DEFENSE INFORMATION SYSTEMS AGENCY FISCAL YEAR (FY) 2008/2009 BUDGET ESTIMATES



RESEARCH, DEVELOPMENT, TEST & EVALUATION (RDT&E)

FEBRUARY 2007

DEFENSE INFORMATION SYSTEMS AGENCY FISCAL YEAR (FY) 2008/2009 BUDGET ESTIMATES

Appropriation: RDT&E Date: February 2007

TOA, \$ in Millions

R-1 Line <u>Item No</u>	Program Element Number	<u> Item</u>	Budget <u>Activity</u>	Prior Year <u>Cost</u>	Current Year <u>Cost</u>	Budget Year 1 <u>Cost</u>	Budget Year 2 <u>Cost</u>
				FY 2006	FY 2007	FY 2008	FY 2009
120	0303129K	Defense Message System (DMS)	05	11.717	11.160	0.000	0.000
121	0303141K	Global Combat Support System (GCSS)	05	17.139	18.486	18.129	18.725
122	0303158K	Joint Command and Control Program	05	24.008	34.899	70.283	147.367
123	0305840K	Electronic Commerce (EC)	05	6.698	0.000	0.000	0.000
107	0604764K	Advanced IT Services Joint Program Office	05	10.979	9.356	9.832	13.860
		Total System Development and Demonstration (BA 5)	70.541	73.901	98.244	179.952
176	0208045K	C4I Interoperability	07	66.057	83.413	76.179	77.795
178	0301144K	Joint/Allied Coalition Information Sharing	07	0.000	0.000	26.321	23.224
184	0302016K	National Military Command System - Wide Support	07	0.610	0.718	0.713	0.619
185	0302019K	Defense Info. Infras.(DII) Engin. & Integ.	07	31.186	33.879	5.548	7.804
186	0303126K	Long Haul Communications	07	1.712	5.353	16.487	4.537
187	0303131K	Min. Essen. Emerg. Comm. Netw. (MEECN)	07	8.056	7.662	9.482	9.749
192	0303140K	Information Systems Security Program (ISSP)	07	0.000	0.000	2.300	0.000
193	0303148K	DISA Mission Support Operations	07	3.195	1.219	0.000	1.174
195	0303149K	C4I for the Warrior	07	6.221	6.526	0.000	0.000
196	0303150K	Global Command and Control System	07	50.882	62.237	47.237	36.613
197	0303153K	Joint Spectrum Center	07	14.356	12.401	18.653	19.446
198	0303170K	Net-Centric Enterprise Services	07	74.511	28.522	43.424	9.490
199	0303610K	Teleport Program	07	7.078	14.370	5.798	2.073
216	0305208K	Distributed Common Ground/Surface Systems	07	0.000	7.424	15.800	3.248
		Total Operational System Develop. (BA 7)		263.864	263.724	267.942	195.772
		TOTAL DISA RDT&E		334.405	337.625	366.186	375.724

Exhibit R-1, RDT&E Programs (Exhibit R-1, page 1)

Exhibit R-2, RDT&E Budget Item Justification				Date: February 2007						
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/05				R-1 ITEM NOMENCLATURE Defense Message System/PE 0303129K						
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13		
Defense Message System/DM01	11.717	11.160	0.0	0.0	0.0	0.0	0.0	0.0		

A. Mission Description and Budget Item Justification:

The Defense Message System (DMS) provides secure and accountable messaging services to meet the full range of organizational messaging needs throughout the Department of Defense (DoD). The Office of Assistant Secretary of Defense for Networks, Integration and Information (OASD/NII) directed development of DMS and mandated DoD's transition from legacy systems to DMS. DMS fulfills Joint Staff validated and prioritized operational requirements for an integrated writer-reader capable, organizational messaging system that is accessible worldwide (to include tactically deployed military personnel), and interfaces to our Allies. DMS utilizes Commercial-Off-the-Shelf (COTS) and modified COTS components to provide multi-media messaging and directory capabilities that complement and leverage the Global Information Grid (GIG). DMS capability exceeds that of pure COTS applications with reliable handling of information at all classification levels, compartments, and handling instructions, thus meeting DoD's unique messaging requirements and maintaining interoperability with our Allies. DMS incorporates state-of-the-art information technologies, including the internationally developed Allied Communications Protocol (ACP) 120 implementation of the Common Security Protocol (CSP), which provides automated access controls for compartments, code words, and caveats. Public Key Infrastructure (PKI) certificates are used for authentication and access control. DMS utilizes DoD Class 4 PKI products developed by the National Security Agency (NSA) to provide message signature and encryption via approved algorithms and protocols (FORTEZZA). This is referred to as DMS "high grade" service and supports the level of protection required for unclassified and classified military organizational messaging. A key tenet of the DMS acquisition strategy is to leverage commercial products to the maximum extent possible. This strategy necessitates continued software integration and testing of commercial product updates (operating systems and applications) throughout the life cycle to avoid obsolescence and to ensure adequate life cycle support. The DMS received its Milestone III approval from ASD/C3I in July 2002. ASD/NII designated DMS as a sustainment effort on 16 May 2005 resulting in the termination of investment funding starting in FY08. During the sustainment phase,

system/product modifications and associated integration and testing are focused on commercial evolution, security improvements to meet changing security threats, and minor product usability improvements.

Exhibit R-2, RDT&E Budget Item Justification				Date: February 2007					
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COST (in millions)	FY06	FY07	FY08		FY09	FY10	FY11	FY12	FY13
Defense Message System/DM01	11.717	11.160	0.0		0.0	0.0	0.0	0.0	0.0

DISA is working with the Joint Staff, Services, Agencies, and industry to insure DoD's Command and Control (C2) messaging requirements are met through convergence with emerging commercial capabilities. This Program Element (PE) is under Budget Activity 5 and involves commercial evolution that ensures supportability, improves usability, improves performance, and defends against changing security threats. A number of DMS products formerly provided by NSA have been maintained by DISA since FY 2006, as part of each maintenance release. While these products have become part of DMS releases (including operating system updates).

Accomplishments/Planned Program:

DMS Maintenance Release	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	7.616	$\overline{7.750}$	0.000	0.000

RDT&E funds support software integration and developmental testing activities required to avoid complete divergence of DMS products from current commercial technology and activities required to meet evolving DoD security policies and to counter evolving information warfare threats. Products newly implemented by the Services and Agencies must also be tested and integrated into the system to ensure compatibility and interoperability and for configuration management. System improvements, such as patches (for bug fixes), commercial service packs, and mitigation of emerging security vulnerabilities, are integrated and implemented through DMS software releases, which are similar to commercial Service Packs. Beginning in FY 2006, a number of DMS products formerly provided by NSA began to be maintained by DISA (updated and integrated as part of each DMS Release), including operating system updates. Future DMS releases will provide for engineering and integration of security, interoperability, and communications support capabilities and functionality unique to DMS operations in the Intelligence Community (IC) and tactical environments. Areas of focus will be resolution of IC- functional capabilities and legacy interoperability issues that are identified as the IC increases their implementation of DMS.

In addition, DMS security services (FORTEZZA) will be migrated from a principally client/server topology to a principally domain or "boundary server" topology. This represents a significant evolution of the DMS to provide a

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COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Defense Message System/DM01	11.717	11.160	0.0	0.0	0.0	0.0	0.0	0.0	

higher degree of user service while removing the complexities associated with FORTEZZA from the users' workstations. To allow full-scale implementation, existing products will require significant performance and scalability enhancements. In FY 2006 and FY 2007, the DMS program will continue to maintain a number of DMS products formerly provided by NSA in addition to the regular suite of DMS products originally developed and maintained by DISA.

DMS Systems Engineering	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	2.040	2.300	0.000	0.000

RDT&E funds support system engineering activities associated with DMS releases and activities required in support of evolving DoD security policies and to counter evolving information warfare threats. The supported tasks include program and systems management, technical assessments of system performance against operational requirements, and analysis of recommended solutions to any identified deficiencies or security vulnerabilities. Focus for FY06 and FY07 will be on assessment of and resolution of scalability, operational, and security issues which may arise as the Services/agencies consolidate their messaging facilities and implement enterprise-level "boundary server systems".

Testing Support	<u>FY 06</u>	<u>FY 07</u>	FY 08	FY 09
Subtotal Cost	2.061	1.110	0.000	0.000

DMS releases undergo developmental, operational, and security testing before widespread fielding. The Joint Interoperability Test Command (JITC) provides DMS test support for all new releases, including correction of problems identified with product functionality or system capability. Information Assurance Vulnerability Alerts (IAVAs) are continually assessed and often require product changes either within a software release or asynchronously. Requisite product changes are tested and delivered to protect and sustain the fielded system. In FY 2006 and FY 2007, changes identified through operational usage will be implemented after completion of appropriate developmental and operational tests.

Exhibit R-2, RDT&E Budget Item Justification				Date: February 2007					
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/05				R-1 ITEM NOMENCLATURE Defense Message System/PE 0303129K					
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Defense Message System/DM01	11.717	11.160	0.0	0.0	0.0	0.0	0.0	0.0	

B. Program Change Summary:

	FY 06	FY 07	FY 08	<u>FY 09</u>
Previous President's Budget	$\overline{13.17}$ 6	11.202	7.621	7.596
Current Submission	11.717	11.160	0.000	0.000
Total Adjustments	1.459	-0.042	-7.621	-7.596

Change Summary Explanation:

FY 2006 change due to internal DISA redistribution of funds.

FY 2007 change due to Budget and Congressional actions.

FY 2008 and FY2009 changes are due to revised fiscal guidance.

C. Other Program Funding Summary:

									То	Total
	FY 06	FY 07	FY 08	FY 09	FY 10	FY 11	FY 12	FY 13	Complete	Cost
Procurement, DW	8.792	6.222	0.000	0.000	0.000	0.000	0.000	0.000	Contg	Contg
O&M, DW	19.565	18.550	15.140	17.628	17.827	17.323	17.350	Contg	Contg	

D. <u>Acquisition Strategy</u>: The overall strategy is based upon the fundamental premise that Commercial-Off-the-Shelf products will continue their evolution through the constant refresh of commercial technology. To maintain an interoperable system, DMS will continue to use a single contractor as an overall integrator. Contract Administration is under a fee for service arrangement by the DMS Contracting Office, which is based at Maxwell Air Force Base - Gunter Annex, Alabama. Additionally, DMS utilizes contract vehicles within DISA to acquire other equipment and services to support the implementation of DMS, such as Network Centric Solutions (NETCENTS) and the Next Generation Contracts. Contracts have been competitively awarded and provide support in the following areas: program planning and control; analytic services of the DMS system integration; organizational messaging; tactical deployment; operations; configuration management; and training and logistics. These contracts also provide support for the fielding of Virtual

Exhibit R-2, RDT&E Budget Item Justification				Date: February 2007						
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COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13		
Defense Message System/DM01	11.717	11.160	0.0	0.0	0.0	0.0	0.0	0.0		

Private Networking (VPN) technology that provides protection for specific aspects of the DMS backbone. The DMS Global Service Manager employs several strategies for the acquisition of products and services:

- 1. Ordering of DMS hardware, software, integration, engineering and technical services from the DMS integration contract.
- 2. Standard commercial products and services required to accomplish DMS implementation are procured via existing GSA Schedule or other high volume/ID-IQ contract vehicles. Specialized security products (libraries/drivers) are currently provided by NSA and incorporated as Government Furnished Equipment (GFE) by the integrator.
- 3. ASD/NII designated DMS as a sustainment effort on 16 May 2005, resulting in the termination of investment funding starting in FY08.

E. Performance Metrics:

Key Performance Parameters (KPPs) were established to ensure DMS system performance meets or exceeds critical operational requirements contained in the validated Joint Staff requirements document. For each KPP, an objective and threshold value has been established, and measures are monitored each month. There are 24 KPPs for DMS, as defined in the DMS Acquisition Program Baseline. A subset of these KPPs is described below.

KPP Name	Objective	Actual Result	Status
Backbone System Availability	≥ 99% availability of Regional Node	99.67%	Green
Local Site Availability	≥ 99% availability of	99.4%	Green

Exhibit R-2, RDT&E Budget Item	Justificati	lon		Date: Februar	y 2007			
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/05				R-1 ITEM NOMEN Defense Messag		0303129К		
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Defense Message System/DM01	11.717	11.160	0.0	0.0	0.0	0.0	0.0	0.0
	Commis	l ssioned Sit	es					
Directory Search, Level 5		ec for DMS Jetwork LAN		0.82 sec	Green	1		
Directory Browse, Level 5		Sec for DMS Network LAN		9.74 sec	Green	1		
Backbone Speed of Service		$- \le 20$ mied of servi		1.53 min				
Directory Accuracy (Data Errors)		letected vi		1.3%	Green	1		

Exhibit R-3 Cost Analys:	is					DAT	E: Febr	uary 20	07					
APPROPRIATION/BUDGET ACT	TIVITY		PROGRAI	M ELEMI	ENT				_	PROJECT NAME AND NUMBER				
RDT&E, Defense-Wide/05			Defense 0303129		age Sy	stem ((DMS)/P	E	Def	ense Messa	age Syst	cem/DM01		
Cost Category	Contract Method & Type	Performing Activity & <u>Location</u>	Total PYs <u>Cost</u>	FY07 Cost	FY 07 Award <u>Date</u>	FY08 Cost	FY 08 Award <u>Date</u>	FY09 Cost	FY09 Award <u>Date</u>	Cost To Complete	Total <u>Cost</u>	Target Value of <u>Contract</u>		
Product Development Maintenance Release & Sys Engineering	CPAF/ C	Lockheed Martin, Manassas, VA	27.652	10.050	05/07	0.00		0.00		0.00	37.702	37.702		
Subtotal Product Developmer	nt		27.652	10.050		0.000		0.000						
Test and Evaluation Developmental Test & Evaluation	MIPR	Joint Inter- Operability Test Command (JITC), Indian Head, MD	6.696	1.110	10/06	0.000		0.000		0	7.848	7.848		
	CPAF/ SS	Data Systems Analysts Fairfax, VA	1.570	0.000	N/A	0.000	N/A	0	N/A	0	1.570	1.570		
Conduct ST&E	MIPR	Field Security Ops DISA, Letterkenny Army Depot, PA		0.000	N/A	0.000	N/A	0		0	0.000	0.000		
Operational Test & Evaluation	MIPR	JITC	1.050	0.000	N/A	0.000	N/A	0		0	1.050	1.050		
Subtotal Test and Evaluation		Ft Huachuca, AZ	9.316	1.110		0.000		0.000						
		TOTAL	36.968	11.160		0.000		0.000						

APPROPRIATION/BURDT&E, Defense-Wic	_		ACT	'IVI	ſΥ				Pi D	rogr efer	ram 1se	Ele Mes	me ssa	nt N ge S	Nun Sys	nbe ten	er ai n Pl	nd N E 03	ame 0312	9 29K						ect N S/DM		ber	and	Nar	ne		
Fiscal Year		20	06			2	007			20	800				200	9			20	10			20)11			20)12			20	013	
	1	2	3	4	1	2	3	4	1	2	3	4	,	ı	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	3
DMS Product Development and Testing Assessment (DMS R3.1 Maintenance Release and yearly Updates)			Λ			Y.	_	<u> </u>																									
Security Product Development and Testing		\wedge				Δ	<u></u>																										

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Operational Assessment (DMS R3.1 Maintenance Release and yearly Updates) Implementation	
DMS Product Operational Assessment (DMS R3.1 Maintenance Release and yearly Updates) Implementation to Infrastructure	Fiscal Year
Operational Assessment (DMS R3.1 Maintenance Release and yearly Updates) Implementation	
	Operational Assessment (DMS 3.1 Maintenance Release and yearly

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Exhibit R-4a Schedule Detail			DAT	E: February	2007			
APPROPRIATION/BUDGET ACTIVITY		PROGRAM ELEM	ENT		PROJ	ECT NAME AND I	NUMBER	
RDT&E, Defense-Wide/05		Defense Messa	ge System / P	Е 0303129К	DMS /	DM01		
	TT 0006			TT 0000	TT 0010	TT 0011	TT 0010	TT 0010
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
	10 - 20	10 - 20						
Begin Development and Testing of DMS R3.1	1Q & 3Q	1Q & 3Q						
MR & yearly Updates								
Security Product	2Q	2Q						
Development &	~	~						
Testing								
R3.1 & R3-1 Update	1Q & 4Q	2Q & 4Q						
Operational Assessment								
Implementation To	1Q & 3Q	1Q & 3Q						
Infrastructure	10 & 30	10 & 30						

Defense Information Systems Agency FY 2008 President's Budget Submission R-5 Exhibit

Termination Liability Funding For Major Defense Acquisition Programs RDT&E Funding (\$000)

Program	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
Defense Message System (DMS) PE0303129K	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000

- 1. The government may terminate a contract based on convenience by providing the contractor with a written notice within a specified number of days. The preliminary notice will include an issue to stop future work on the current contract. The government follows FMR guidance as determined by specified contract.
- 2. If the government exercises this option, the termination measure will be in concordance with those measures as set forth by GSA Schedules, IDIQ contracts and the FAR.
- 3. The total termination contract value will be determined by a mutual agreement between the contractor and the government.

