Exhibit R-2, RDT&E Budget Item Justification: PB 2011 Army

DATE: February 2010

APPROPRIATION/BUDGET ACTIVITY

2040: Research, Development, Test & Evaluation, Army

BA 4: Advanced Component Development & Prototypes (ACD&P)

R-1 ITEM NOMENCLATURE

PE 0603305A: Army Missle Defense Systems Integration

COST (\$ in Millions)	FY 2009 Actual	FY 2010 Estimate	FY 2011 Base Estimate	FY 2011 OCO Estimate	FY 2011 Total Estimate	FY 2012 Estimate	FY 2013 Estimate	FY 2014 Estimate	FY 2015 Estimate	Cost To Complete	Total Cost
Total Program Element	90.552	71.788	11.455	0.000	11.455	38.712	90.476	109.586	110.512	Continuing	Continuing
TR4: MISSILE DEFENSE INTEGRATION	78.170	58.832	0.000	0.000	0.000	0.000	0.000	0.000	0.000	Continuing	Continuing
TR5: MISSILE DEFENSE BATTLELAB	12.382	12.956	7.159	0.000	7.159	17.409	16.279	15.907	16.506	Continuing	Continuing
TR7: Protection Capability II - Intercept	0.000	0.000	4.296	0.000	4.296	21.303	74.197	93.679	94.006	Continuing	Continuing

A. Mission Description and Budget Item Justification

This Program Element funds missile defense systems integration efforts for both the US Army Space and Missile Defense Command/Army Forces Strategic Command (USASMDC/ ARSTRAT) and the Program Executive Office for Missiles and Space (PEO-MS). USASMDC/ARSTRAT: Headquarters, Department of the Army General Order 37, dated 16 October 2006, designated USASMDC/ARSTRAT as the Army proponent for space and ground-based midcourse defense (GMD), the Army integrator for global missile defense, and the Army Service Component Command (ASCC) of the U.S. Strategic Command (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 designates USASMDC/ARSTRAT as the Army specified proponent for Global Missile Defense and Space/High Altitude capabilities. As the Army proponent for space, high altitude and GMD, USASMDC/ARSTRAT is responsible to develop 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 and Facilities (DOTMLPF) solutions to realize the GMD capabilities. As the Army integrator for global missile defense, USASMDC/ARSTRAT is responsible to review programs managed by the Army, other Services, Defense agencies and National agencies to ensure that they are correctly synchronized and will ultimately provide the capabilities required by USSTRATCOM to execute its global missile defense responsibilities. Project TR4 funds the USASMDC/ARSTRAT to execute its proponency role for Ground-Based Missile Defense, and its role as the integrator for global missile defense. In fiscal year 2011, this project will be rolled into program element 0603308A project 990 in recognition of the increasing interrelationship between space operations, exo-atmospheric ballistic missile defense and global missile defense. Project TR5 funds USASMDC/ARSTRAT efforts to develop, analyze and mature warfighting concepts, focus military science and technology research, and conduct warfighting experiments associated with USASMDC/ARSTRAT's ASCC mission. Additionally, this project funds the delivery of innovations to the warfighter through prototyping, operational analysis, and experimentation in support of current and future Forces. Project TR7 funds the Cruise Missile Defense Systems Project Office/ Program Executive Office Missiles and Space efforts to develop Indirect Fire Protection Capability Increment II - Intercept capabilities required to execute the US Army's current and future air and missile defense responsibilities.

Exhibit R-2, RDT&E Budget Item Justification: PB 2011 Army		DATE: February 2010
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE	

2040: Research, Development, Test & Evaluation, Army

BA 4: Advanced Component Development & Prototypes (ACD&P)

PE 0603305A: Army Missle Defense Systems Integration

B. Program Change Summary (\$ in Millions)

	FY 2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total
Previous President's Budget	90.765	14.683	23.814	0.000	23.814
Current President's Budget	90.552	71.788	11.455	0.000	11.455
Total Adjustments	-0.213	57.105	-12.359	0.000	-12.359
 Congressional General Reductions 		-0.375			
 Congressional Directed Reductions 		0.000			
 Congressional Rescissions 	0.000	0.000			
 Congressional Adds 		57.480			
 Congressional Directed Transfers 		0.000			
 Reprogrammings 	0.000	0.000			
• SBIR/STTR Transfer	-0.213	0.000			
 Adjustments to Budget Years 	0.000	0.000	-12.359	0.000	-12.359

Change Summary Explanation

Change Summary Explanation:FundingFY2010: Congressional Increase for various Congressional adds.FY2011: Funds realigned (\$12.359 million) to higher program priorities.

