Exhibit R-2, RDT&E Budget Item Justification: PB 2025 Army											Date: March 2024	
Appropriation/Budget Activity 2040: *Research, Development, Test & Evaluation, Army I* BA 4: *Advanced Component Development & Prototypes (ACD&P)*					R-1 Program Element (Number/Name) PE 0604101A *I Small Unmanned Aerial Vehicle (SUAV) (6.4)*							
COST ($ in Millions)	**Prior Years**	**FY 2023**	**FY 2024**	**FY 2025 Base**	**FY 2025 OCO**	**FY 2025 Total**	**FY 2026**	**FY 2027**	**FY 2028**	**FY 2029**	**Cost To Complete**	**Total Cost**
Total Program Element	-	1.373	5.144	1.800	-	1.800	1.803	1.822	1.843	1.861	Continuing	Continuing
BR6: *Small Unmanned Aircraft System (6.4)*	-	1.373	5.144	1.800	-	1.800	1.803	1.822	1.843	1.861	Continuing	Continuing

A. Mission Description and Budget Item Justification

The Rucksack Portable Uncrewed Aircraft System (RPUAS) Family of Small Uncrewed Aircraft System (FoSUAS) requirements are transitioning to the Joint Small Uncrewed Aircraft System sUAS Capability Development Document (J-sUAS CDD) to solve current and emergent operational gaps. These systems provide battalion and below ground maneuver elements with critical situational awareness and enhanced force protection. The system provides an organic and responsive reconnaissance and targeting capability with real-time Full Motion Video and sensor data which is also available to inter-operable digital data linked systems, such as the One System Remote Video Terminal and manned platforms. The RPUAS FoSUAS includes the Short Range Reconnaissance (SRR), the Medium Range Reconnaissance (MRR), and the Long Range Reconnaissance (LRR). Each system includes aircraft, ground control equipment, handheld ground control station and Robotics Autonomous Command and Control (RAC2) software.

The Short-Range Reconnaissance (SRR) capability utilizes RQ-28A SRR for first generation fielding which provides platoons 30 minute flight endurance, 3 km operational range, an EO/IR Payload, and sub 3 lb target weight. SRR is currently prototyping the second generation air vehicle FY2022-FY2025 which offers modular payloads, day & night obstacle avoidance, target recognition & automated following, and common software which will be used across all Group I and II UAS.

Long Range Reconnaissance (LRR) System will provide organic maneuver battalions an uncrewed air vehicle designed to support Reconnaissance, Surveillance, and Target Acquisition (RSTA) efforts. The system will have an aircraft weight of less than 55 lbs, a range of 30-60 km and endurance of 5-8 hours. System will include Assured Positioning, Navigation and Timing (APNT), data links to optimize the modular mission payloads (Electro-Optical/Infra-Red (EO/IR), laser targeting/designating) and kinetic architectures in a contested environment.

The Joint Tactical Autonomous Aerial Resupply System (JTAARS) is an autonomous aerial cargo delivery system, organic to the maneuver commander, that will provide options for rapid and agile sustainment of highly mobile tactical combat forces, operating in a widely dispersed manner in the tactical support and close areas. JTAARS will enable maneuver by reducing the tactical force's dependence on ground lines of communication and sustainment, reducing threats to manned convoys and manned aerial systems, lightening Soldier load, and shrinking the supply chain. JTAARS will provide a lift capability of 125 lbs over 13 km one way (26 km round trip).

The total cost of the SRR Middle Tier of Acquisition effort is $28.2 million of RDTE from FY2020 to FY2025. The SRR program is fully funded across the Future Years Defense Program.

Justification: FY 2025 RDTE Base funding of $1.800 million to investigate GPS Denied Navigation systems, resilient APNT, advanced low probability of detect/intercept data-links for both SRR and LRR. In addition, interfaces for common mission payloads (communications relay, electronic warfare payloads, and lethal munition payloads).