Exhibit R-2, RDT&E Budget Item Justification	DATE: Fel	oruary 200	17					
APPROPRIATION/BUDGET ACTIVITY			R-1 ITEM I	NOMENCLATU	RE			
RDT&E, Defense-Wide/05			Global Cor	mbat Suppo	rt System	(GCSS) /	PE 0303143	lk
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Global Combat Support System (GCSS CC/JTF) CS01	17.139	18.486	18.129	18.725	19.574	20.152	20.857	20.857

A. Mission Description and Budget Item Justification:

The Global Combat Support System (Combatant Command/Joint Task Force) (GCSS (CC/JTF) provides end-to-end visibility of retail and unit level Combat Support (CS) capability up through the National Strategic Level facilitating information interoperability across and between CS and Command and Control (C2). In conjunction with other Global Information Grid elements including Global Command and Control System - Joint, Defense Information System Network, Defense Message System, Defense Enterprise Computing Center Detachments, and the Combatant Commands, Services, and Agencies information architecture, GCSS(CC/JTF) provides the information technology (IT) capabilities required to move and sustain joint forces throughout the spectrum of military operations. Per direction of the Joint Staff (JS), within the GCSS Family of Systems (FoS), DISA is responsible for two main efforts: system architecture and engineering for the GCSS FoS; and development, integration, fielding, and operation and maintenance of the GCSS (CC/JTF). GCSS (CC/JTF) provides enhanced CS situational awareness to the joint warfighter by integrating CS information into the C2 environment, and facilitating communications between the forward deployed elements and the sustaining bases, ultimately resulting in a faster, more efficient decision making process for the joint warfighter. GCSS (CC/JTF) significantly increases access to information stored in disparate databases via a single-sign-on, web Portal application by using a SIPRNet Public Key Infrastructure certificate. The administration, data mediation, and enterprise management features provide the springboard for delivery of capabilities to meet the vision of the future net-centric environment. GCSS (CC/JTF) falls under "Exploit the GIG for Improved Decision Making" and is postured to accomplish the objective Net Centric Vision of by using web-based technology to meet the Focused Logistics tenets of Joint Vision 2020 (JV 2020). This program element is under Budget Activity 5 because it involves the development of major upgrades that increase the performance of existing systems.

	FY06	FY07	<u>FY08</u>	FY09
Subtotal Cost:	2.855	2.855	2.641	2.800

Exhibit R-2, RDT&E Budget Item Justification	DATE: Fel	bruary 200	7					
APPROPRIATION/BUDGET ACTIVITY			R-1 ITEM I	NOMENCLATU	RE			
RDT&E, Defense-Wide/05			Global Cor	mbat Suppo	rt System	(GCSS) /	PE 0303143	LK
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Global Combat Support System (GCSS CC/JTF) CS01	17.139	18.486	18.129	18.725	19.574	20.152	20.857	20.857

System Architecture and Engineering - This effort involves system architecture and engineering for the GCSS (CC/JTF) and for the GCSS FoS. During FY 2006, funds were used to complete the initial system and data architecture for the GCSS FoS improving interoperability and information sharing at the Combatant Command and Joint Task Force levels. Work continued with GCSS FoS programs and related projects including the GCSS AF, Navy Taskforce Web (NTW), Theater Medical Information Program (TMIP) and the Joint Total Asset Visibility and Integrated Data Environment (JTAV/IDE) to ensure individual program alignment with the FoS architecture. Funds were also used to conduct the analysis and the purchase of the new Enterprise Information Integration tool to support a more robust and modern infrastructure, enabling the Program to meet the National Information Infrastructure (NII) vision for a Net-Centric Enterprise Services (NCES) environment. Security work focused on the continued development of the web-based security guard and the initial development of a PKI enabled single-sign-on solution which enables user authentication and access controls across all FoS applications.

GCSS (CC/JTF) - This effort involves the development, integration, and fielding of the GCSS (CC/JTF). RDT&E funds for FY 2007 and beyond support life cycle development efforts, requirements analysis, system engineering, software development, configuration management, and testing activities.

During FY 2007 through FY 2008, the Program incrementally implements the next-generation service-oriented architecture (SOA) in a net-centric environment for GCSS (CC/JTF) Phase 6, which includes enhancements of the new Enterprise Information Integration (EII), Business Intelligence (BI), Workflow, Knowledge Management, Web Service Management, and Security tools. The new net-centric environment also includes incremental implementation of a more robust Continuity of Operations Plan (COOP), failover, Enterprise System Management (ESM), and security (e.g., intrusion detection on GCSS strategic servers and next generation guards) processes and tools. Phase 6 also includes the Force Closure capability, which allows the user to visually monitor and generate complex reports showing current location, movement, and status of assigned assets including personnel and equipment. The Electronic Battlebook capability creates a repository for documents in a controlled shared environment, which uniquely configures and manages these documents by combatant commands. The continuing evolution to an SOA enables development of fully net-enabled capabilities and allows

Exhibit R-2, RDT&E Budget Item Justification	DATE: Fel	bruary 200	17					
APPROPRIATION/BUDGET ACTIVITY			R-1 ITEM I	NOMENCLATU	RE			
RDT&E, Defense-Wide/05			Global Cor	mbat Suppo	rt System	(GCSS) /	PE 030314	1K
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Global Combat Support System	17.139	18.486	18.129	18.725	19.574	20.152	20.857	20.857
(GCSS CC/JTF) CS01								

accelerated introduction of new data source integration and application development; permits greater flexibility for the end-user in how they evaluate and view fused data; increases dynamic report capability; provides more rapid exposure of data to Communities of Interest; and increases security. System architecture and engineering support to GCSS FoS focuses on the integration of new technologies that improve interoperability and data sharing at the Combatant Command and Joint Task Force levels. Work continues on the architecture implementation engineering solutions across all FoS programs and projects.

B. Program Change Summary:

	<u>FY06</u>	<u>FY07</u>	<u>FY08</u>	FY09
Previous President's Budget	17.695	18.566	18.963	19.379
Current Submission	17.139	18.486	18.129	18.725
Total Adjustments	-0.556	-0.080	-0.834	-0.654

Change Summary Explanation: FY 2006 - FY2009 changes due to change in revised fiscal guidance to the defense-wide RDTE appropriation.

C. Other Program Funding Summary:

									10	IOLAI
	FY06	FY 07	FY 08	FY 09	FY 10	FY 11	FY 12	FY 13	Complete	Cost
Procurement, DW	2.650	2.641	2.596	2.810	2.999	3.064	3.171	3.171	Contg	Contg
O&M, DW	14.093	14.623	15.192	17.042	17.195	16.715	16.678	16.647	Contg	Contg

D. <u>Acquisition Strategy</u>: GCSS (CC/JTF) strives to maximize system performance, promotes the use of commercial services, shifts risk away from the government, and attempts to achieve savings. To realize these goals, a Performance Based Services Acquisition (PBSA) Task Order (TO) for Software Development & Integration (SD&I) services was awarded.

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY			R-1 ITEM I	NOMENCLATU	RE					
RDT&E, Defense-Wide/05			Global Combat Support System (GCSS) / PE 0303141K							
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13		
Global Combat Support System (GCSS CC/JTF) CS01	17.139	18.486	18.129	18.725	19.574	20.152	20.857	20.857		

In the past, various contractors developed components of the system with the government acting as the integrator. This approach did not prove to be the most efficient or effective method. The intent of the TO is to improve the software development and integration process by using a single system integrator who is responsible for effectively executing the associated processes and delivering exceptional products to support the warfighter.

A secondary objective of the PBSA is to meet the mandates prescribed by the OMB Memorandum dated September 7, 2003, "Increasing the use of Performance-Based Service Acquisition" and the OSD policy dated August 19, 2003, that 50% of applicable contract awards will be performance based service acquisitions (PBSA). This TO award enables GCSS (CC/JTF) to successfully meet these mandates.

Previously, all GCSS (CC/JTF) software development contractors were awarded as Time & Material contracts. The model on contract type shifts with the award of the PBSA. The SD&I effort incorporates a hybrid of Firm Fixed Price and Cost Plus Award Fee elements, which mitigates risks associated with cost.

E. <u>Performance Metrics</u>: GCSS (CC/JTF) develops and fields capabilities that are based upon Joint Staff validated, approved, and prioritized functional requirements derived from the approved GCSS (CC/JTF) Operational Requirements Document (the ORD is transitioning to a Capability Development Document which has been approved and is awaiting signature). All of these requirements and goals are translated into Phases with specific capability increments, which have established cost, schedule, and performance parameters approved by the DISA's Component Acquisition Executive/Milestone Decision Authority. Additionally, GCSS (CC/JTF) has an approved Incremental Program Baseline for each Phase, which baselines cost, schedule, and performance metrics specific to each capability increment.

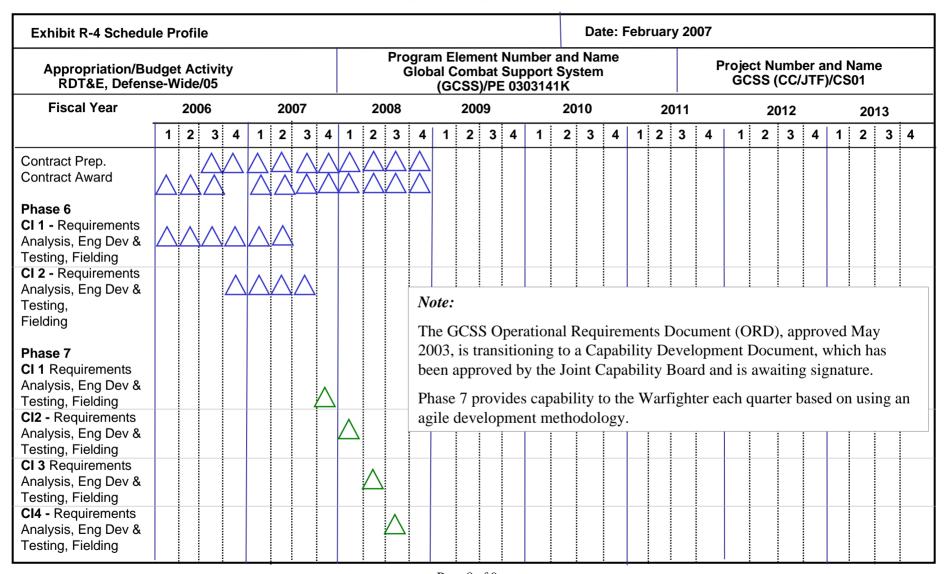
Metrics are gathered through several sources and include functional user's satisfaction, local system administrator feedback, and customer surveys. For each release, GCSS (CC/JTF) gathers metrics from the strategic servers throughout the lifecycle of the release. Metrics and requirements are also gathered directly by the GCSS Customer Requirements Team and the GCSS Fielding and Installation Team during onsite training/installations. GCSS (CC/JTF) also gathers metrics on a routine basis directly from the strategic servers. These metrics are analyzed by GCSS (CC/JTF) to ensure

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/05			Global Combat Support System (GCSS) / PE 0303141K							
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13		
Global Combat Support System	17.139	18.486	18.129	18.725	19.574	20.152	20.857	20.857		
(GCSS CC/JTF) CS01										

that Key Performance Parameters (KPPs) continue to be met and/or whether system enhancements/capabilities could be of benefit to the user. Future capabilities include tools that allow GCSS (CC/JTF) to refine and enhance the type of performance metrics that can be gathered and analyzed. This becomes increasingly important as GCSS (CC/JTF) continues to integrate additional data sources and federated applications, and completes the implementation of the EII and BI tools. This postures and allows GCSS (CC/JTF) to directly support DoD's Net-Centric Vision of exposing and consuming web services. However, performance is key in this type of environment and as GCSS (CC/JTF) usage increases and new capability increments are fielded, GCSS (CC/JTF) will continue to gather metrics to ensure the system is meeting established KPPs and the customer's requirements.