Exhibit R-2A, RDT&E Project Justif	DATE: February 2010												
APPROPRIATION/BUDGET ACTI 2040: Research, Development, Test & E BA 4: Advanced Component Developm	Evaluation, Ar	•)						PROJECT TR4: MISSILE DEFENSE INTEGRATION				
COST (\$ in Millions)	FY 2009 Actual	FY 2010 Estimate	FY 2011 Base Estimate	FY 2011 OCO Estimate	FY 2011 Total Estimate	FY 2012 Estimate	FY 2013 Estimate	FY 2014 Estimate	FY 2015 Estimate	Cost To Complete	Total Cost		
TR4: MISSILE DEFENSE INTEGRATION	78.170	58.832	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

Headquarters, Department of the Army General Order Number 37, dated 16 October 2006, designated USASMDC/ARSTRAT as the Army proponent for space and ground-based midcourse defense (GMD), and the Army integrator for global missile defense. This project funds efforts associated with those roles. As the Army proponent for GMD, USASMDC/ARSTRAT is responsible to develop and validate warfighting concepts, identify capabilities needed to implement the validated concepts, and develop Doctrine, Organization, Training, Materiel, Leadership & Education, Personnel and Facilities (DOTMLPF) solutions to realize GMD capabilities. As the Army integrator for global missile defense, USASMDC/ARSTRAT is responsible to review programs managed by the Army, other Services, Defense agencies and National agencies to ensure that they are correctly synchronized and will ultimately provide the capabilities required by USSTRATCOM to execute its global missile defense responsibilities. After FY2010, this project is rolled into PE 0603308A, project 990 in recognition of the increasing interrelationship between space operations, exo-atmospheric ballistic missile defense and global missile defense.

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

	FY 2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total
Program #1	1.330	1.613	0.000	0.000	0.000
Continue combat development efforts to define DOTMLPF solutions for capabilities required to execute ground-based midcourse defense operations across the four domains of missile defense (passive defense, active defense, attack operations and battle management). Ensure that the various components of a global missile defense capability remain synchronized with USSTRATCOM's concept of operations. FY 2009 Accomplishments: FY 2009					

Exhibit R-2A, RDT&E Project Justification: PB 2011 Army				DATE: Febr	uary 2010	
APPROPRIATION/BUDGET ACTIVITY 2040: Research, Development, Test & Evaluation, Army BA 4: Advanced Component Development & Prototypes (ACD&P)	R-1 ITEM NOMENCLATURE PE 0603305A: Army Missle Defense Systems Integration		PROJECT TR4: MISSILE DEFENSE INTEGRAT			ON
B. Accomplishments/Planned Program (\$ in Millions)						
•	FY	2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total
FY 2010 Plans: FY 2010						
FY 2011 Base Plans: FY 2011 Base FY 2011 OCO Plans:						
FY 2011 OCO						
Includes FY09/FY10 Congressional Adds for Adaptive Lightweight M. Robotics Technology for Space, Air, and Missiles (ART-SAM), Advanced Electronics Rosebud Integration, Advanced Environmental Research Program, Advanced Hypersonic Weapon Technology Demoi for National Security, Advanced Strap Down Seeker, Alternative Power Biological Air Filtering System Technology, Compact Pulsed Power In Continuous Threat Alert Sensins System (CTASS), Deployable Space Detection Algorithms and Software for Force Protection, Detection Mi Explosive, Dielectrically Enhance Sensor System (DESS), Discriminate for Missiles, Aviation, and Space, Future TOC Hardware/Software Into Platform, Heat Dissipation for Electronic Systems & Enclosures, High Speed Digital Imaging, High Temp Polymers for Missile System Appl for Advanced Technology Development, On-board Hybrid Power Unit Loiter UAV, Processing DNA Data Using Classical Discrimination Technology Removed Power Explosive Analysis and Detection System (READS), Sevaluation System, Thermal and Electrical Nanoscale Transport (TEN Defense Surveillance Data.	raterials for Missile Defense, Adaptive need Cavitation Power Technology, Control System, Advanced Fuel Cell Instration, Advanced Standoff Technologies or Technology (APT) for Missile Defense, nitiative, Composite Structure Design, and Electronic Warfare Analysis Tools, tigation and Neutralization of High nory Imaging and Network Advancement regration, Geospatial Airship Research Detail Architecture Analysis Tool, High fications, Micro-Systems Nanotechnology (OBHPU), Orion High Altitude Long chniques, Radiation Hardening Initiative tandoff Hazardous Agent Detection &	76.840	57.181	0.000	0.000	0.000