Exhibit R-2, RDT&E Budget Item Justification: PB 2025 Army	Date: March 2024
Appropriation/Budget Activity 2040: *Research, Development, Test & Evaluation, Army I* BA 4: *Advanced Component Development & Prototypes (ACD&P)*	**R-1 Program Element (Number/Name)** PE 0604101A *I Small Unmanned Aerial Vehicle (SUAV) (6.4)*

B. Program Change Summary ($ in Millions)	FY 2023	FY 2024	FY 2025 Base	FY 2025 OCO	FY 2025 Total
Previous President's Budget	1.425	5.144	1.796	-	1.796
Current President's Budget	1.373	5.144	1.800	-	1.800
Total Adjustments	-0.052	0.000	0.004	-	0.004
• Congressional General Reductions	-	-			
• Congressional Directed Reductions	-	-			
• Congressional Rescissions	-	-			
• Congressional Adds	-	-			
• Congressional Directed Transfers	-	-			
• Reprogrammings	-	-			
• SBIR/STTR Transfer	-0.052	-			
• Adjustments to Budget Years	-	-	0.004	-	0.004

Change Summary Explanation

Increase due to revised economic assumptions.

Exhibit R-2A, RDT&E Project Justification: PB 2025 Army										Date: March 2024		
Appropriation/Budget Activity 2040 / 4					R-1 Program Element (Number/Name) PE 0604101A / *Small Unmanned Aerial Vehicle (SUAV) (6.4)*				Project (Number/Name) BR6 / *Small Unmanned Aircraft System (6.4)*			
COST ($ in Millions)	**Prior Years**	**FY 2023**	**FY 2024**	**FY 2025 Base**	**FY 2025 OCO**	**FY 2025 Total**	**FY 2026**	**FY 2027**	**FY 2028**	**FY 2029**	**Cost To Complete**	**Total Cost**
BR6: *Small Unmanned Aircraft System (6.4)*	-	1.373	5.144	1.800	-	1.800	1.803	1.822	1.843	1.861	Continuing	Continuing
Quantity of RDT&E Articles	-	-	-	-	-	-	-	-	-	-		

A. Mission Description and Budget Item Justification

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Exhibit R-2A, RDT&E Project Justification: PB 2025 Army		Date: March 2024
Appropriation/Budget Activity 2040 / 4	**R-1 Program Element (Number/Name)** PE 0604101A / *Small Unmanned Aerial Vehicle (SUAV) (6.4)*	**Project (Number/Name)** BR6 / *Small Unmanned Aircraft System (6.4)*

B. Accomplishments/Planned Programs ($ in Millions)	FY 2023	FY 2024	FY 2025
Title: System Engineering Program Management ***Description:*** System Engineering Program Management (SEPM) support during development and integration of components for SRR, LRR, and JTAARS air vehicles. ***FY 2024 Plans:*** System Engineering and Program Management support of advanced component development activities for SRR. LRR. ***FY 2025 Plans:*** System Engineering and Program Management support of advanced component development activities for SRR, LRR. JTAARS SEPM efforts will be completed in FY24. ***FY 2024 to FY 2025 Increase/Decrease Statement:*** Decrease due to JTAARS SEPM completion.	0.083	0.385	0.182
Title: SRR Component Development and Integration ***Description:*** Engineering to develop and to integrate new, advanced components into SRR. ***FY 2024 Plans:*** Advanced component development efforts for SRR. ***FY 2025 Plans:*** Advanced component development and integration efforts for SRR. ***FY 2024 to FY 2025 Increase/Decrease Statement:*** Decrease is due to completion of advanced component development for SRR.	0.595	0.688	0.345
Title: LRR Component Development and Integration ***Description:*** Title should be JTAARS Demonstration and Experimentation. Initial RDT&E funding for JTAARS in FY24 provides coverage for 3 (ea) prototypes systems to support the demonstration and testing effort. Funding in FY2025 for JTAARS is in the 6.5 SUAV RDTE line. ***FY 2024 Plans:*** Advanced component development efforts for LRR ***FY 2024 to FY 2025 Increase/Decrease Statement:***	-	2.913	-

Exhibit R-2A, RDT&E Project Justification: PB 2025 Army		Date: March 2024
Appropriation/Budget Activity 2040 / 4	**R-1 Program Element (Number/Name)** PE 0604101A / *Small Unmanned Aerial Vehicle (SUAV) (6.4)*	**Project (Number/Name)** BR6 / *Small Unmanned Aircraft System (6.4)*