Exhibit R-3	Cost Analys	sis				DATE:	February 2007					
APPROPRIATIO	ON/BUDGET AC	CTIVITY	PROGRAM E	LEMENT				PROJECT	NAME AN	D NUMBER		
RDT&E, Defer	nse-Wide/05		Global Co			ystem (G	CSS			upport Syst		
			CC/JTF) P	E 03031	.41K			Command/	Joint T	ask Force)	(GCSS C	C/JTF)/CS01
Cost Category	Contract Method & Type	Performing Activity & Location	Total PYs <u>Cost</u>	FY 07	FY 07 Award Date	FY 08 Cost	FY 08 Award Date	FY 09 Cost	FY 09 Award Date	Cost to Complete	Total Cost	Target Value of <u>Contract</u>
Management Services	FFRDC	MITRE, Vienna, VA	14.129	1.710	11/06	1.850	11/07	1.973	11/08	Contg	19.662	19.802
	CPFF	UMD, Eastern Shore M	1.021 D	0	05/07	0	05/08	0	05/09	Contg	1.021	1.231
	MIPR	IDA, Alexandria, VA	0.749	0.210	01/07	0.210	01/08	0.210	01/09	Contg	1.379	1.379
	MIPR	JFCOM, Norfolk, VA	0.100	0	N/A	0	N/A	0	N/A	0	0.100	0.100
Product Development	T&M	ENTERWORKS, Sterling, VA	8.745	0	N/A	0	N/A	0	N/A	0	8.745	8.745
	T&M	WFI (DSI), Manassas, VA	4.125	0	N/A	0	N/A	0	N/A	0	4.125	4.125
	FFP/TM	NGMS, Reston, VA	10.000	12.152	11/06	11.787	11/07	12.260	11/08	Contg	46.129	48.000
	T&M	SAIC, Falls Church, V	19.064	0	N/A	0	N/A	0	N/A	0	19.064	19.064
	CPFF	NGIT, Reston, V		1.332	N/A	1.332	N/A	1.332	N/A	0	21.693	21.693
	T&M	UNISYS, Falls Church, V	6.612 A	1.300	01/07	1.300	01/07	1.300	01/08	Contg	10.512	10.512
	MIPR	FGM, Reston, VA	5.482	0	N/A	0	N/A	0	N/A	0	5.482	5.482
	FFP	Merlin, McLean, VA	1.664	0	N/A	0	N/A	0	N/A	0	1.664	1.664
	MIPR	JDTC, Ft Eustis, VA	1.019	0.446	11/06	0.450	11/07	0.450	11/08	Contg	2.365	2.365
	MIPR	CSC, Norfolk, VA	0.300	0	03/07	0	03/08	0	03/09	Contg	0.300	0.300
Test & Evaluation	CPFF	COMTEK, Sterling VA	3.902	0	03/07	0	03/08	0	03/09	Contg	3.902	3.902
	MIPR	SSO, Montgomery	0.500	0	10/06	0	10/07	0	10/08	Contg	0.500	0.550

Exhibit 1	R-3 Cost Ana	lysis	-			DATE:	Februa	ary 2007			<u> </u>	
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/05		PROGRAM ELEMENT Global Combat Support S CC/JTF) PE 0303141K			System (GCSS	Global C	ombat S	D NUMBER upport Syst ask Force)	-	atant C/JTF)/CS01	
	MIPR	NSA	0	0	08/07	0	08/08	0	08/09		0.0	0.154
	MIPR	DIA	0.076	0.300	10/06	0.300	10/07	0.300	10/08	Contg	0.976	0.976
	NexGen	Pragmatics	0.259	0.686	06/07	0.600	06/08	0.600	06/09	Contg	2.145	2.145
	MIPR	JITC, Ft. Huachuca,AZ	0	0.350	11/06	0.300	11/07	0.300	11/08	Contg	0.950	0.950
Total			95.444	18.486		18.129		18.725			150.714	153.139



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Exhibit R-4a Schedule Detail			DATE:	February	2007					
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/05		_	pport System	System (CC/JTF)/			PROJECT NAME AND NUMBER Global Combat Support System (CC/JTF)/CS01			
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013		
Contract Preparation	3Q-4Q	1Q-4Q	1Q-4Q	TBD	TBD	TBD	TBD	TBD		
Contract Award	1Q-3Q	1Q-4Q	1Q-4Q							
Capability Increments										
Version 6.0 - Requirements Analysis, Eng Dev & Testing - Fielding	1Q-4Q	1Q 2Q								
Version 6.1 - Requirements Analysis, Eng Dev & Testing - Fielding	40	1Q-3Q 3Q-4Q								

Note: Schedule is TBD from FY 2008 - FY 2011 for Version 7. The GCSS Operational Requirements Document (ORD) was approved by the Joint Requirements Board (JRB) in November 2002 and validated by the Joint Requirements Oversight Council (JROC) in May 2003. The ORD is transitioning to a Capability Development Document which has been approved and is awaiting signature.

Exhibit R-2, RDT&E Budget Item Justifi	DATE: February 2007							
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOME	NCLATURE			
RDT&E, Defense-Wide/05				Joint Command	and Contro	l Program/E	PE 0303158	K
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Joint Command and Control	24.008	34.899	70.28	3 147.367	202.542	59.469	64.430	69.430
Program/JC01								

A. <u>Mission Description & Budget Item Justification</u>: The Net-Enabled Command Capability (NECC) is the DoD's principal command and control capability that will be accessible in a net-centric environment and focused on providing the commander with the data and information needed to make timely, effective and informed decisions. NECC draws from the command and control (C2) community to evolve current and provide new C2 capabilities into a fully integrated, interoperable, collaborative Joint solution. Warfighters can rapidly adapt to changing mission needs by defining and tailoring their information environment and drawing on capabilities that enable the efficient, timely and effective command of forces and control of engagements.

DoD has placed its emphasis upon NECC as the future of C2 for the warfighter. The Department cannot accomplish its mission to provide an integrated, flexible, and adaptable full spectrum DoD C2 capability by continuing to rely on independently built and deployed systems that result in situational awareness and force identification variations, data incompatibilities, and non-interoperable services and applications supporting time-critical decisions. Consequently, the Deputy Secretary of Defense has directed that DoD funding be internally realigned into the NECC Program. These funding realignments provide a single, integrated, coherent enhancement of the Department's capability for operational level Joint command and control (JC2) by addressing some of the shortfalls within NECC. FY 2008 will be primarily focused on NECC technology piloting activities in order to speed up the development, integration, testing, and evaluation of new C2 capabilities; while in FY 2009, the focus will be on the development of Situational Awareness and Deployment Planning C2 capabilities.

Transformation to future warfighting capabilities requires enhanced battlespace awareness, timely information exchange, and net-centric forces to support critical joint and multinational operations. Those Global Command and Control System (GCCS) Family of Systems (FoS) applications supporting the envisioned NECC concepts will evolve from their current state of joint and Service variants into a single integrated capabilities-based, NECC architecture. The GCCS FoS programs are:

- Global Command and Control System Joint (GCCS-J)
- Global Command and Control System Army (GCCS-A)
- Global Command and Control System Maritime (GCCS-M)
- Global Command and Control System Air Force Family of Systems (GCCS-AF FoS)

Exhibit R-2, RDT&E Budget Item Justifi	DATE: February 2007								
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOME	NCLATURE				
RDT&E, Defense-Wide/05				Joint Command and Control Program/PE 0303158K					
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Joint Command and Control	24.008	34.899	70.28	3 147.367	202.542	59.469	64.430	69.430	
Program/JC01									

During the transition phase, legacy GCCS FoS C2 capabilities/applications that do not comply with NECC concepts or architectures will be maintained to ensure no loss in near term operational capability. Those GCCS FoS capabilities conforming to NECC concepts and architectures will be leveraged and/or improved to meet NECC requirements. The GCCS migration is more than just moving to a net-centric environment. It includes developing supporting applications and functionality to support emerging concepts and processes, such as Adaptive Planning, Intelligence Campaign Planning, and incorporating the Joint Functional Concepts (JFCs). To assist this development, NECC will organize required C2 capabilities into joint MCPs and warfare domain-specific applications based on GIG Enterprise Services (GES) enabling shared access to Service/Agency/joint-provided data sources. To facilitate the rapid provisioning of capabilities to the warfighters, NECC will employ an Service-Oriented Architecture (SOA). Transformation will be successful when the appropriate segments of the Joint and Service systems have moved to NECC with no loss of current required capabilities.

NECC will replace the current C2 stove piped capabilities, represented by the GCCS FOS. NECC will promote decision superiority by enabling advanced distributive, collaborative information sharing vertically and horizontally. It will allow warfighters to define and tailor their information environment, rapidly adapting to changing mission needs and drawing on capabilities that enable efficient, timely, and effective command and control. NECC will provide the capability to collaboratively plan, execute, monitor, and assess joint and multinational operations by enabling vertical/horizontal information exchange across the joint/coalition command and control community, and when required, with Non-Governmental Organizations (NGOs) and external subject matter experts (SMEs). In addition to achieving interoperability across the mission space, NECC will facilitate the exchange of information across multiple security domains and will reduce logistics/support requirements (e.g., system administration, training, and maintenance).

In order to be responsive to the warfighter, NECC will employ a technical and programmatic approach that enables the rapid continuous delivery of C2 enhancements, resulting from tightly coupled processes for capability needs definition, solution development and test, and user engagement. Capability delivery will leverage existing, evolving, and emerging C2 capabilities, centers of excellence, architectures and standards, and commercial best practices. To facilitate this approach, NECC's warfighting capabilities have been grouped into joint focus areas called Mission Capability Packages (MCPs): Force Projection, Force Readiness, Situational Awareness, Intelligence, Force Employment (Air/Space Operations, Land Operations, Maritime/Littoral Operations), and Force Protection. The capabilities that are the primary focus of Increment I are Situational Awareness and the Deployment Planning C2 process.

The NECC Program will deliver continuous C2 enhancements to the Warfighter. The Program is founded on a single, net-

Exhibit R-2, RDT&E Budget Item Justifi	DATE: February 2007								
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOME	NCLATURE				
RDT&E, Defense-Wide/05				Joint Command and Control Program/PE 0303158K					
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Joint Command and Control	24.008	34.899	70.28	3 147.367	202.542	59.469	64.430	69.430	
Program/JC01									

centric, services-based C2 architecture and provide the decision support infrastructure that will enable the Warfighter to access, display, and understand the information necessary to make efficient, timely, and effective decisions. The Program is responsive to the Warfighter through tightly coupled capability needs, development, test, and user engagement processes. The Program leverages existing and evolving C2 capabilities and centers of excellence with it's "ABC" commitment to "Adopt-before-Buy, Buy-before-Create". Key to ABC is adaptation of commercial best practices, architectures and standards for C2. The NECC Program is ensuring that C2 capability evolves towards increased netcentricity and Joint mission integration.

Going forward, the development and delivery of C2 capabilities onto the Global Information Grid (GIG) must be conducted as an integral part of overall GIG operations. The NECC Program is proposing to extend the concept of GIG operations to include Capability Provisioning Activities (or CPAs). The main idea behind CPAs is to change the mindset of capability providers from infrequent block upgrades to rapid, continuous deliveries and ongoing product improvement.

A key part of DoD reaching the next phase of C2 is the GCCS FoS functional migration into the NECC architecture. This approach leverages the technical, functional, programmatic and operational aspects of the evolution that delivers maximum return on investment in warfighting capabilities.

The Defense Information Systems Agency (DISA), the Services, and Combatant Commands (COCOMs) will establish the Federated Development and Certification Environment (FDCE) for Capability Module (CM) development, integration, testing and certification. CM is the basic building block of NECC's capability development. The FDCE implements the processes and infrastructure needed to support distributed collaborative development and certification and will enable the use of distributed piloting. Piloting will be used as a key mechanism for developing, testing, evaluating, and certifying C2 capabilities.

Implementation and fielding of NECC will be accomplished by the Components via individual NECC or related C2 system programs. These implementing systems/programs integrate the material, training and logistics products of NECC with the other DoD Doctrine, Organization, Training, Materiel, Leadership and Education, Personnel and Facilities (DOTML-PF) elements essential to field an effective combat capability and satisfy joint architecture needs. The NECC implementing systems are the immediate consumers and distributors of NECC program applications and information services. Therefore, the NECC and associated Service implementing programs are mutually responsive to the needs of each. To establish appropriate coordination and synchronization, the sponsors for these Service systems participate in the governance

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007					
APPROPRIATION/BUDGET ACTIVITY				R-1	ITEM NOME	NCLATURE			
RDT&E, Defense-Wide/05				Joint Command and Control Program/PE 0303158K					
COST (in Millions)	FY06 FY07 FY08		}	FY09	FY10	FY11	FY12	FY13	
Joint Command and Control	24.008	34.899	70.28	33	147.367	202.542	59.469	64.430	69.430
Program/JC01									

process that guides integration, validation and prioritization of NECC capability needs. The managers and executives of these programs participate in the NECC acquisition processes that set delivery schedules and test criteria and that affect execution year resource allocation decisions.

NECC's goal goes beyond delivering the next generation of C2 capabilities. In today's world of highly dynamic, rapidly changing threats, the operational customer is demanding that new C2 capabilities be produced and delivered much more rapidly than is done today as well as be much more flexible and easy to use.

Moving to a state of continuous capability provisioning will require significant changes to existing development, testing, and evaluation processes. DoD C2 development is moving from producing a few large, complex, highly integrated systems, to producing many smaller, less complex, loosely connected network services. Testing must move from focusing on entire monolithic systems, to focusing on independent, incremental modules of capability. Operational evaluation must move from infrequent warfighter participation involving complex field tests to continuous warfighter evaluation involving a broad spectrum of evaluation methods. Finally, security accreditation must evolve from a systems-based accreditation methodology to a more fine-grain capability-based accreditation methodology.

NECC is forging the path for how the Department develops and delivers information technology solutions to the warfighter, being born Joint from the start, with Service personnel performing key functions in the Program, and picking the best approach for the warfighter, constructing the solution quickly, and moving forward with a militarily useful capability.

This R-2 Exhibit addresses the funding that is in the DISA Program Element (PE 03303158K) only.

Accomplishments/Planned Program:

	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	24.008	34.899	70.283	147.367

FY 2005 funding supported NECC concept refinement activities: developing the Technology Development Strategy (TDS), Test and Evaluation Strategy (TES), Clinger Cohen Act compliance, and Information Assurance Strategy. FY 2006 through

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007					
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOME	NCLATURE				
RDT&E, Defense-Wide/05				Joint Command	and Contro	l Program/E	PE 0303158	K	
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Joint Command and Control	24.008	34.899	70.283	3 147.367	202.542	59.469	64.430	69.430	
Program/JC01									

FY 2007 funding support the Technology Development (TD) phase activities and the pre-MS B activities necessary to reduce the risk across the life cycle of the program. FY 2008 through FY 2009 funding will support the System Development & Demonstration phase activities and the post-MS B activities necessary to demonstrate an affordable, supportable, interoperable, and producible system in its intended environment.

- In FY 2006 and FY 2007, NECC TD phase capabilities are being developed, integrated, tested and certified in a joint, distributed, collaborative development environment. Critical functional capabilities demonstrated in the Net-Centric Capability Pilot (NCCP), transitioned to NECC in FY05 and expanded upon during the NECC TD phase, are composed from many Combatant Command/Service/Agency web-enabled data sources and services (e.g., DISA to include available NCES Core Enterprise Service (CES) pilot services and some C2 Community of Interest (COI) User-Defined Operational Picture (UDOP) services, Service development and research commands, other agencies, Advanced Concept Technology Demonstrations (ACTDs), Programs of Record, and industry). These capabilities will continue to evolve as NECC capabilities. Pilot/demonstration capabilities are made available to users on the classified network for evaluation, maturation and limited operational use (through a participating Program of Record) per ASD(NII) direction.