Exhibit R-2A, RDT&E Project Justification: PB 2011 Army				DATE: Febr	uary 2010	
APPROPRIATION/BUDGET ACTIVITY 2040: Research, Development, Test & Evaluation, Army BA 4: Advanced Component Development & Prototypes (ACD&P)	R-1 ITEM NOMENCLATURE PE 0603305A: Army Missle Defense Sys Integration	PE 0603305A: Army Missle Defense Systems			INTEGRATI	ON
B. Accomplishments/Planned Program (\$ in Millions)			1			
		FY 2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total
FY 2009 Accomplishments: FY 2009						
FY 2010 Plans: FY 2010						
FY 2011 Base Plans: FY 2011 Base						
FY 2011 OCO Plans: FY 2011 OCO						
Program #3		0.000	0.038	0.000	0.000	0.000
Small Business Innovative Research/Small Business Technology Trans	nsfer Programs					
FY 2009 Accomplishments: FY 2009						
FY 2010 Plans: FY 2010						
FY 2011 Base Plans: FY 2011 Base						
FY 2011 OCO Plans: FY 2011 OCO						
	Accomplishments/Planned Programs Subtotals	78.170	58.832	0.000	0.000	0.000

Exhibit R-2A, RDT&E Project Justification: PB 2011 Army	DATE: February 2010		
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE	PROJECT	
2040: Research, Development, Test & Evaluation, Army	PE 0603305A: Army Missle Defense Systems	TR4: MISSIL	E DEFENSE INTEGRATION
BA 4: Advanced Component Development & Prototypes (ACD&P)	Integration		

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

N/A

D. Acquisition Strategy

This project employs a mix of government employees and various contractors for different aspects of the combat development process to ensure a degree of independent thought, and to encourage the use of various analytic approaches. After FY2010, this project is rolled into PE 0603308A, project 990 in recognition of the increasing interrelationship between space

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operations, exo-atmospheric b	pallistic missile defense a	nd global missile defense.					
. Performance Metrics							
Performance metrics used in t	the preparation of this jus	tification material may be found in the	FY 2010 Army Performanc	e Budget Justifi	cation Book, dated May	2010.	

Exhibit R-3, RDT&E Project Cost Analysis: PB 2011 Army

DATE: February 2010

APPROPRIATION/BUDGET ACTIVITY

R-1 ITEM NOMENCLATURE

PROJECT

2040: Research, Development, Test & Evaluation, Army

PE 0603305A: Army Missle Defense Systems

TR4: MISSILE DEFENSE INTEGRATION

BA 4: Advanced Component Development & Prototypes (ACD&P)

Integration

Product Development (\$ in Millions)

				FY	2010	FY :	2011 ase	FY 2	2011 CO	FY 2011 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Execute Congressional Adds	C/Various	Various Location could not be determined.	292.042	57.181		0.000		0.000		0.000	Continuing	Continuing	0
		Subtotal	292.042	57.181		0.000		0.000		0.000			0.000

Remarks

Support (\$ in Millions)

				FY :	2010	FY : Ba	2011 ase	FY :	2011 CO	FY 2011 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Govt support & support contracts	C/Various	Various in Colorado Springs CO and Huntsville AL Location could not be determined.	11.562	1.651		0.000		0.000		0.000	Continuing	Continuing	0
		Subtotal	11.562	1.651		0.000		0.000		0.000			0.000

Exhibit R-3, RDT&E Project Cost Analysis: PB 2011 Army	DATE: February 2010	
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE	PROJECT
2040: Research, Development, Test & Evaluation, Army	PE 0603305A: Army Missle Defense Systems	TR4: MISSILE DEFENSE INTEGRATION
BA 4: Advanced Component Development & Prototypes (ACD&P)	Integration	

	Total Prior Years Cost	FY 2010	FY:	FY:	2011 CO	FY 2011 Total	Cost To Complete	Total Cost	Target Value of Contract
Project Cost Totals	303.604	58.832	0.000	0.000		0.000			0.000