B. Accomplishments/Planned Programs ($ in Millions)	FY 2023	FY 2024	FY 2025
Decrease is due to completion of JTAARS Demonstration and Experimentation in FY2024 (LRR Component Development and Integration) and integration, test and evaluation of advanced components.			
Title: LRR Component Development/Integration ***Description:*** Engineering to develop integrate and embed artificial intelligence enabled capabilities in advanced LRR flight controls, communications data links components, modular mission payload interface and resilient assured position navigation and timing. ***FY 2025 Plans:*** Advanced component development efforts for LRR ***FY 2024 to FY 2025 Increase/Decrease Statement:*** FY2025 increase is due to LRRs first year of effort.	-	-	1.273
Title: SRR Component Test and Evaluation ***Description:*** Testing to evaluate components for the SRR Tranche 2 air vehicle. ***FY 2024 Plans:*** Integration, test, and evaluation of advanced components for the SRR system. ***FY 2024 to FY 2025 Increase/Decrease Statement:*** FY25 funding decrease is due to the completion of integration, test, and evaluation of advanced components for the Tranche 2 SRR System.	0.695	0.790	-
Title: LRR Component Test and Evaluation ***Description:*** Title should be JTAARS Demonstration and Experimentation Test efforts. Initial funding for JTAARS in FY2024 provides system test in preparation for the Demonstration and Experimentation efforts. ***FY 2024 Plans:*** Integration, test, and evaluation of advanced components for the LRR system. ***FY 2024 to FY 2025 Increase/Decrease Statement:*** Decrease is due to completion of this portion of the JTAARS Demonstration and Experimentation Test and the completion of initial LRR component tests.	-	0.368	-
Accomplishments/Planned Programs Subtotals	1.373	5.144	1.800

Exhibit R-2A, RDT&E Project Justification: PB 2025 Army		Date: March 2024
Appropriation/Budget Activity 2040 / 4	**R-1 Program Element (Number/Name)** PE 0604101A / *Small Unmanned Aerial Vehicle (SUAV) (6.4)*	**Project (Number/Name)** BR6 / *Small Unmanned Aircraft System (6.4)*

C. Other Program Funding Summary ($ in Millions)

Line Item	FY 2023	FY 2024	FY 2025 Base	FY 2025 OCO	FY 2025 Total	FY 2026	FY 2027	FY 2028	FY 2029	Cost To Complete	Total Cost
• BR7: *Small Unmanned Aircraft System (6.5)*	6.292	31.284	37.876	-	37.876	34.788	13.733	13.771	13.908	Continuing	Continuing
• A12511: *SHORT RANGE RECONNAISSANCE*	6.725	20.769	69.573	-	69.573	20.591	20.575	20.533	20.739	Continuing	Continuing
• A12513: *LONG RANGE RECONNAISSANCE*	-	-	0.000	-	0.000	-	17.847	43.526	43.785	Continuing	Continuing

Remarks

D. Acquisition Strategy

The Short Range Reconnaissance utilizes Middle Tier Acquisition pathway for rapid prototyping. SRR Tranche 1 successfully transitioned to a Major Capability Acquisition pathway at Production Decision. The SRR Tranche 2 is in rapid prototyping and is anticipated to follow Tranche 1 by off-ramping into a Full Rate Production decision in FY2025.

The Long Range Reconnaissance completed an Acquisition Shaping Panel in fourth quarter FY2023. Prototypes will be evaluated from up to 4 vendors in 2 phases that include Soldier Touch Points and Technical evaluations. The final selected system will then undergo Developmental Testing (DT) that will include Engineering Flight Tests, Radio/Antenna Characterization, follow on SW/HW DT and cyber testing.

The Joint Tactical Autonomous Aerial Resupply System (JTAARS) also completed an Acquisition Shaping Panel in fourth quarter FY2023 with direction from the Shaping Panel to conduct the FY2024 JTAARS assessment. The results of the demonstration will be briefed in FY2025 to determine prototyping or production.