NECC Development and Strategic Planning - NECC builds upon and expands the capabilities developed and integrated in the GCCS FOSs, and migrate the capabilities to a more modern, net-centric architecture. FY 2005 activities focused on several NECC pre-Milestone A tasks assigned to DISA by OASD(NII). These tasks included preparing the NECC Technology Development Strategy (TDS) and Test and Evaluation Strategy (TES). DISA also supported the OASD(NII)-led NECC Analysis of Alternatives (AOA). DISA was formally designated by as the NECC lead component. As the Lead Component, DISA concurrently stood up a Joint Program Executive Office (JPEO) and Joint Program Management Office (JPMO) and received a MS A decision in March 2006 followed immediately by entry into the TD phase activities. The TD phase spans FY06 through FY07. These activities include: 1) acquisition management, 2) system engineering and architectural analysis, 3) establish/operate/validate the FDCE, 4) technical risk reduction piloting efforts, and 5) planning for MS B and the System Development and Demonstration Phase (SDD). NECC is using the Timebox Concept to incrementally pilot and assess CMs. In FY 2006, NECC successfully conducted a number of Capability Provisioning Events (CPEs) as a part of NECC Timebox 1. The CPEs include the evaluation of the CPE, FDCE development stage, and NECC Information Assurance (IA) and Accreditation processes; the assessment of CMs; and the performance of stress and load testing on selected CMs.

- NECC SDD phase begins with MDA approval of a Milestone B decision authorizing entry into the SDD Phase and the

Exhibit R-2, RDT&E Budget Item Justifi	DATE: February 2007								
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOME	NCLATURE				
RDT&E, Defense-Wide/05				Joint Command and Control Program/PE 0303158K					
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Joint Command and Control	24.008	34.899	70.28	3 147.367	202.542	59.469	64.430	69.430	
Program/JC01									

immediate deployment of capabilities to support operational testing. NECC capabilities will be implemented in an evolutionary manner using a spiral development approach within distinct increments. Each increment is self-contained, targets specific user requirements and Key Performance Parameters (KPPs) as documented in the NECC Capability Description Document (CDD). In FY 2008 through FY 2010, NECC Increment 1 will deliver multiple Operational Capability Modules (OCMs), which are small, well bounded, and military useful capability modules. One or more OCMs satisfy requirements grouped by Capability Definition Packages (CDPs) that define the entirety of NECC Increment 1. NECC will employ an "ABC" philosophy by which existing and/or evolving C2 capabilities developed by the Combatant Commands, Services, and Agencies are delivered to the operational community via CPAs in the FDCE. This iterative process will allow development of matured capabilities that have achieved test and certification milestones proving their operational suitability and effectiveness, interoperability, and security for warfighter usage. Increment 1 culminates with a Full Rate Production Decision Review (FRPDR) to verify that all Increment 1 CDPs have been satisfied.

NECC was decreased in FY 2007 due to a Senate Appropriations Committee - Defense (SAC-D) reduction. As a result, the schedule for NECC Increment 1 has expanded from two years to three years. Delivery of critical C2 capabilities to the warfighter will be delayed.

B. Program Change Summary:

	<u>FY 07</u>	<u>FY 08</u>	<u>FY 09</u>
Previous President's Budget	47.031	50.783	25.967
Current Submission	34.899	70.283	147.367
Total Adjustments	-12.132	+19.500	+121.400

Change Summary Explanation:

Exhibit R-2, RDT&E Budget Item Justifi	DATE: February 2007							
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE							
RDT&E, Defense-Wide/05	Joint Command and Control Program/PE 0303158K							
COST (in Millions)	FY06 FY07 FY08		FY08	FY09	FY10	FY11	FY12	FY13
Joint Command and Control	24.008	34.899	70.28	3 147.367	202.542	59.469	64.430	69.430
Program/JC01								

The summary of spending has changed from the previous President's Budget for FY 2007 due to a SAC-D cut. In addition, the Department directed that FY 2008 funds totaling \$19.5M and FY 2009 funds totaling \$121.4M be reprogrammed to the NECC Program within DISA.

The FY 2008 and FY 2009 funding realignments are necessary to eliminate the Department's command and control capability degradation resulting from independently built and deployed systems that result in situational awareness and force identification variations, data incompatibilities, and non-interoperable services and applications supporting time-critical decisions. These funding realignments provide a single, integrated, coherent enhancement of the Department's capability for operational level Joint command and control (JC2) by addressing some of the shortfalls within the NECC Program.

Additional funding provided in FY 2008 will be primarily focused on NECC technology piloting activities in order to speed up the development, integration, testing, and evaluation of new C2 capabilities. The NECC Integration and Technology Piloting Framework will provide the means of exposing advanced command and control capabilities to the stakeholder communities for experimentation, testing, and assessment. These capabilities will be in various stages of technical maturity and the early and consistent stakeholder involvement both accelerates the process and optimizes production effectiveness of capabilities. The NECC Integration and Technology Piloting Framework will include CM developer support. This support will include partnering with material developers and assisting them with standards compliance and FDCE interaction, as well as those CM artifacts required for FDCE certifications. The framework will also support the Component Program Management Offices and Joint Forces Command with the integration of CMs at the interface level and ensure those CMs are integrated properly with other CMs and core services in the FDCE. In addition, the framework will ensure CM functional capability meets the needs of the warfighter and complies with CM developmental standards, interoperability, configuration management, and security requirements.

Additional funding provided commits DoD to a full level of development, integration, and deployment of new C2 capabilities. In Increment 1, NECC will provide major C2 improvements primarily in the areas of Situational Awareness and Adaptive Planning.

- Situational Awareness: NECC will provide fused battlespace awareness of current and projected Blue/Red/Gray force disposition through near real-time sensor data and Service/Agency/joint data sources. It will integrate joint blue force information into a common operational picture and provide access and display of blue force

Exhibit R-2, RDT&E Budget Item Justifi	DATE: February 2007							
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE							
RDT&E, Defense-Wide/05	Joint Command and Control Program/PE 0303158K							
COST (in Millions)	FY06 FY07 FY0		FY08	FY09	FY10	FY11	FY12	FY13
Joint Command and Control	24.008	34.899	70.28	3 147.367	202.542	59.469	64.430	69.430
Program/JC01								

locations for surface, subsurface, air, space, and ground units. Data sources will include Tactical Data Links, Line-Of-Sight/Non-Line-Of-Sight (LOS/NLOS) Blue Force Tracking devices, unattended ground stations (e.g. Federal Aviation Administration radar) and broadcast messages. NECC will allow the Joint Task Force Commander to execute force C2 through improved shared situational awareness via a global track data set from which any decision maker can create a relevant picture of the battlespace. NECC will include the capability to store, maintain and analyze previous Red Force Threat critical or significant activity/event archives. All of this will significantly improve the Department's predictive battlespace awareness support to course-of-action planning and execution.

- Adaptive Planning (AP): AP will be the Joint capability to create and revise plans rapidly and systematically, as circumstances require. AP will occur in a networked, collaborative environment, will require the regular involvement of senior DOD leaders, and will result in plans containing a range of options. At full maturity, AP will form the backbone of a future joint adaptive planning and execution system, supporting the development and execution of plans. AP will preserve the best characteristics of present day deliberate and crisis planning with a common process.

C. Other Program Funding Summary:

	FY 06	FY 07	FY 08	<u>FY 09</u>	<u>FY 10</u>	<u>FY 11</u>	<u>FY 12</u>	<u>FY 13</u>
O&M, DW	8.609	2.216	7.294	1.237	5.789	7.565	7.538	10.784

D. <u>Acquisition Strategy</u>: NECC will utilize existing indefinite-delivery-indefinite-quantity (IDIQ) contract vehicles of Federal DoD agencies and the Services. Support will span a wide array of areas to include acquisition planning, systems engineering, tech piloting, and test/certification activities. During this timeframe, the JPMO will build an acquisition strategy for the program. During the SDD phase, NECC will award multiple Task Orders (TOs) issued under several fully and openly competitively awarded IDIQ contracts. In many cases, NECC task orders will again be competed among the numerous vendors available under these IDIQ contracts through the fair opportunity to compete process required by the Federal Acquisition Streamlining Act (FASA). NECC will maximize the use of performance-based contracts in accordance with the OUSD (AT&L) DPAP guidance set forth in September 2006, and award fee incentives, and require contractors to establish and manage specific earned value data to mitigate risk and monitor deviations from

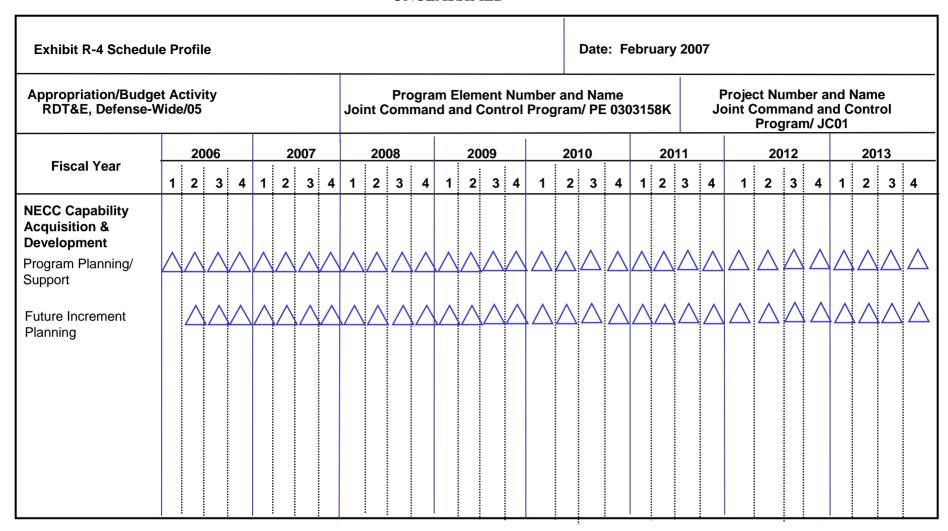
Exhibit R-2, RDT&E Budget Item Justifi	DATE: February 2007							
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE							
RDT&E, Defense-Wide/05	Joint Command and Control Program/PE 0303158K							
COST (in Millions)	FY06 FY07 FY0		FY08	FY09	FY10	FY11	FY12	FY13
Joint Command and Control	24.008	34.899	70.28	3 147.367	202.542	59.469	64.430	69.430
Program/JC01								

cost, schedule, and performance objectives. NECC will evaluate performance by conducting thorough Post-award Contract Reviews (PCRs) and periodic Contract Performance Reviews (CPRs).

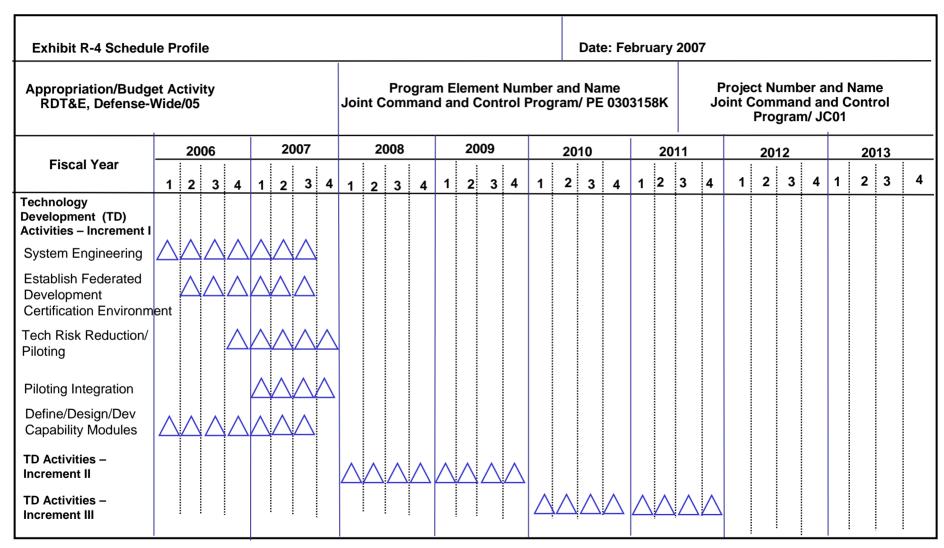
E. <u>Performance Metrics</u>: NECC supports several DISA Balanced Scorecard measures including net-centric compliance and providing Community of Interest (COI) capabilities to the warfighter. An internal project level Earned Value Management approach has been implemented, and a program level Earned Value Management System (EVMS) will be instituted once a MS B decision has been reached. The Program Manager will exercise oversight of contractor performance relative to established project cost, schedule, and performance milestones. Monthly In Process Reviews (IPRs) and routine program reviews will continue to be used to provide timely information on contractor expenditures. Routine status will also be provided through the OSD Integrated Product Team (IPT) structure. The NECC Program Manager also conducts bi-weekly critical path reviews at the Program Management Direction Team to ensure tasks are on track and to mitigate risk across the entire program. From an operational perspective, NECC is currently working to establish appropriate baselines for the items defined in its CDD. After such baselines have been established, NECC will have a means to evaluate the adequacy of the CM in support of the defined requirements.

Exhibit R-3 Cost Analysis					DATE: Febrary 2007								
APPROPRIATION/BUDGET ACT	IVITY	PROGRAI	M ELEMEN	T		PROJECT NAME AND NUMBER							
RDT&E, Defense-Wide/05		Joint (Joint Command and Control				Joint	Joint Command and Control Program/JC01					
		Program	m/PE 030	3158K									
	Contract Method &	Performing Activity &	Total PYs	FY07	FY07 Award	FY08	FY08 Award	FY09	FY09 Award	Cost To		Target Value of Contract	
Cost Category PEO C2C Operations	<u>Type</u> F&O	<u>Location</u> Various	<u>Cost</u> 0.627	<u>Cost</u> 2.699	<u>Date</u> Oct-06	<u>Cost</u> 2.780	<u>Date</u> Oct-07	<u>Cost</u> 2.863	<u>Date</u> Oct-08	Complete Contg	Total <u>Cost</u> Contg	11.833	
DISA CPMO Management Operations	F&O	Various	0.000	2.002	Oct-06	5.062	Oct-07	5.124	Oct-08	Contg	Contg	17.312	
JPEO/JPMO Management Operations	MOA	Various GOVT	0.000	9.587	Oct-06	9.875	Oct-07	10.171	Oct-08	Contg	Contg	39.803	
NECC CARD/Economic Analysis	FFP	GS5 LLC; Dumfries, VA	0.695	1.166	Jan-07	1.201	Jan-08	1.237	Jan-09	Contg	Contg	5.536	
NECC Acquisition Support	T&M	BIT; Falls Church, VA	1.763	0.000	Dec-06	1.816	Dec-07	1.870	Dec-08	Contg	Contg	7.319	
Program Management Support	F&O	KeyLogic Systems; Columbia, MD	0.361	0.000	N/A	0.000	N/A	0.000	N/A	Contg	Contg	0.361	
DISN LES	F&O		0.164	0.164	Oct-06	0.169	Oct-07	0.174	Oct-08	Contg	Contg	0.845	
Engineering Support	OTF&O	MITRE, FFRDC; McLean, VA	3.622	2.700	Oct-06	5.562	Oct-07	5.729	Oct-08	Contg	Contg	23.342	
Capability Modules (CMs)	F&O	Various	1.986	3.843	Jan-07	7.689	Jan-08	8.434	Jan-09	Contg	Contg	30.386	
Cross Functional Engineering Support	F&O	S&T Assoc; Arlington, VA	3.196	2.300	Sep-07	4.738	Sep-08	4.880	Sep-09	Contg	Contg	19.994	
BEA Licenses and Maintenance	F&O	Merlin International; Vienna, VA	0.953	0.000	Jan-07	0.981	Jan-08	1.011	Jan-09	Contg	Contg	3.955	
Systems Engineering Support	F&O	NexGen - FGM; Reston, VA	0.803	0.000	N/A	0.000	N/A	0.000	N/A	0.000	0.803	0.803	
FDCE, T&E, O&ILS, IA, and I&TP Support	F&O	Navy (SPAWAR); San Diego, CA	5.443	7.307	Dec-06	15.052	Dec-07	15.504	Dec-08	Contg	Contg	58.811	
NGC2, I&TP and SE Support	F&O	NGMS; McLean, VA	3.474	0.000	N/A	0.000	N/A	0.000	N/A	0.000	3.474	3.474	
C2 Technical Support	F&O	BAH; McLean, VA	0.860	0.000	N/A	0.000	N/A	0.000	N/A	0.000	0.860	0.860	