Exhibit R-2A, RDT&E Project Justification: PB 2011 Army										uary 2010	
APPROPRIATION/BUDGET ACTI 2040: Research, Development, Test & B			NOMENCLA A: Army Miss	_	LE DEFENSE BATTLELAB						
BA 4: Advanced Component Development & Prototypes (ACD&P)				Integration	, and the second of the second						
COST (\$ in Millions)	FY 2009 Actual	FY 2010 Estimate	FY 2011 Base Estimate	FY 2011 FY 2011 OCO Total FY 2012 FY 2013 Estimate Estimate Estimate Estimate				FY 2014 Estimate	FY 2015 Estimate	Cost To Complete	Total Cost
TR5: MISSILE DEFENSE BATTLELAB	12.382	12.956	7.159	0.000	7.159	17.409	16.279	15.907	16.506	Continuing	Continuing
Quantity of RDT&E Articles											

A. Mission Description and Budget Item Justification

Project TR5 funds USASMDC/ARSTRAT efforts to develop, analyze and mature warfighting concepts, focus military science and technology research, and conduct warfighting experiments. Additionally, this project funds the delivery of innovations to the warfighter through prototyping, operational analysis, and experimentation in support of current and future Forces. The concepts, experiments, analyses, and prototypes apply to all of the mission areas assigned to USASMDC/ARSTRAT in its role as an ASCC to USSTRATCOM: Missile Defense, Space, Information Operations (IO), Global Strike (GS), Command, Control, Communications, Computers, Intelligence, Surveillance and Reconnaissance (C4ISR).

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

	FY 2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total
Program #1	7.488	7.629	4.295	0.000	4.295
FY09 accomplishments and planned FY10 activities include participation in numerous Integrated Capabilities Development Teams and providing concept development support for the Space Functional Needs Analysis (FNA), the Space Capabilities Integration Map (CIM) and the GMD Concept Capability Plan (CCP). Experimented with advanced prototype components of future operational- and tactical-level command and control (C2) systems to assess their impact on Doctrine, Organization, Training, Material, Leadership and Education, Personnel and Facilities (DOTMLPF) issues. Participated in major Army and Joint Experiments integrating space, missile defense, IO, GS and C4ISR integrating, functional and operational concepts into the Army Campaign Plan (ACP). USASMDC/ARSTRAT participated in several FY09 technology assessments, experiments, and demonstrations including Unified Quest 09, Schreiver V, STRATCOM MAST, Tactical Satellite (TacSat) 3 Joint Military Utility Assessment, High Altitude Enabled Capabilities Assessment, Earth Wind and Fire, Keen Edge 09, Coalition Warrior Interoperability Demonstration (CWID) 09, Coalition Warfighter Program (CWP) and the Intelligence, Surveillance and Reconassaince (ISR) Warfighter Exercise. Experiments and Wargames scheduled in FY10					

Exhibit R-2A, RDT&E Project Justification: PB 2011 Army			DATE: Febr	uary 2010	
APPROPRIATION/BUDGET ACTIVITY 2040: Research, Development, Test & Evaluation, Army BA 4: Advanced Component Development & Prototypes (ACD&P)	R-1 ITEM NOMENCLATURE PE 0603305A: Army Missle Defense Systems Integration	PROJECT TR5: MISSII	}		
B. Accomplishments/Planned Program (\$ in Millions)	'				
•	FY 2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total
include Unified Quest 10, Schreiver Wargame 2010, Army Space Por 3 Joint Military Utility Assessment, High Altitude Assessment Part II Virgo, Eagle Resolve, Arctic Edge, Key Resolve, and other space and FY11 our planned program will be limited to what can be accomplish include minimum participation in Army and joint combat development Government personnel will monitor ongoing experiments, wargames space, missile defense and high altitude on Army operations. FY 2009 Accomplishments: FY 2010 Plans: FY 2011 Base Plans: FY 2011 Base Plans: FY 2011 OCO Plans: FY 2011 OCO	, A Day Without Space, Bold Quest,Falcon I missile defense related exercises. In ed by Government employees; this will nt activities similar to those described above.				
Program #2	4.894	5.199	2.864	0.000	2.864
Operational Analysis/Tools, Modeling and Simulation (M&S) - Studiand planned FY10 activities include operational assessments of conceand tactics. Efforts also included examination of TacSAT III issues for new doctrine for Space Superiority and Operational Analysis of High Level, Theater Missile Defense concepts, and Space ISR. Tools and	epts, doctrine, organizations, technologies or space and missile defense including Altitude (HA) capabilities at the Tactical				