Exhibit R-3, RDT&E Project Cost Analysis: PB 2025 Army			Date: March 2024
Appropriation/Budget Activity 2040 / 4	R-1 Program Element (Number/Name) PE 0604101A / *Small Unmanned Aerial Vehicle (SUAV) (6.4)*	Project (Number/Name) BR6 / *Small Unmanned Aircraft System (6.4)*	

Management Services ($ in Millions)

Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	FY 2023 Cost	FY 2023 Award Date	FY 2024 Cost	FY 2024 Award Date	FY 2025 Base Cost	FY 2025 Base Award Date	FY 2025 OCO Cost	FY 2025 OCO Award Date	FY 2025 Total Cost	Cost To Complete	Total Cost	Target Value of Contract
System Engineering Program Management	Various	Various : Various	0.205	0.083	Oct 2022	0.385	Oct 2023	0.182	Oct 2024	-		0.182	Continuing	Continuing	Continuing
		Subtotal	0.205	0.083		0.385		0.182		-		0.182	Continuing	Continuing	N/A

Product Development ($ in Millions)

Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	FY 2023 Cost	FY 2023 Award Date	FY 2024 Cost	FY 2024 Award Date	FY 2025 Base Cost	FY 2025 Base Award Date	FY 2025 OCO Cost	FY 2025 OCO Award Date	FY 2025 Total Cost	Cost To Complete	Total Cost	Target Value of Contract
SRR Component development and Integration	Various	ACC Redstone : Redstone Arsenal	0.976	0.595	Feb 2023	0.688	Feb 2024	0.345	Feb 2025	-		0.345	Continuing	Continuing	Continuing
JTAARS Demonstration & Experimentation	Various	ACC Redstone : Redstone Arsenal, AL	-	-		2.913	Jan 2024	-		-		-	Continuing	Continuing	Continuing
LRR Component Development and Integration	TBD	TBD : TBD	-	-		-		1.273	Jan 2025	-		1.273	0.000	1.273	-
		Subtotal	0.976	0.595		3.601		1.618		-		1.618	Continuing	Continuing	N/A

Test and Evaluation ($ in Millions)

Cost Category Item	Contract Method & Type	Performing Activity & Location	Prior Years	FY 2023 Cost	FY 2023 Award Date	FY 2024 Cost	FY 2024 Award Date	FY 2025 Base Cost	FY 2025 Base Award Date	FY 2025 OCO Cost	FY 2025 OCO Award Date	FY 2025 Total Cost	Cost To Complete	Total Cost	Target Value of Contract
SRR Component Test and Evaluation	Various	ACC Redstone : Redstone Arsenal	1.073	0.695	Aug 2023	0.770	Aug 2024	-		-		-	Continuing	Continuing	Continuing
LRR Component Test and Evaluation	Various	ACC Redstone : Redstone Arsenal	-	-		0.388	Jul 2024	-		-		-	Continuing	Continuing	Continuing
		Subtotal	1.073	0.695		1.158		-		-		-	Continuing	Continuing	N/A

Exhibit R-3, RDT&E Project Cost Analysis: PB 2025 Army			Date: March 2024
Appropriation/Budget Activity 2040 / 4	R-1 Program Element (Number/Name) PE 0604101A / *Small Unmanned Aerial Vehicle (SUAV) (6.4)*	Project (Number/Name) BR6 / *Small Unmanned Aircraft System (6.4)*	

	Prior Years	FY 2023		FY 2024		FY 2025 Base		FY 2025 OCO		FY 2025 Total	Cost To Complete	Total Cost	Target Value of Contract
Project Cost Totals	2.254	1.373		5.144		1.800		-		1.800	Continuing	Continuing	N/A

Remarks

Exhibit R-4, RDT&E Schedule Profile: PB 2025 Army		Date: March 2024
Appropriation/Budget Activity 2040 / 4	**R-1 Program Element (Number/Name)** PE 0604101A / *Small Unmanned Aerial Vehicle (SUAV) (6.4)*	**Project (Number/Name)** BR6 / *Small Unmanned Aircraft System (6.4)*