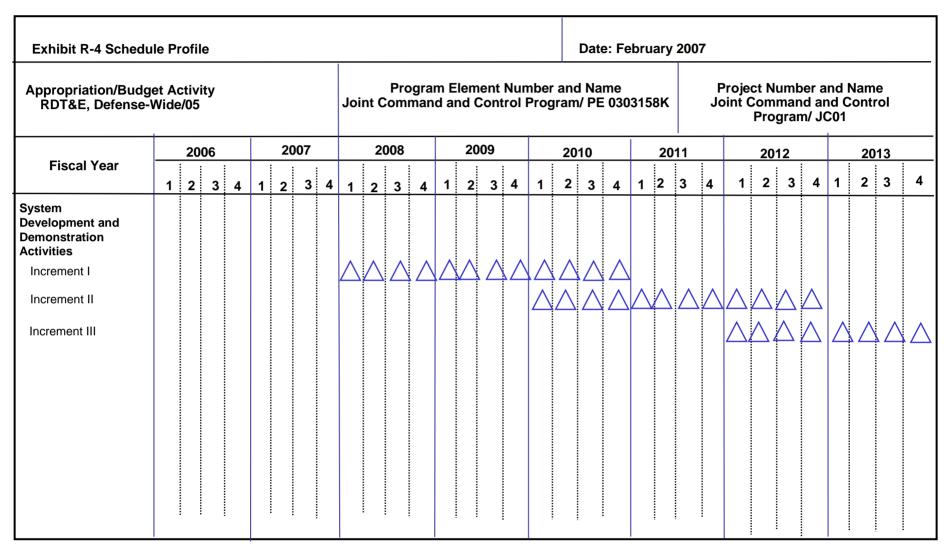
Exhibit R-3 Cost Analysis					DATE: Febrary 2007								
APPROPRIATION/BUDGET ACT	IVITY	PROGRA	M ELEMEN	1T	PROJECT NAME AND NUMBER								
				and Con	trol		Joint Command and Control Program/JC01						
		Progra	m/PE 030)3158K									
Integration & Tech Piloting	F&O	NexGen - SAIC; McLean, VA	1.384	0.000	N/A	0.000	N/A	0.000	N/A	0.000	1.384	1.384	
UDOP Situational Awareness	F&O	Various	0.065	0.000	N/A	0.000	N/A	0.000	N/A	0.000	0.065	0.065	
T&E Laboratory Support	F&O	Various	0.098	0.441	Oct-06	0.908	Oct-07	0.936	Oct-08	Contg	Contg	3.319	
Hardware/Software	F&O	Various	0.179	1.720	Nov-06	3.543	Nov-07	3.649	Nov-08	Contg	Contg	12.741	
JEFX-08 Exercise Support	F&O	TBD	0.000	0.075	Jan-07	0.155	Jan-08	0.159	Jan-09	Contg	Contg	0.548	
Test & Evaluation - Lead OTA/DT	F&O	JITC; Indian Head, MD	0.392	0.500	Oct-06	1.030	Oct-07	1.061	Oct-08	Contg	Contg	4.044	
CTF Support	F&O	TBD	0.000	0.200	Dec-06	0.412	Dec-07	0.424	Dec-08	Contg	Contg	1.461	
Capability Module Piloting Support	F&O	Army; Ft. Belvoir, VA	0.600	0.000	N/A	0.000	N/A	0.000	N/A	0.000	0.600	0.600	
ASAP ACTD	F&O	Air Force; USAFA, CO	0.050	0.000	N/A	0.000	N/A	0.000	N/A	0.000	0.050	0.050	
I&TP Technical IPA	F&O	UMES; Princess Anne, MD	0.198	0.195	Jun-07	0.201	Jun-08	0.207	Jun-09	Contg	Contg	1.008	
Operational Capability Modules (OCMs)	F&O	DISA; Arlington, VA	0.000	0.000	N/A	9.110	Oct-07	11.000	Oct-08	Contg	Contg	31.110	
Operational Capability Modules (OCMs)	F&O	Army; Ft. Belvoir, VA	0.000	0.000	N/A	0.000	N/A	18.233	Oct-08	Contg	Contg	36.467	
Operational Capability Modules (OCMs)	F&O	Air Force; Hanscom AFB, MA	0.000	0.000	N/A	0.000	N/A	18.233	Oct-08	Contg	Contg	36.467	
Operational Capability Modules (OCMs)	F&O	Navy (SPAWAR); San Diego, CA	0.000	0.000	N/A	0.000	N/A	18.233	Oct-08	Contg	Contg	36.467	
Operational Capability Modules (OCMs)	F&O	Marine Corps; Quantico, VA	0.000	0.000	N/A	0.000	N/A	18.233	Oct-08	Contg	Contg	36.467	
TOTAL		Quantito, VA	26.913	34.899		70.283		147.367					



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Page 13 of 15 R-1 Line Item No. 122 UNCLASSIFIED



Page 14 of 15 R-1 Line Item No. 122 UNCLASSIFIED

Exhibit R-4a Schedule Detail	DATE: February 2007	
APPROPRIATION/BUDGET ACTIVITY	PROGRAM ELEMENT	PROJECT NAME AND NUMBER
RDT&E, Defense-Wide/05	Joint Command and Control Program / PE	Joint Command and Control
	0303158K	Program / JC01

Schedule Profile	FY2006	FY2007	FY2008	FY2009	FY 2010	FY 2011	FY 2012	FY 2013
NECC Capability Acquisition & Development								
Program Planning/Support	1Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q
Future Increment Planning	2Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q	1Q-4Q
Technology Development (TD) Activities – Increment I								
System Engineering	1Q-4Q	1Q-3Q						
Establish Federated Development Certification Environmen	t 2Q-4Q	1Q-3Q						
Tech Risk Reduction/Piloting	4Q	1Q-4Q						
Piloting Integration		1Q-4Q						
Define/Design/Dev Capability Modules	1Q-4Q	1Q-3Q						
TD Activities – Increment II			1Q-4Q	1Q-4Q				
TD Activities – Increment III					1Q-4Q	1Q-4Q		
System Demonstration and Development Activities			10.10	10.10	40.40			
Increment I			1Q-4Q	1Q-4Q	1Q-4Q	40.40	40.40	
Increment II					1Q-4Q	1Q-4Q	1Q-4Q	10.40
Increment III							1Q-4Q	1Q-4Q

Exhibit R-2, RDT&E Budget Item Justification				DATE: Fe	bruary 200	7		
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM	NOMENCLATU	RE		
RDT&E, Defense-Wide/05				Electroni	c Commerce	/ PE 0305	840K	
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Electronic Commerce/EC01	6.698	0	0	0	0	0	0	0

A. Mission Description and Budget Item Justification:

This program supports initiatives to increase the application of Electronic Business/Electronic Commerce (EB/EC) across the Department of Defense (DoD). This funding continues the improvement of the WAWF application to support its exponentially increasing use as a result of the Defense Federal Acquisition Regulation Supplement (DFARS) that requires the use of WAWF in the receipt and acceptance of DoD goods and services. This program element is under Budget Activity 5 because it involves the development of upgrades that increase the functional performance of the existing eBusiness systems.

	FY06	<u>FY07</u>	<u>FY08</u>	FY09
Subtotal Cost	4.739	0.000	0.000	0.000

Wide Area Workflow (WAWF) -WAWF was designed to eliminate paper from the receipts and acceptance process of the DoD contracting lifecycle. The goal is to enable authorized Defense contractors and DoD personnel the ability to create invoices and receiving reports and access contract related documents. The contract documentation is available through a seamless interface with Electronic Document Access (EDA). WAWF supports DoD's efforts to reduce unmatched disbursements in the DoD receipt, acceptance, entitlement, and payment process through data sharing and electronic processing. The benefits to DoD are global accessibility of documents, reduced need for re-keying, improved data accuracy, real-time processing, secure transactions with audit capability and faster processing resulting in fewer interest penalties. For vendors, benefits include the capability to electronically submit invoices, reduction of lost or misplaced documents, and online access to contract payment records.

Accomplishments and Planned enhancements are as follows:

FY 2005: Release 3.0.6 - 3.0.8 to provide additional interfaces to logistics, to the Defense Contract Audit Agency (DCAA), and for continued sustainment.

FY 2006: Release 3.0.9 - 3.0.10 expands to other Federal customers as appropriate. Continued sustainment.

FY 2007: Program transferred to Business Transformation Agency (BTA) effective 1 October 2006.

	FY06	FY07	FY08	FY09
Subtotal Cost	1.95 ₉	0.000	0.000	0.000

System/Program Testing and Analysis - The DISA Electronic Commerce Infrastructure consists of multiple systems

Exhibit R-2, RDT&E Budget Item Justification				DATE: Fe	bruary 200	7		
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM	NOMENCLATU:	RE		
RDT&E, Defense-Wide/05				Electroni	c Commerce	/ PE 0305	840K	
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Electronic Commerce/EC01	6.698	0	0	0	0	0	0	0

developed for multiple organizations by multiple vendors. These individual systems are integrated into the Electronic Commerce Infrastructure. The Joint Interoperability Test Command (JITC) performs testing ranging from developmental, system/integration, operational acceptance, database conversion, migration, validation, stress, performance, and end-to-end testing in support of all releases and patches for eBusiness applications. The JITC supports Global Exchange Service (GEX), Electronic Document Access (EDA), Central Contractor Registration (CCR), WAWF, and the Federal Technical Data Solutions (FedTeDs). JITC also provides assistance in trouble-shooting issues that arise in deployed applications. Additionally, JITC provides service that includes configuration management support, help desk support, and business support.

Accomplishments and Planned Enhancements are as follows:

FY 2005 and FY 2006: JITC will provide end-to-end integrated operational testing for all major eBusiness applications to include GEX, EDA, WAWF, CCR and FedTeDS.

B. Program Change Summary:

	FY06	<u>FY07</u>	FY08	FY09
Previous President's Budget	6.698	0.000	0.000	0.000
Current Submission	6.698	0.000	0.000	0.000
Total Adjustments	0.000	0.000	0.000	0.000

Change Summary Explanation:

FY 2006 change due to fiscal adjustment.

FY 2007 change due to the transfer of the program to the Business Transformation Agency.

C. Other Program Funding Summary:

									<u>To</u>	<u>Total</u>
	FY 06	FY 07	FY 08	FY 09	FY 10	FY 11	FY 12	FY 13	Complete	Cost
O&M, DW	21.065	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	21.079

Exhibit R-2, RDT&E Budget Item Justification				DATE: Fe	bruary 200	7		
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM	NOMENCLATU	RE		
RDT&E, Defense-Wide/05				Electroni	c Commerce	/ PE 0305	840K	
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Electronic Commerce/EC01	6.698	0	0	0	0	0	0	0

D. <u>Acquisition Strategy</u>: Various types of contracting vehicles are utilized in accomplishing the overall mission objectives. Several vendors provide analysis and development of system interoperability to legacy systems, thus eliminating the duplication of effort and functions. Both large and small businesses have been put on contract to support eBusiness applications and eBusiness engineering. All of these efforts will allow DoD to improve business efficiency by drastically reducing processing time and the amount of paper received, processed, and stored.

E. Performance Metrics:

Initially, because the emphasis was on rapid transition from prototype to operating environment, early focus was on prototype, production, and functionality rather than program performance. However, the intent was to migrate to a more formal program management process once WAWF matured as a product while still maintaining the tenets of streamlined evolutionary acquisition. Currently, with each fiscal year, a prioritized list of requirements is developed and agreed to by the WAWF Joint Requirements Board (JRB). The JRB has representatives from the Services and Defense Agencies. Based on the list of requirements, a WAWF overall schedule is produced which includes integration activities with other Electronic Business applications, and it identifies products and milestones. A detailed work breakdown structure is then developed internal to each WAWF contractor. Fiscal year funds are allocated to contractors based on the amount of work scheduled per quarter or per year and appropriate Statements of Work are written. WAWF Program Management hosts monthly integration meetings to ensure that all integrating applications are meeting assigned target goals. WAWF Program Office reviews monthly status reports that charts budgeted costs against actual costs. WAWF Program Office also provides monthly status updates to JRB members, where some requirements are then changed and hence, these changes are recorded and appropriate cost/schedule impact is reviewed.

Exhibit R-3 Cost Ar	nalysis			DATE	Febr	uary 2	2007					
APPROPRIATION/BUDGE	ET ACTIVITY	PROGRAM EI	EMENT			PF	ROJECT	NAME A	ND NUME	ER		
RDT&E, Defense-Wide	e/05	Electronic	c Commerce	/ PE 03	05840K	El	ectron	ic Com	merce/E	C01		
Cost Category	Contract Method & <u>Type</u>	Performing Activit & <u>Location</u>	ry Total PYs <u>Cost</u>	FY 07 Cost	FY 07 Award <u>Date</u>	FY 08 Cost	FY 08 Award Date	FY 09 Cost	FY 09 Award Date	Cost to Complete	Total Cost	Target Value of Contract
Wide Area Workflow-RA	PR	New Performance based services contract to be awarded April 2006	3.047	0.000	N/A	0.000	N/A	0.000	N/A	0.000	3.047	3.047
Wide Area Workflow-RA	PR	Science Applications International Corporation (SAIC) Falls Church, VA	1.200	0.000	N/A	0.000	N/A	0.000	N/A	0.000	1.200	1.200
Wide Area Workflow-RA		CACI Inc. Chantilly, VA, Jacksonville, FL	6.132	0.000	N/A	0.000	N/A	0.000	N/A	0.000	6.132	6.132
		Concurrent Technology Corp. (CTC) Seminole, FL	0.267	0.000	N/A	0.000	N/A	0.000	N/A	0.000	0.267	0.267
	PR	NGIT Reston, VA	0.707	0.000	N/A	0.000	N/A	0.000	N/A	0.000	0.707	0.707
	PR	Merlin	0.305	0.000	N/A	0.000	N/A	0.000	N/A	0.000	0.305	0.305

Exhibit R-3 Co	ost Analysis				DATE	: Febr	uary 20	07					
	BUDGET ACTIVITY		PROGRAM EL		•			JECT N					
RDT&E, Defense	e-Wide/05		Electronic	Commerce	/ PE 03	05840K	Ele	ctroni	.c Com	merce/	EC01		
Cesting	MIPR	JITC AZ	Ft Huachuca,	4.328	0.000	N/A	0.000	N/A	0.000	N/A	0.000	4.328	4.328
OTAL				15.986	0.000		0.000		0.000				

Appropriation/BuRDT&E, Defense-W				ivit	У									mme	rce	/		d Na		ΣK						Numk ic (Comm				01	
Fiscal Year	_		06	-			07	. 			800	: .	_		2009		_		010		_		011				12	: .	_	201	. 	:
DEVELOPMENT TECHNICAL TESTING	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	1	2	3	
SYS/PROG Test & Analysis- Application T&A	Δ	Δ	Δ	Δ																												
SYS/PROG Test & Analysis- Integration T&A	Δ	Δ	Δ	Δ																												
PRODUCT IMPROVEMENT	Ī																															
WAWF	Δ	Δ	Δ	Δ																												

Exhibit R-4a Schedule Detail			DATE:	DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/05		PROGRAM ELEMENT Electronic Commerce /			PE 0305840K			PROJECT NAME AND NUMBER Electronic Commerce / EC01		
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013		
DEVELOPMENT TECHNICAL TESTING										
SYS/PROG T&A - Application Test and Analysis	1-4Q									
SYS/ PROG T&A - Integration Test and Analysis	1-4Q									
PRODUCT IMPROVEMENT										
Wide Area Work Flow (WAWF)	1-4Q									

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007				
APPROPRIATION/BUDGET ACTIVITY			R-1 IT	R-1 ITEM NOMENCLATURE				
RDT&E, Defense-Wide/05				Advanced Information Technology Services Joint Program Office (AITS-JPO) / PE 0604764K				
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Leading Edge Pilot Information Technology / T26	10.979	9.356	9.832	13.860	15.280	15.736	16.287	16.287

A. <u>Mission Description and Budget Item Justification</u>: The mission of the Advanced Information Technology Services Joint Program Office (AITS-JPO) is to expedite the transition of new Information Technology into those operational information systems that support the Combatant Commands and our nation's warfighters. The AITS-JPO works with many sources, including private industry, the Military Service labs, and the Defense Advanced Research Projects Agency (DARPA) to identify maturing technology to meet warfighter needs.