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for experimentation and operational assessments, and the maintenance of M&S tools including developing an operational representation of HA and space based capabilities into OneSAF and the development of the Joint

Exhibit R-2A, RDT&E Project Justification: PB 2011 Army		DATE: February 2010					
APPROPRIATION/BUDGET ACTIVITY 2040: Research, Development, Test & Evaluation, Army BA 4: Advanced Component Development & Prototypes (ACD&P)	R-1 ITEM NOMENCLATURE PE 0603305A: Army Missle Defense Sy Integration	vstems	PROJECT TR5: MISSILE DEFENSE BATTLELAB				
B. Accomplishments/Planned Program (\$ in Millions)	B. Accomplishments/Planned Program (\$ in Millions)						
		FY 2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total	
Embedded Messaging System (JEMS) for translation and transfer of specifical systems. Analysis and M&S for evolving space superiority and that address emerging needs will be initiated in FY11 and expanded in activities adequately address space, missile defense and high altitude dinclude minimal sustaining maintenance of M&S tools and operation of Collaborative Simulation Environment required to support experiment FY 2009 Accomplishments: FY 2010 Plans: FY 2011 Base Plans: FY 2011 OCO Plans: FY 2011 OCO Plans: FY 2011 OCO	d operationally responsive space concepts FY12 to ensure that combat development octrinal and material investments. Plans of the Space Missile Defense Battle Lab						
Program #3		0.000	0.128	0.000	0.000	0.000	
Small Business Innovative Research/Small Business Technology Tran	sfer Programs						
FY 2009 Accomplishments: FY 2009							
FY 2010 Plans: FY 2010							

Exhibit R-2A, RDT&E Project Justification: PB 2011 Army			DATE: February 2010
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE	PROJECT	
2040: Research, Development, Test & Evaluation, Army	PE 0603305A: Army Missle Defense Systems	TR5: MISSIL	LE DEFENSE BATTLELAB
BA 4: Advanced Component Development & Prototypes (ACD&P)	Integration		

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

FY 2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total
FY 2011 Base Plans: FY 2011 Base				
FY 2011 OCO Plans: FY 2011 OCO				
Accomplishments/Planned Programs Subtotals 12.382	12.956	7.159	0.000	7.159

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

N/A

D. Acquisition Strategy

Not applicable for this item.

E. Performance Metrics

Performance metrics used in the preparation of this justification material may be found in the FY 2010 Army Performance Budget Justification Book, dated May 2010.

Exhibit R-3, RDT&E Project Cost Analysis: PB 2011 Army

DATE: February 2010

APPROPRIATION/BUDGET ACTIVITY

2040: Research, Development, Test & Evaluation, Army

BA 4: Advanced Component Development & Prototypes (ACD&P)

R-1 ITEM NOMENCLATURE

PE 0603305A: Army Missle Defense Systems

Integration

PROJECT

TR5: MISSILE DEFENSE BATTLELAB

Support (\$ in Millions)

				FY :	2010	FY :	2011 ase		2011 CO	FY 2011 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Experiments & technology enhancements of prototypes/tools and analysis.	С	Various Colorado Springs CO and Huntsville AL Location could not be determined.	30.327	4.923		0.000		0.000		0.000	Continuing	Continuing	0
Govt Support and Support Contracts	С	Various Colorado Springs CO and Huntsville AL Location could not be determined.	47.906	8.033		7.159		0.000		7.159	Continuing	Continuing	0
		Subtotal	78.233	12.956		7.159		0.000		7.159			0.000

Remarks

	Total Prior Years Cost	FY 2010		2011 ase	FY 2	-	FY 2011 Total	Cost To Complete	Total Cost	Target Value of Contract
Project Cost Totals	78.233	12.956	7.159		0.000		7.159			0.000