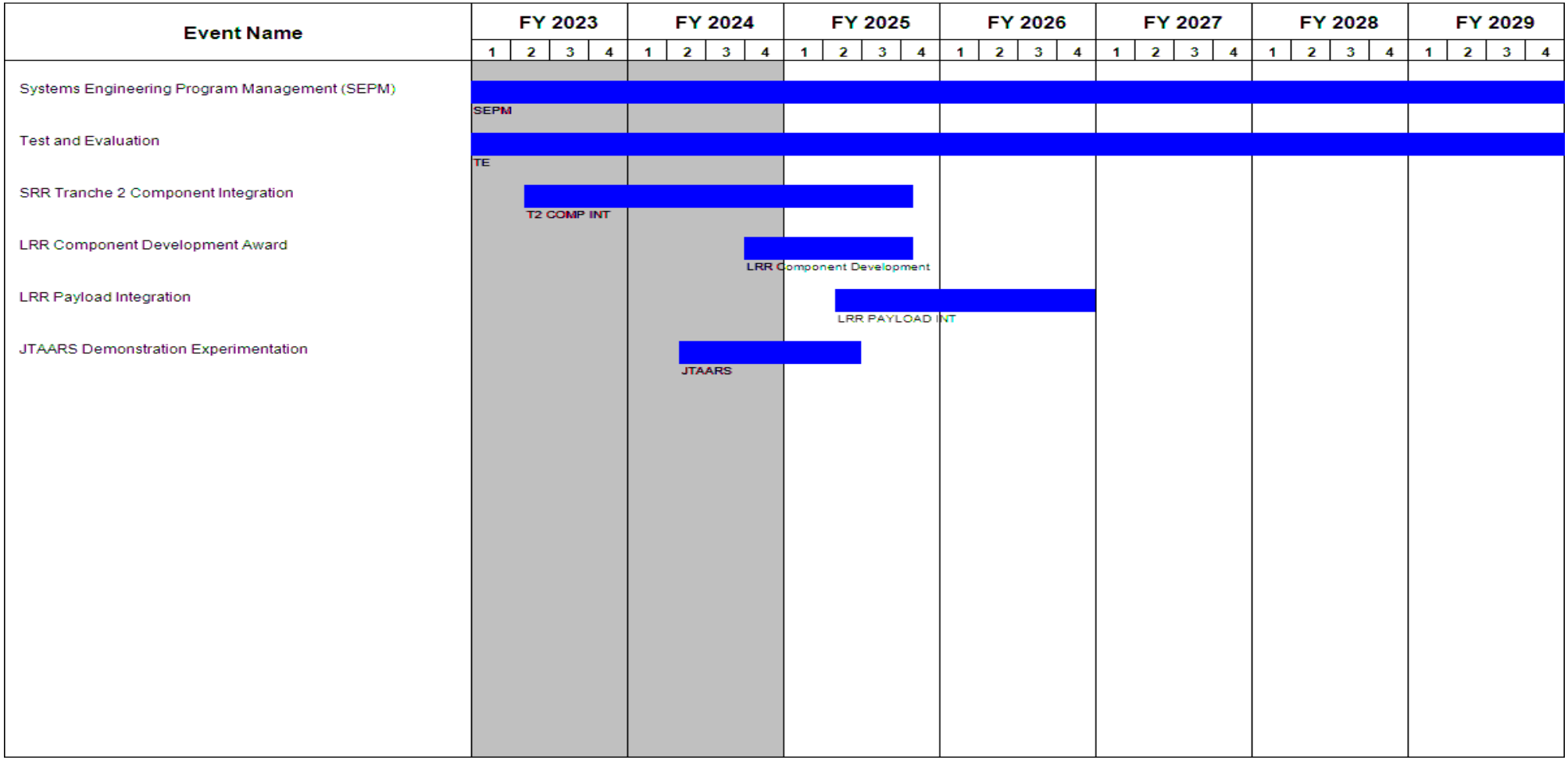

Exhibit R-4A, RDT&E Schedule Details: PB 2025 Army		Date: March 2024
Appropriation/Budget Activity 2040 / 4	**R-1 Program Element (Number/Name)** PE 0604101A / *Small Unmanned Aerial Vehicle (SUAV) (6.4)*	**Project (Number/Name)** BR6 / *Small Unmanned Aircraft System (6.4)*

Schedule Details

	Start		End	
Events	**Quarter**	**Year**	**Quarter**	**Year**
Systems Engineering Program Management (SEPM)	2	2018	4	2030
Test and Evaluation	4	2018	4	2030
SRR Tranche 2 Component Integration	2	2023	4	2025
LRR Component Development Award	4	2024	4	2025
LRR Payload Integration	2	2025	4	2026
JTAARS Demonstration Experimentation	2	2024	2	2025