program Element (Number/Name)</b> PE 0603308A / Army Space Systems Integration	<b>Project (Number/Name)</b> 990 / Space And Missile Defense Integration

Event Name	FY 2021				FY 2022				FY 2023				FY 2024				FY 2025				FY 2026				FY 2027			
	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
Space Superiority Capability Development	[Redacted]																											
Counter ISR Capability Development	[Redacted]																											
Space Operations Multit-Domain Environment Analysis	[Redacted]																											
Multi-Domain Task Force (MTDF) Multi-Domain Expeditionary Brigade (MD)	[Redacted]																											
High Altitude Impacts on Ground Effectiveness Study	[Redacted]																											
NAVWAR Characterization Study	[Redacted]																											
APNT CFT Analysis Support	[Redacted]																											
Joint Space Warfighting Forum (JSWF) Analysis Support	[Redacted]																											
Tactical Space Layer Sensor to Shooter Concept Development	[Redacted]																											
Low Earth Orbit	[Redacted]																											
Development of SMDC MMN Force Tracking	[Redacted]																											
Jericho Thunder Analysis Support	[Redacted]																											
SMDC NanoSat Analysis (SNAP, KE)	[Redacted]																											

**UNCLASSIFIED**

<b>Exhibit R-4, RDT&amp;E Schedule Profile: PB 2023 Army</b>		<b>Date:</b> April 2022
<b>Appropriation/Budget Activity</b> 2040 / 4	<b>R-1 Program Element (Number/Name)</b> PE 0603308A / Army Space Systems Integration	<b>Project (Number/Name)</b> 990 / Space And Missile Defense Integration

Event Name	FY 2021				FY 2022				FY 2023				FY 2024				FY 2025				FY 2026				FY 2027			
	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
Space Superiority Joint Architecture Analysis	[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]							
Force Design Assessment of Army Forces	[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]							
NAVWAR/PNT Gap Analysis and Advocacy	[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]							
Space Simulation Support to TRADOC ARCIC Experimentation	[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]							
NAVWAR Defense/Attack Operating Concepts and Requirements	[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]							
Army Enduring JFFT Development	[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]							
High Altitude Persistent Platform Capability Development Document	[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]							
APNT Integrated Space Communications	[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]				[Redacted]							

**UNCLASSIFIED**

<b>Exhibit R-4A, RDT&amp;E Schedule Details:</b> PB 2023 Army		<b>Date:</b> April 2022
<b>Appropriation/Budget Activity</b> 2040 / 4	<b>R-1 Program Element (Number/Name)</b> PE 0603308A / <i>Army Space Systems Integration</i>	<b>Project (Number/Name)</b> 990 / <i>Space And Missile Defense Integration</i>

Schedule Details

Events	Start		End	
	Quarter	Year	Quarter	Year
Space Superiority Capability Development	1	2021	4	2027
Counter ISR Capability Development	1	2021	4	2027
Space Operations Mult-Domain Environment Analysis	1	2021	4	2027
Multi-Domain Task Force (MTDF) Multi-Domain Expeditionary Brigade (MDEB) Study	3	2021	3	2023
High Altitude Impacts on Ground Effectiveness Study	1	2021	1	2021
NAVWAR Characterization Study	1	2021	1	2021
APNT CFT Analysis Support	1	2021	4	2027
Joint Space Warfighting Forum (JSWF) Analysis Support	1	2021	4	2027
Tactical Space Layer Sensor to Shooter Concept Development	3	2021	4	2027
Low Earth Orbit	1	2021	4	2021
Development of SMDC MMN Force Tracking	1	2021	4	2023
Jericho Thunder Analysis Support	1	2021	4	2024
SMDC NanoSat Analysis (SNAP, KE)	1	2021	4	2021
Space Superiority Joint Architecture Analysis	1	2021	4	2024
Force Design Assessment of Army Forces	1	2021	4	2027
NAVWAR/PNT Gap Analysis and Advocacy	1	2021	4	2025
Space Simulation Support to TRADOC ARCIC Experimentation	1	2021	4	2027
NAVWAR Defense/Attack Operating Concepts and Requirement	1	2021	4	2027
Army Enduring JFFT Development	1	2021	4	2027
High Altitude Persistent Platform Capability Development Documentation	1	2021	4	2027
APNT Integrated Space Communications	1	2021	4	2025