Exhibit R-2A, RDT&E Project Justification: PB 2011 Army										DATE: February 2010		
APPROPRIATION/BUDGET ACTI		R-1 ITEM N	NOMENCLA	TURE		PROJECT						
2040: Research, Development, Test & Evaluation, Army				PE 0603305	A: Army Miss	le Defense Sy	stems	TR7: Protect	ction Capability II - Intercept			
BA 4: Advanced Component Development & Prototypes (ACD&P)				Integration								
COST (\$ in Millions) FY 2009 FY 2010 Base Actual Estimate Estimate					FY 2011 Total Estimate	FY 2012 Estimate	FY 2013 Estimate	FY 2014 Estimate	FY 2015 Estimate	Cost To Complete	Total Cost	
TR7: Protection Capability II - Intercept	0.000	0.000	4.296	0.000	4.296	21.303	74.197	93.679	94.006	Continuing	Continuing	
Quantity of RDT&E Articles												

A. Mission Description and Budget Item Justification

The mission of the Indirect Fire Protection Capability II-Intercept (IFPCII-I) is to provide a more robust complementary protection against indirect fires from rockets, artillery and mortars (RAM). It will be part of an overarching IFPC architecture and will seamlessly integrate with current Increment 0, Counter-Rockets, Artillery, and Mortar (C-RAM), and Increment 1, Enhanced Sense and Warn Capability. When implemented, IFPCII-I will provide 360 degree protection against RAM threats simultaneously attacking from multiple azimuths. IFPCII-I technologies may consist of kinetic and/or directed energy weapons, associated fire control sensors, and a technical fire control capability. Command and Control is external to the IFPCII-I program and will be provided by the supported forces. A joint Advanced Technology Objective (ATO) being executed by Aviation and Missile Research, Development and Engineering Center (AMRDEC) (US Army Aviation and Missile Command) is in the process of developing missile and bullet technologies necessary to implement an IFPCII-I capability. It is expected the ATO will culminate in prototype components that will flow into the IFPCII-I system concept.

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

	FY 2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total
Program #1	0.000	0.000	4.296	0.000	4.296
Initiate Milestone A Documentation Development and Transition to Technology Development (TD) Phase.					
FY 2009 Accomplishments: FY 2009					
FY 2010 Plans: FY 2010					
FY 2011 Base Plans: FY 2011 Base					

Exhibit R-2A, RDT&E Project Justification: PB 2011 Army	DATE: February 2010	
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE	PROJECT
2040: Research, Development, Test & Evaluation, Army	PE 0603305A: Army Missle Defense Systems	TR7: Protection Capability II - Intercept
BA 4: Advanced Component Development & Prototypes (ACD&P)	Integration	

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

	FY 2009	FY 2010	FY 2011 Base	FY 2011 OCO	FY 2011 Total
FY 2011 OCO Plans: FY 2011 OCO					
Accomplishments/Planned Programs	Subtotals 0.000	0.000	4.296	0.000	4.296

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

			FY 2011	FY 2011	FY 2011					Cost To	
<u>Line Item</u>	FY 2009	FY 2010	Base	<u>oco</u>	<u>Total</u>	FY 2012	FY 2013	FY 2014	FY 2015	Complete	Total Cost
• Ord. #1: SSN WK5053, FAAD GBS	0.000	0.000	91.467	0.000	91.467	7.948	7.935	0.000	0.000	Continuing	Continuing
• Ord. #2: <i>PE 0603327A</i> , <i>Proj S34</i> ,	111.496	166.061	0.000	0.000	0.000	0.000	0.000	0.000	0.000	Continuing	Continuing
AMD System of System Engineering											

AMD System of System Engineering and Integration

D. Acquisition Strategy

Begin transition to Milestone A FY2011 with Milestone A decision FY2012 for entry into Technology Development (TD) Phase. Will award multiple contracts during the TD Phase for competing teams to demonstrate system components and/ or key system components for government evaluation and final down select in FY2015. Transition to Milestone B will begin FY2014 with Milestone B decision FY2016 for entry into the Engineering and Manufacturing Development (EMD) Phase.

E. Performance Metrics

Performance metrics used in the preparation of this justification material may be found in the FY 2010 Army Performance Budget Justification Book, dated May 2010.