The AITS-JPO was created primarily to help transition emergent mature technologies into operational systems. The key mechanism for the transition of the technology is the Advanced Concept Technology Demonstration (ACTD). ACTDs were initiated to allow for the early and inexpensive evaluation of mature or maturing advanced technology to solve important military problems. ACTDs are "pre-acquisition" activities and are designed to provide the warfighting community with prototype capabilities and support them in the evaluation and maturation of the capabilities. The warfighter evaluates the technology to determine its military utility before commitments are made for formal acquisition. If an ACTD is successful and proves its military utility, the capability may then transition to a full-blown acquisition program, or be given to a DoD Agency, Military Service, or Combatant Command (COCOM). ACTDs benefit their customers by providing technology to joint warfighters that responds to a critical military need with the hardware/software requirements, operational concepts, and the organizational structure required to meet that need. For example, ACTD efforts support improved visualization of the battle space, streamlining logistics, and responding to enemy actions in a faster cycle than the enemy can respond.

ACTD-related work makes up the bulk of the AITS-JPO efforts. In addition, the AITS-JPO: a) engineers and reinforces Components for leave behind ((US only) after Military Utility Assessment (MUA) proves that a particular capability is useful and needs to be fielded) and integration into the Global Information Grid (GIG), including the Global Command and Control System - Joint (GCCS-J) and the Global Combat Support System (GCSS); b) augments transitioning products with improved security, scalability, and Net-Centric Enterprise Services (NCES) compliance; and c) provides advanced, hardened capabilities. As components mature in an ACTD, some of its outputs will be network services. These services will transition into the NCES system of record.

Within an ACTD, the Operational Manager arranges for MUAs of the various products of the ACTD, toward the end of the development period. ACTD capabilities will be built upon and contribute to NCES as it evolves. Technology solutions to

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007				
APPROPRIATION/BUDGET ACTIVITY			R-1 IT	R-1 ITEM NOMENCLATURE				
RDT&E, Defense-Wide/05				Advanced Information Technology Services Joint Program Office (AITS-JPO) / PE 0604764K				
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Leading Edge Pilot Information Technology / T26	10.979	9.356	9.832	13.860	15.280	15.736	16.287	16.287

many of the GCCS-J priority requirements are needed.

Included in the requirements is the need for mission-dependent information in the Common Operational Picture (COP) to support time-critical tactical decision making, for advanced visualization of the COP, and for enhanced imagery products and processing technology. The Joint Blue Force Situational Awareness (JBFSA) ACTD supports these requirements. In order to support the full spectrum of crisis action planning and execution, GCCS-J requires new functionality for courses of action development and assessment, automated assistance in plan generation, predictive monitoring of planned vs. actual plan execution, and support for the less structured but operationally important areas of humanitarian operations and counter-terrorist/force protection coordination. Joint Decision Support Tools and data fusion/visualization techniques are needed to transform raw data from multiple sources into decision-relevant information in a rapidly understandable format. Methods are needed to couple combat support planning and execution to the operations planning and execution of GCCS-J. Predictive techniques are required for detecting and assessing shortfalls before they occur. In addition, methods for coordinating logistics support across security domains in a coalition or host-nation-based operation are needed. AITS-JPO, through several ACTDs, is developing, prototyping, and implementing a network centric IT architecture for the Global Information Grid (GIG). Collaboration products as well as portal-based products are being prototyped under this project.

Products from this effort should transition to the GIG BE with the goal of better matching dynamic services of the Defense Information Systems Network and other networks with the mission-critical applications and information flows of the Joint Task Force. GIG BE applies to the GIG in that it is the standard for GIG BE processes and services to all new or upgraded C4I systems. As a part of both Network Operations and the host of applications systems of the GIG, the warfighter requires protection, detection, and reaction to attempted penetrations of the C4 enterprise. Toward that end the DoD has established a Joint Task Force for Computer Network Defense (JTF-CND), and any techniques that can provide an integrated Information Assurance Situation Assessment and response capability for individual commands, Joint Task Forces/Combatant Commanders, and to the JTF-CND, will help provide tools for defense-in-depth protection of the military cyberspace.

Exhibit R-2, RDT&E Budget Item Justin	Exhibit R-2, RDT&E Budget Item Justification				2007			
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/05				R-1 ITEM NOMENCLATURE Advanced Information Technology Services Joint Program Office (AITS-JPO) / PE 0604764K				
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Leading Edge Pilot Information Technology / T26	10.979	9.356	9.832	13.860	15.280	15.736	16.287	16.287
Accomplishments/Planned Program:								
Subtotal Cost	FY 06 0.780		FY 07 0.840		FY 08 0.500		<u>FY09</u> 2.000	1

Battlespace Awareness (BA) - Leading Edge Services: - Battlespace Awareness is one of the key technology areas for Leading Edge Services. The Battlespace Awareness efforts include improving the Common Operational Picture at the Combatant Commander and Joint Task Force levels to provide enhanced situational awareness.

	FY 06	FY 07	FY 08	FY09
Subtotal Cost	0.677	1.200	1.200	1.000

Global Command and Control System (GCCS-J) - Leading Edge Services: Requirements include the technology insertion and transition engineering for the Agile Transportation for 21st Century ACTD. Output includes complete architecture, technical strategy, systems engineering, and full life cycle development. Benefits include a more robust development of products, with transition strategies, and actual transitioning into C2 Systems and the Joint Command and Control (JC2) areas. The benefits include working with the technical managers and operations managers at the Defense Transportation Systems to ensure technology transition within the architecture and framework of the C2 systems as well as coordination and socialization with TRANSCOM and other COCOMS and the DoD community.

	<u>FY 06</u>	FY 07	FY 08	FY09
Subtotal Cost	0.427	0.000	0.404	1.000

Global Combat Support System (GCSS) - Leading Edge Services: Provide tools to plan and execute coalition strategic deployment/redeployment, coalition sustainment and field services. Also provide Coalition Theater Logistics (CTL) and infrastructure information.

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007				
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE				
RDT&E, Defense-Wide/05				Advanced Information Technology Services Joint Program Office (AITS-JPO) / PE 0604764K				
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Leading Edge Pilot Information Technology / T26	10.979	9.356	9.832	13.860	15.280	15.736	16.287	16.287
Subtotal Cost	FY 06 2.000		FY 07 0.400		FY 08 0.400		<u>FY09</u> 2.576	5

Global Information Grid (GIG) Infrastructure: The Homeland Security (HLS)C2 ACTD provides the systems and operations to do the command and control mission to protect our installations throughout the world and in CONUS from terrorist attack. The use of different systems working together provides alerting, visualization, and collaboration capability. Technology focuses on rapid secure information sharing, sensor/IT integration and command, control and coordination to multiple homeland security participants. More critically, the HLS/D C2 ACTD works with the Joint Staff Antiterrorism/Force Protection community to develop concepts of operation. The ACTD is scheduled for transition in FY 2006 and will be completed by the end of FY 2007. The Commander in Chief 21 (CINC 21) ACTD continues the task of transitioning capabilities that will assist Combatant Commanders in employing a decision support environment that will provide a tailored rendering of relevant information to the Commanders, their staff, Joint Task Forces, non-government organizations, and coalition forces. This dynamic decision support environment will leverage Net-Centric Enterprise Services (NCES), the next generation Global Command and Control Services, and web services provided by the GIG. The data/information will be dynamically updated yielding better situational awareness and more efficient collaboration and mission execution.

	FY 06	FY 07	FY 08	FY09
Subtotal Cost	0.400	0.000	1.500	$\overline{1.000}$

Advanced Information Assurance (IA) Services: Includes Active Network Intrusion Defense (ANID) and Coalition Information Assurance Common Operational Picture (C-IA COP) requirements. ANID capabilities provide for better sensor methods for detecting network and host intrusions (e.g., anomaly detections, reduced false-alarm rates, and improved data reduction), fusion of information from multiple sensors and sites to create a means of detecting sophisticated and coordinated attacks, spontaneous response methods to provide first level "defense-in-depth" while isolating the attack paths, and technologies for improving boundary control between security enclaves as we increase interaction with coalition forces. Lessons learned from the ANID ACTD and resulting CONOPS establishes the focus for the next IA focused ACTD, to speed IA protection solutions across the DoD community.

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007				
APPROPRIATION/BUDGET ACTIVITY				EM NOMENCL	ATURE			
RDT&E, Defense-Wide/05				ed Informa			ices Join	nt Program
				Office (AITS-JPO) / PE 0604764K				
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Leading Edge Pilot Information	10.979	9.356	9.832	13.860	15.280	15.736	16.287	16.287
Technology / T26								
	FY 06		FY 07		FY 08		FY09	
Subtotal Cost	0.335		0.752		0.714		0.972	2

Coalition Services: Under this effort, AITS-JPO coordinates research and development experiments using the Coalition Federated Battle Laboratories Network (CFBLNet) and prototypes and develops capabilities across the CFBLNet, which can be transitioned into strategic and operational coalition networks. This requirement provides for the coordination and conduct of coalition advanced technology experiments in conjunction with the Joint Battle Center, Services and Allies via the CFBLNet. Includes the support to complete and deploy the capability to coordinate an Air Tasking Order electronically between the U.S. and Allies and to prototype and do collaborative planning among the US and selected Allies. The need for an ubiquitous capability throughout the net-centric environment drives FY 2006 through FY 2009 funding to develop and integrate standard capability with other systems of record, and provide enterprise collaboration services that support warfighters in all security domains. The tactical environment demands state-of-the-art technology when deployed in theater and interfacing with the Intelligence Community and Coalition Partners. Our objective is to meet all potential threats from a global perspective in real time.

	FY 06	FY 07	FY 08	FY09
Subtotal Cost	0.600	0.000	0.000	0.000

Net Centric Capabilities Pilot (NCCP): Provides net-centric, services oriented architecture-based mission capabilities for the C2 Community of Interest (COI) based on Combatant Commander approved mission threads, which describe how capabilities will enable a key joint warfighting capability or mission area and identify mission needs for those capabilities. Includes the Actionable Situational Awareness Pull (ASAP) ACTD which is a government and industry sponsored program. The objective of the ASAP ACTD is to provide a capability for tactical commanders in a joint/coalition force to "pull and tailor" relevant actionable information, at the right time, regardless of the location within bandwidth constraints as a part of the evolving implementation of the GIG vision.

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007				
APPROPRIATION/BUDGET ACTIVITY				EM NOMENCL	ATURE			
RDT&E, Defense-Wide/05			Advanc	ed Information	tion Techno	ology Serv	ices Join	nt Program
				Office (AITS-JPO) / PE 0604764K				
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Leading Edge Pilot Information	10.979	9.356	9.832	13.860	15.280	15.736	16.287	16.287
Technology / T26								
	FY 06		FY 07		FY 08		FY09	
Subtotal Cost	3.380		4.000		3.764		3.114	1

Joint/Coalition Task Force Operations Tools: Develop C2 tools for Joint and Coalition Task Force operations, including adaptive near-real-time situation assessment and decision support, targeting, mission management, and interoperability with allies via the operational Griffin network (formerly Coalition Wide Area Network). Demonstrate these capabilities in the Combined Federated Battle Laboratories and in the Coalition Warfare Interoperability Demonstration (CWID). Provide situation assessment displays, which support automatically tailored decision support to warfighters. Provide enhanced, collaborative situation awareness for unexpected situations. Improve targeting-related positional accuracy for platforms sensed by image and video means. Improve capabilities of U.S. and Allies to exchange situational awareness, IA, tasking and targeting, logistics support information, and decision support information via the Griffin network. Provide a cross-function planning/execution service to support the shared data and cross-mission effects synchronization during planning, execution, & assessment via the CWAN and classified networks.

	FY 06	FY 07	FY 08	FY09
Subtotal Cost	2.380	2.200	1.350	2.198

Crisis Action Planning Tools: Develop advanced collaborative and iterative crisis action planning and execution tools to support C2 for rapid, continuous, end-to-end deployment and sustainment of joint forces from Garrison to the battlefield. Accelerate the transformation of advanced Joint C4 to web-based, network-centric capabilities. Provide visualization; semi-automated force generation; and command center decision support. Develop portal-based capability to plan deployment and sustainment pipeline from end-to-end in a collaborative, incremental manner as planned refinement and operations execution progresses.

Exhibit R-2, RDT&E Budget Item Justi	DATE:	DATE: February 2007								
APPROPRIATION/BUDGET ACTIVITY			R-1 IT	R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/05		Advanced Information Technology Services Joint Program Office (AITS-JPO) / PE 0604764K								
COST (in Millions)	FY08	FY09	FY10	FY11	FY12	FY13				
Leading Edge Pilot Information 10.979 9.356				13.860	15.280	15.736	16.287	16.287		
Technology / T26										
B. Program Change Summary:	FY 06		<u>FY 07</u>		FY (FY 09		
Previous President's 9.192 Budget			9.392		10.2	85	14.344			
Current Submission 10.979			9.356	9.356 9.832			13.860			
Total Adjustments	1.787		-0.036		-0.45	53	,	-0.484		

Change Summary Explanation:

FY 2006 changes are due to below threshold reprogramming.

FY 2007 changes are due to minor pricing adjustments.

FY 2008 changes are due undistributed Congressional reductions to the Defense-Wide RDT&E appropriation.