Exhibit R-3, RDT&E Project Cost Analysis: PB 2011 Army

DATE: February 2010

APPROPRIATION/BUDGET ACTIVITY

R-1 ITEM NOMENCLATURE

PROJECT

2040: Research, Development, Test & Evaluation, Army

PE 0603305A: Army Missle Defense Systems Integration TR7: Protection Capability II - Intercept

BA 4: Advanced Component Development & Prototypes (ACD&P)

Product Development (\$ in Millions)

				FY	2010		2011 ase		2011 CO	FY 2011 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Cost Category Item is empty.	С	Nothing entered for Activity and Location. Location could not be determined.	0.000	0.000		0.000		0.000		0.000	Continuing	Continuing	0
		Subtotal	0.000	0.000		0.000		0.000	1	0.000			0.000

Remarks

Support (\$ in Millions)

				FY	2010	FY :	2011 ase		2011 CO	FY 2011 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Cost Category Item is empty.	С	Nothing entered for Activity and Location. Location could not be determined.	0.000	0.000		0.000		0.000		0.000	Continuing	Continuing	0
	-	Subtotal	0.000	0.000		0.000		0.000		0.000			0.000

Exhibit R-3, RDT&E Project Cost Analysis: PB 2011 Army

DATE: February 2010

APPROPRIATION/BUDGET ACTIVITY

2040: Research, Development, Test & Evaluation, Army

BA 4: Advanced Component Development & Prototypes (ACD&P)

R-1 ITEM NOMENCLATURE

PE 0603305A: Army Missle Defense Systems

Integration

PROJECT

TR7: Protection Capability II - Intercept

Test and Evaluation (\$ in Millions)

				FY	2010	FY :	2011 ase	FY 2	2011 CO	FY 2011 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Cost Category Item is empty.	С	Nothing entered for Activity and Location. Location could not be determined.	0.000	0.000		0.000		0.000		0.000	Continuing	Continuing	0
		Subtotal	0.000	0.000		0.000		0.000		0.000			0.000

Remarks

Management Services (\$ in Millions)

	(+	/											
				FY :	2010		2011 ase		2011 CO	FY 2011 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Pre-Technology Development management support	С	Cruise Missile Defense Systems Project Office - Huntsville Alabama	0.000	0.000		4.296		0.000		4.296	Continuing	Continuing	0
		Subtotal	0.000	0.000		4.296		0.000		4.296			0.000

Remarks

Management Services in FY2011 is for government preparation of pre-milestone A documentation and Systems Engineering planning for transition to Technical Development Phase. Contract award planned for FY2012.

Exhibit R-3, RDT&E Project Cost Analysis: PB 201	l 1 Army					DA	TE: Februa	ry 2010	
APPROPRIATION/BUDGET ACTIVITY 2040: Research, Development, Test & Evaluation, Arn BA 4: Advanced Component Development & Prototyp	•	PE	I ITEM NOME 0603305A: Arm egration			DJECT : Protection	Capability I	II - Intercept	
									Target

	Total Prior Years Cost	FY 2010	FY 20 Bas	FY 2	-	FY 2011 Total	Cost To Complete	Total Cost	Target Value of Contract
Project Cost Totals	0.000	0.000	4.296	0.000		4.296			0.000

Exhibit R-4, RDT&E Schedule Profile: PB 2011 Army

APPROPRIATION/BUDGET ACTIVITY

2040: Research, Development, Test & Evaluation, Army
BA 4: Advanced Component Development & Prototypes (ACD&P)

R-1 ITEM NOMENCLATURE
PE 0603305A: Army Missle Defense Systems
Integration

PROJECT
TR7: Protection Capability II - Intercept

		FY	Z 20	09	•	I	Y	201	0	I	Y 2	201	1	I	FY	201	2	J	F Y 2	2013	3	F	Y 2	2014	4	F	FY :	201	5
	1	. 2	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
Transition to Milestone A									#	#	#	#	#	#	#														
Milestone A															#														
Technology Development (TD) Phase															#	#	#	#	#	#	#	#	#	#	#	#	#	#	#
Transition to Milestone B																							#	#	#	#	#	#	#
Milestone B																													#

Exhibit R-4A, RDT&E Schedule Details: PB 2011 Army			DATE: February 2010
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE	PROJECT	
2040: Research, Development, Test & Evaluation, Army	PE 0603305A: Army Missle Defense Systems	TR7: Protect	tion Capability II - Intercept
BA 4: Advanced Component Development & Prototypes (ACD&P)	Integration		

Schedule Details

	St	art	E	nd
Event	Quarter	Year	Quarter	Year
Transition to Milestone A	4	2010	2	2012
Milestone A	2	2012	2	2012
Technology Development (TD) Phase	2	2012	4	2015
Transition to Milestone B	2	2014	4	2015
Milestone B	4	2015	4	2015