C. Other Program Funding Summary:

Other Funding for the salaries and operating expenses of this RDT&E project:

	<u>FY 06</u>	<u>FY 07</u>	<u>FY 08</u>	FY 09	<u>FY 10</u>	<u>FY 11</u>	<u>FY 12</u>	FY 13	<u>To</u> Complete	<u>Total</u> <u>Cost</u>
O&M PE 0604764K	6.409	6.238	6.355	7.295	7.386	7.265	7.209	7.195	Contg	Contg

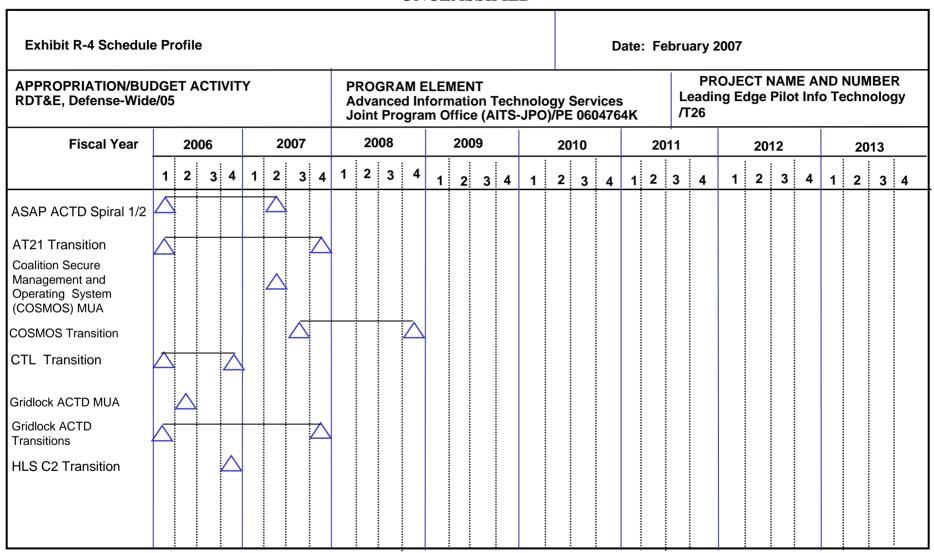
Exhibit R-2, RDT&E Budget Item Justif	DATE:	DATE: February 2007							
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE					
RDT&E, Defense-Wide/05				Advanced Information Technology Services Joint Program Office (AITS-JPO) / PE 0604764K					
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Leading Edge Pilot Information 10.979 9.356 9.356 Technology / T26				13.860	15.280	15.736	16.287	16.287	

- D. Acquisition Strategy: AITS-JPO efforts are accomplished through a combination of strategies focused on operations, technical integration, program management, and financial tracking. Market research performed during the acquisition process includes a review of DISA contracts, other DoD contract vehicles, and other Government agency contracts which were advertised for Government-wide usage. This market research also included consideration of small business, minority/women owned (8A), Historically Black Colleges and Universities (HBCU), mentor/protégé and other specialized contract vehicles and processes. All contractors available from DISA sources were evaluated for their ability to deliver the products required specifically for the unique AITS-JPO efforts. Additionally, many of the DISA contracts were awarded with multiple options and cost factors are already defined for several years. Prior success in these areas was considered in the investigations. Several sources are contacted for cost estimates. The AITS-JPO works collaboratively with vendors when possible to obtain generic cost data for planning and analysis purposes. Past and current contract prices for similar work and other government-wide agency contracts also provided additional sources of information. Quotes from multiple sources helps to provide an average for a more realistic price.
- E. Performance Metrics: The bulk of AITS-JPO efforts are structured as Advanced Concept Technology Demonstrations (ACTDs). An ACTD proposal is developed through a collaborative effort between the JPO and one of the Combatant Commands. This proposal is then formalized, and undergoes a vetting process involving leadership in DISA, OSD, the Joint Staff, and the Combatant Commands. The ACTD is then proposed to senior leadership within the OSD R&D ACTD community where it is subjected to additional requirements scrutiny by Joint Requirements Oversight Council (JROC). Those approved by senior leadership become formal ACTDs. The next step for an ACTD is to develop an Implementation Directive and a Management Plan. These quidance documents involve a general/flag officer commitment between OSD, DISA, and the Combatant Command. These lay out the basic objectives, schedule, and funding, for the ACTD. The detailed objectives, against which the Operational Sponsor (one of the Combatant Commands) will assess military utility, and the detailed mechanisms by which military utility will be assessed and results measured are developed and documented during the first year of the ACTD. Each ACTD has its own schedule and detailed objectives. ACTDs are usually developed using a spiral methodology, with incremental demonstrations, limited utility assessments of the demonstrated capabilities, and refinement of future capabilities based on feedback. Additionally, the AITS-JPO has implemented an internal Earned Value Management System where project managers exercise oversight of contractor performance relative to established project milestones and provide managers notification of the status of projects in terms of schedule and cost. The AITS-JPO also incorporates internal processes to enhance financial reporting and track contractor spending. Monthly reports provide

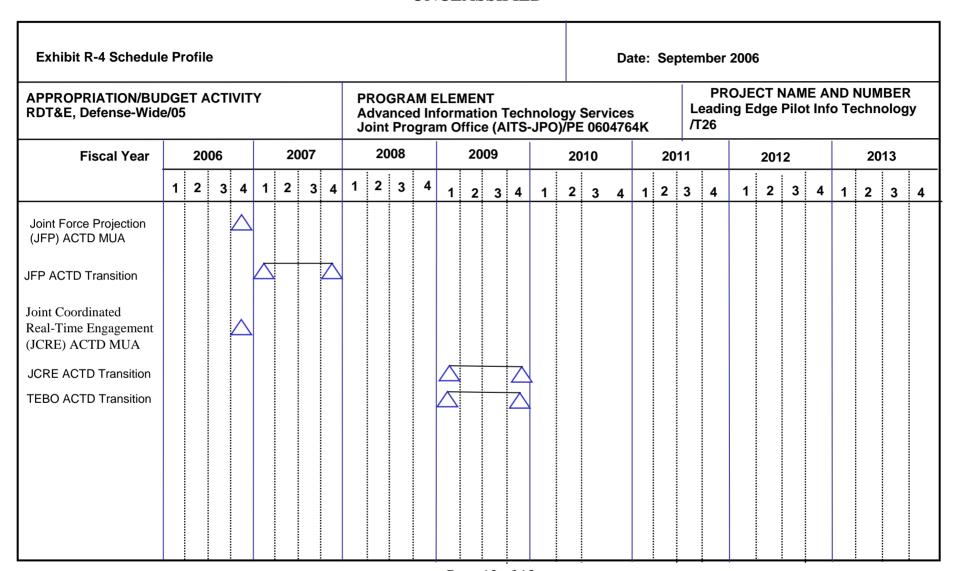
Exhibit R-2, RDT&E Budget Item Justifi	DATE:	DATE: February 2007							
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE					
RDT&E, Defense-Wide/05				Advanced Information Technology Services Joint Program Office (AITS-JPO) / PE 0604764K					
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Leading Edge Pilot Information 10.979 9.356 Technology / T26				13.860	15.280	15.736	16.287	16.287	

timely information on contractor expenditures. The AITS-JPO utilizes several web-based financial management tools to obtain budget and execution information. The Earned Value Management System (EVMS) provides a tool for AITS-JPO project managers to see how well they are meeting their plan. Commanders use the Military Utility Assessment as a tool to evaluate products. Other internal measures, such as, timeliness of equipment purchases, travel, lab and demo support are also evaluated to assess if each requirement is effectively meeting the overall requirements of the AITS-JPO's mission.

Exhibit R-3 Cost Analysis DATE: Feb							07					
APPROPRIATION/BUDGET ACT RDT&E, Defense-Wide/05	IVITY	Advanced Info	PROGRAM ELEMENT Advanced Information Technolog Services Joint Program Office (AITS-JPO)/ PE 0604764K				PROJECT NAME AND NUMBER Leading Edge Pilot Information Technology/T26					ogy/T26
Cost Category	Contract Method & <u>Type</u>	Performing Activity & Location	Total PYs Cost	FY 07 Cost	FY 07 Award Date	FY 08 Cost	FY 08 Award <u>Date</u>	FY 09 Cost	FY 09 Award Date	Cost to	Total Cost	Target Value of Contract
PRODUCT DEVELOPMENT Development & Tech Services	MIPR	SSC, Charleston, SC	8.566	0.300	02/07	0.600	02/08	0.700	02/09	Contg	Contg	10.166
	T&M	NGMS, McLean, VA	13.950	1.448	02/07	0.500	02/08	1.200	02/09	Contg	Contg	17.128
		Various(To include Encore, GEMS, and NEXGEN)	10.566	0.662	Var.	1.500	Var.	1.800	Var	Contg	Contg	N/A
SUPPORT COSTS Engineering/Technical Support	T&M	HAI, Arlington, VA	14.714	0.861	03/07	2.000	03/08	1.960	03/09	Contg	Contg	19.535
Systems Integration	CPFF	SAIC Arlington, VA	16.869	2.890	04/07	2.600	04/08	4.000	04/09	Contg	Contg	26.365
System Engineering	FFRDC	MITRE, Arlington, VA Various(To	14.757	1.911	02/07	1.035	02/08	2.000	02/09	Contg	Contg	19.703
		include Encore, GEMS and NEXGEN)	11.105	0.484	Var.	0.600	Var.	1.000	Var.	Contg	Contg	N/A
TEST & EVALUATION		Various(To include Encore, GEMS and NEXGEN)	8.964	0.800	Var.	0.997	Var.	1.200	Var.	Contg	Contg	N/A
Total			99.491	9.356		9.832		13.860				



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Exhibit R-4a Schedule Detail	Exhibit R-4a Schedule Detail DATE: February 2007							
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT				PROJECT NAME	E AND NUMBE	:R
RDT&E, Defense-Wide/05			ion Technol PE 0604764K		es Joint	Leading Edge Technology		formation
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
Actionable Situational Awareness Pull (ASAP) ACTD Spiral 1/2	1Q-4Q	1Q-2Q						
Agile Transportation 21 st Century ACTD Transition	1Q-4Q	1Q-4Q						
Coalition Secure Management and Operating System (COSMOS) MUA		2Q						
COSMOS Transition		3Q-4Q	1Q-4Q					
CTL Transition	1Q-4Q							
Gridlock ACTD MUA	2Q							
Gridlock Transition	1Q-4Q	3Q-4Q						
HLS C2 Transition	4Q							
Joint Force Projection (JFP) MUA	4Q							
JFP Transition		1Q-4Q						
Joint-Coordinated Real-Time Engagement (JCRE) ACTD MUA	4Q							
Joint Coordinated Real-Time Engagement (JCRE) ACTD Transition				1Q-4Q				
TEBO ACTD Transition				1Q-4Q				

Exhibit R-2, RDT&E Budget Item Justi		Date: February 2007						
APPROPRIATION/BUDGET ACTIVITY		R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/07	1	C4I Interoperability/PE 0208045K						
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Total Program Element	66.057	83.413	76.179	77.795	79.694	80.527	81.251	81.245
Test and Evaluation/T30	28.244	21.757	21.814	22.059	22.341	22.307	23.039	23.039
Major Range Test Facility Base (MRTFB)/T40	37.813	61.656	54.365	55.736	57.353	58.220	58.212	58.206

A. Mission Description and Budget Item Justification: As required by DoD Directive 4630.5, DoD Instruction 4630.8, DoD Directive 5105.19, DoD Regulation 5000.2-R, and CJCSI 6212.01D, the Joint Interoperability Test Command (JITC) provides life cycle test, evaluation, certification and technical support for all DoD National Security Systems/Information Technology Systems (NSS/ITS) to assure all users that Combatant Commander, Service, and Agency systems are effectively interoperable, compatible and integrated in a joint and combined environment. JITC is DoD's sole joint interoperability certifier. It serves as the designated Joint Operational Test Agency (OTA) to determine the operational effectiveness and suitability of systems managed or procured by the Defense Information Systems Agency, Services, and other Joint agencies. In accordance with DoD Directive 3200.11, the DISA Major Range and Test Facility Base (MRTFB) functions as the only non-Service member of DoD's MRTFB, allowing work with commercial vendors to test and certify their products. The DISA MRTFB is made up of JITC and the Test and Evaluation Management Center (TEMC). It assists Allies in establishing similar interoperability and supportability programs throughout the life cycle of DoD systems. This program element is under Budget Activity 07 because it involves efforts supporting operational systems development.

B. Program Change Summary:

	FY 06	FY 07	FY 08	FY09
Previous President's Budget	66.257	84.313	91.583	93.542
Current President's Budget	66.057	83.413	76.179	77.795
Total Adjustments	200	900	-15.404	-15.747

Change Summary Explanation:

FY 2006 through FY 2009 adjustments due to fiscal guidance reductions.

Exhibit R-2a, RDT&E F	7							
APPROPRIATION/BUDGET	PROGRAM ELEMENT			PROJECT NAME AND NUMBER				
RDT&E, Defense-Wide/O	7		C4I Interop	erability/PE	0208045K	Test and Eval		
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost	28.244	21.757	21.814	22.059	22.341	22.307	23.039	23.039

- A. <u>Mission Description and Budget Item Justification</u>: JITC, as the only Joint Operational Test Agency, conducts Operational Test and Evaluation (OT&E) to determine the operational effectiveness and suitability of the systems acquired, assigned, or managed by the Defense Information Systems Agency (DISA), Services, and other Agencies. JITC, as the sole Joint interoperability test certification authority, conducts life cycle test, evaluation, and certification of DoD National Security Systems/Information Technology Systems (NSS/ITS), provides direct interoperability support to Combatant Commanders during exercises and contingency operations to ensure Joint interoperability throughout life cycle of DoD NSS/ITS, and supports Combatant Commanders to ensure successful combined operations with Allies and Coalition partners.
- B. Accomplishments/Planned Program:

Operational Test and Evaluation $\frac{FY 06}{3.070}$ $\frac{FY 07}{2.975}$ $\frac{FY 08}{2.930}$ $\frac{FY 09}{2.963}$

Conducts Operational Test and Evaluation (OT&E) of systems acquired, assigned or managed by the Defense Information Systems Agency (DISA) to determine if the systems meet users' requirements. This includes the following: Conduct OT&Es and Operational Assessments (OAs) of Global Command and Control System—Joint (GCCS—J) and Global Combat Support System (GCSS) Combatant Commander/Joint Task Force (CC/JTF) major and minor releases to ensure operational requirements are met in a operational environment with real users; develop and execute OT&E strategies for Network Centric Enterprise Services (NCES) and Net—Enabled Command Capability (NECC), key enablers for implementing DoD wide network centric capabilities; operationally assess upgrades to DoD Teleport sites to support fielding decisions and assess Teleport system for operational effectiveness and suitability; operational assessment and IOT&E of the Global Information Grid Bandwidth (GIG—BE) expansion to assess operational effectiveness and suitability; operationally assess upgrades to Teleport sites to support fielding decisions; perform operational assessments of Defense Message System (DMS) software releases and follow—on maintenance releases to ensure operational effectiveness and suitability; conduct continuous operational test and evaluation of Defense Video Teleconferencing Services—Global (DVS—G) to ensure operational effectiveness and suitability. Also provide operational test and evaluation support to National Security Agency (NSA), Defense Logistic Agency (DLA), Defense Finance and Accounting Service (DFAS), and Defense Commissary Agency (DeCA) acquisition programs.

Exhibit R-2a, RDT&E B	Project Just	tification		DATE:	February 200	7		
APPROPRIATION/BUDGET	ACTIVITY		PROGRAM ELE	EMENT		PROJECT NAME	AND NUMBER	
RDT&E, Defense-Wide/(7		C4I Interop	erability/PE	0208045K	Test and Eva	luation/T30	
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost	28.244	21.757	21.814	22.059	22.341	22.307	23.039	23.039
Joint Interoperabili Subtotal Cost	ty Testing	FY 06 12.087		FY 07 11.921		<u>r 08</u> L.929	<u>FY 09</u> 12.064	

Conduct joint interoperability test and certification of DoD National Security Systems/Information Technology Systems (NSS/ITS) to ensure tactical data link implementations are effectively interoperable. This includes Tactical Digital Information Link 11A/11B/16 interoperability certification tests of Airborne Warning and Control System (AWACS), Aegis, Phased Array Tracking Radar Intercept Of Target(PATRIOT), Air Defense System Integrator (ADSI), Joint Range Extension (JRE), Special Information System (SIS) Senior Scout (SS), Joint Stars (JSTARS), Airborne Battlefield Command and Control Center (ABCCC) Link 16, Forward Area Air Defense System (FAAD), and Modular Control Equipment (MCE), Joint Strike Fighter (JSF) and other COCOM/Service/Agency capabilities; conducts annual Department of Defense (DoD) Interoperability Communications Exercises (DICE) to validate joint communications architectures, identify interoperability issues, perform systems' assessments, and certify the interoperability of voice, video, data, transmission, and messaging systems and verify interoperability with Federal and State agencies from Homeland Defense.

Support to Warfighter	FY 06	<u>FY 07</u>	<u>FY 08</u>	FY 09
Subtotal Cost	7.173	6.861	6.955	$\overline{7.032}$

Provide on-site support to Combatant Commanders for exercises and contingency operations to document, review and analyze, architectures, conduct interoperability assessments, identify and resolve technical issues, and identify uncertified and/or untested interfaces, and determine compliance with CJCS manuals; provide solutions to problems raised in hot-line calls; and publish four issues annually of Lessons Learned Reports. This support also includes Coalition exercise support, tactical data link testing support and Command and Control Interoperability Boards (CCIB) support, Coalition Network migration, and US/Coalition communications equipment testing to ensure successful combined operations with our Allies and Coalition partners.

Joint Distributed Plant	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	$\overline{4.214}$	0	0	0

Provide on-site support to Combatant Commanders for exercises and contingency operations to document, review and

Exhibit R-2a, RDT&E P	roject Just	tification		DATE:	February 200	7		
APPROPRIATION/BUDGET	ACTIVITY		PROGRAM ELE	MENT		PROJECT NAME	AND NUMBER	
RDT&E, Defense-Wide/0	7		C4I Interop	erability/PE	0208045K	Test and Eval	luation/T30	
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost	28.244	21.757	21.814	22.059	22.341	22.307	23.039	23.039

uncertified and/or untested interfaces, and determine compliance with CJCS manuals; provide solutions to problems raised in hot-line calls; and publish four issues annually of Lessons Learned Reports. In FY07 funding is withdrawn from DISA for establishment of the Joint Mission Environment Test Capability (JMETC) Program.

System of Engineering Center	<u>FY06</u>	FY 07	FY 08	FY 09
Subtotal Cost	1.700	0	0	0

Establish a System of Systems Engineering Center that will develop a formal engineering methodology to be applied to DoD programs; extend traditional systems engineering to address challenges faced in today's complex combination of systems that must function as an overall whole to produce desirable results; and initiate prototype applications for port security.

C. Other Program Funding Summary:

									<u>To</u>	<u>Total</u>
	FY 06	FY 07	FY 08	FY 09	FY 10	FY 11	FY 12	FY 13	Complete	
O&M, DW	5.518	3.868	$\overline{4.141}$	4.674	4.715	4.438	4.248	4.228	Contg	Contq

D. Acquisition Strategy:

Three prime contracts, with multiple sub-contracts, support this project. These competitively awarded, non-personal-services contracts provide maximum flexibility, and allow for expansion and contraction of staff years as workload expands and contracts.

E. Performance Metrics:

Performance is tracked both through measures of workload and through customer satisfaction. In the primary mission of Joint Interoperability Certification (for FY06), 100 certifications and 55 assessments were completed. In Standards Conformance, an integral part of interoperability, 95 standards conformance certifications and one assessment were completed. The Warfighter Hotline responded to 311 urgent calls from across DoD. 585 test projects from across the Services and agencies, and 79 projects for commercial customers were performed. A survey of 108 customers resulted in

Exhibit R-2a, RDT&E P	roject Just	ification		DATE:	February 200	7		
APPROPRIATION/BUDGET	ACTIVITY		PROGRAM ELE	MENT		PROJECT NAME	AND NUMBER	
RDT&E, Defense-Wide/0	17		C4I Interop	erability/PE	0208045K	Test and Eval	luation/T30	
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost	28.244	21.757	21.814	22.059	22.341	22.307	23.039	23.039

77% Fully Satisfied, 22% Mostly Satisfied, and 1% Unsatisfied. When asked if JITC met customer program needs, the following "Yes" answers were received - Quality 97.5%, Schedule 90.1%, Cost 96.3%. As JITC completes the move to a DoD Portfolio organization structure, efforts will continue to refine Performance Metrics and establish a JITC Balanced Scorecard for the Command.

Exhibit R-3 Cost Ana	lysis				DAT	E: Febr	uary 20	07				
APPROPRIATION/BUDGET RDT&E, Defense-Wide/		-	GRAM ELE Interop		ty / PE	02080451	_	JECT NAM t and Ev		_		
Test & Evaluation Cost Category	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 07 Cost	FY 07 Award Date	FY 08 Cost	FY 08 Award Date	FY 09 Cost	FY 09 Award Date	Cost to Complete	Total Cost	Target Value of Contract
Engineering/Technical Services	FFP/LOE	NGMS Ft. Hua, AZ Interop Ft.	18.044	4.376	10/06 10/06	4.305	10/07 10/07	4.449	10/08	2.225	33.399 37.177	33.399
	FFP/LOE	Hua, AZ NGIT Ft. Hua, AZ	14.079	3.249	10/06	3.197	10/07	3.307	10/08	1.654	25.486	25.486
	CPFF	CTC Arlington, VA	11.050	0.000		0.000		0.000		0.000	11.050	11.050
Subtotal Contracts In-House				12.296 9.462		12.298 9.516		9.835				
Total Project				21.758		21.814		22.059				

Appropriation/Budg RDT&E, Defense	get A -Wid	ctive/07	ity 7							P	rogı C4I	am Inte	Elei rope	men erab	t Nu ility	ımb / Pl	er ar E 020	nd N 0804	lam 45K	е				P	Proje Test	ct Na and	umk Eva	ber a aluat	nd I	Nan / T3	ıe 0	
Fiscal Year		20	06			:	2007	7		20	008			20	09			2	010			20	011			20	012			20	13	
	1	2	3	4	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
Provide Operational Test & Evaluation																																
(OT&E) of DISA acquired systems.																																
Conduct joint																																
interoperability test and certification on DoD C4I systems																																
System of Systems Engineering Center																																
Manage Joint Distributed Engineering Plant (JDEP)																																

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Appropriation/Budo RDT&E, Defense	get A Wid	ctive/07	ity 7							P	rogı C4I	ram Inte	Elei rope	nen erab	t Nu ility	ımb / Pl	er ar E 020	nd N 0804	lamo 15K	е				P	Proje Test	ct N and	umk Eva	ber a	nd l	Nam / T3	ie 0	
Fiscal Year		20	06			2	2007			2	2008	3		20	09			20	10			20	11			20	12			20)13	
	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	1	2	3	4
On-site exercise																																
support for ~ 6 to 8 exercises per year																																
Operate 24/7 hotline						Ė																				:						
Publish quarterly Lessons Learned																																
Reports																																Π
Combined Interoperability Test																																
support to Combatant																																
Commanders																																

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DATE: February 2007

1-4Q 1-4Q 1-4Q 1-4Q 1-4Q 1-4Q

1-40

Exhibit R-4a Schedule Detail

Publish quarterly Lessons

1-4Q

Interoperability Test support to Combatant Commanders

Learned reports

Provide Combined

					DEE GGE / EGG /				
APPROPRIATION/BUDGET AC	CTIVITY	PROGRAM	ELEMENT		PROJEC	T NAME AND N	NUMBER		
RDT&E, Defense-Wide/07		C4I Inte	roperabilit	y / PE 02080	45K Test a	and Evaluation	on / T30		
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013	
Provide Operational						1-4Q	1-4Q	1-4Q	
Test & Evaluation (OT&F	፤) of DISA a	cquired syst	ems (e.g, G	CCS-J, DMS, I	OVS-G)				
Conduct joint	1 40	1 40	1 40	1 40	1 40	1 40	1 40	1 40	
interoperability test a									
planning and conducting						ik io tests,	usf, etc.,	Including	
praining and conducting	, Detelise III	rceroperabili	cy Communic	acions Exerc.	ise (Dice)				
Establish System of	1-40								
Systems Engineering Cer									
Manage Joint Distribute	ed 1-4Q								
Engineering Plant (JDE	?), includir	g developmen	t of core d	ocuments, ted	chnical frame	ework, node	installation	is and event	t
planning & support									
On-site exercise									
support for six to eigh	nt exercises	s per year, e	.g. COBRA G	OLD, COMBINE	O ENDEAVOR, I	PACIFIC ENDE	AVOR, RIMPAC	1	
Operate 24/7 hotline &	1 40	1 40	1 40	1 40	1 40	1 40	1 40	1-40	
Operate 24// Hottine &	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	

Exhibit R-2a, RDT&E Project	Justification	n	DATE:	February 2	007			
APPROPRIATION/BUDGET ACTIV	ITY	PROGRAM ELE	MENT		PROJECT	NAME AND N	JMBER	
RDT&E, Defense-Wide/07		C4I Interop	erability / Pl	E 0208045K	Major Ra	nge Test Fa	acility Bas	e / T40
Cost (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost	37.813	61.656	54.365	55.736	57.353	58.220	58.212	58.206

A. <u>Mission Description and Budget Item Justification</u>: This project provides Institutional funds for DISA's Joint Interoperability Test Command (JITC) and the Test and Evaluation Management Center (TEMC), which serve as the only non-Service members of DoD's Major Range and Test Facility Base (MRTFB), in accordance with DoD Directive 3200.11. The increase in FY06 is due to Congressional action directed by Section 232 of P.L. 107-314 that requires that the institutional (indirect and overhead) costs of MRTFB facilities be funded by the major Test and Evaluation (T&E) investment accounts; DoD customer Acquisition Programs reflect an offsetting decrease since these indirect costs may no longer be charged to DoD customers. In addition, beginning in FY 2007 the MRTFB has increased its scope within the Agency.

B. Accomplishments/Planned Program:

Interoperability Test Support	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	37.813	61.656	54.365	55.736

This project funds the DISA MRTFB institutional and overhead costs associated with operating JITC and TEMC. Institutional costs include maintaining and operating base operations, multi-purpose testbed maintenance, contract management, award fee costs, communications, automation support, operating expenses, T&E standards, policies, and procedures; and associated civilian pay costs for all overhead functions at Indian Head, MD, Fort Huachuca, AZ and Arlington, VA. Funds provide for the development, implementation, and maintenance of the MRTFB's interoperability testing tools necessary to conduct testing of National Security Systems/Information Technology Systems (NSS/ITS). Funds allow the MRTFB to continue to implement Net Readiness Capabilities Resources (NRCR), which will provide DoD with an off-line, life-cycle support capability for DoD's tactical and strategic networks and their interfaces. The NRCR allows testers to assess and evaluate performance of new systems, software revisions, and hardware modifications to various elements without risking disruption of operational IT networks. The FY07 increase reflects the realignment of DISA O&M and Procurement funds from PE 0303149K to this program to consolidate operational testing into a single program managed under MRTFB rules and procedures.

C. Other Program Funding Summary:

									<u>To</u>	<u>Total</u>
	FY 06	FY 07	FY 08	FY 09	FY 10	FY 11	FY 12	FY 13	Complete	Cost
O&M, DW	7.043	9.504	7.117	8.250	8.447	8.241	7.746	7.708	Contg	Contg

Exhibit R-2a, RDT&E Project	Justification	n	DATE:	February 2	007			
APPROPRIATION/BUDGET ACTIVI	TY	PROGRAM ELE	MENT		PROJECT	NAME AND N	JMBER	
RDT&E, Defense-Wide/07		C4I Interop	erability / Pl	E 0208045K	Major Ra	nge Test Fa	acility Bas	e / T40
Cost (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost	37.813	61.656	54.365	55.736	57.353	58.220	58.212	58.206

D. <u>Acquisition Strategy</u>: Three prime contracts, with multiple sub-contracts, support this project. These competitively awarded, performance-based, non-personal-services contracts provide maximum flexibility, and allows for expansion and contraction of staff years as workload expands and contracts.

E. Performance Metrics:

This project funds Institutional costs incurred to operate and maintain the Major Range Test Facility Base. The output associated with this project is the development of standard test and evaluation methods and practices, and availability of testbeds and testing facilities for customer testing. There were no down days for testing facilities and testbeds during the last fiscal year.

Exhibit R-3 Cost Anal	DATE	DATE: February 2007												
APPROPRIATION/BUDGET ACTIVITY PROGRAM ELEMENT RDT&E, Defense-Wide/07 C4I Interoperability)208045K	PROJECT NAME AND NUMBER Major Range and Test Facility Base / T40							
		1 2 2 2			,		1 5							
Test and Evaluation														
Cost Category	Contract	Performing	Total		FY 07		FY 08		FY 09			Target		
	Method &	Activity &	PYs	FY 07	Award	FY 08	Award	FY 09	Award	Cost to	Total	Value o		
	Type	<u>Location</u>	Cost	Cost	<u>Date</u>	Cost	<u>Date</u>	Cost	<u>Date</u>	<u>Complete</u>	Cost	Contract		
Engineering/Technical	FFP/LOE	NGMS Ft.	10.776	11.245	10/06	8.718	10/07	8.894	10/08	4.447	44.080	44.080		
Services		Hua, AZ												
	FFP/LOE	Interop Ft. Hua, AZ	. 21.151	20.895	10/06	16.703	10/07	17.040	10/08	8.520	84.309	84.309		
	FFP/LOE	NGIT Ft. Hua, AZ	11.728	12.144	10/06	9.449	10/07	9.641	10/08	4.820	47.782	47.782		
Subtotal Contracts				44.284		34.870		35.575						
In-House				17.372		19.495		20.161						
Total Project				61.656		54.365		55.736						

Appropriation/Bud RDT&E, Defens	dget A e-Wid	Activ le/07	vity 7					Program Element Number and Name Project C4I Interoperability / PE 0208045K						ct N	Number and Name MRTFB / T40																	
Fiscal Year 2006 2007 1 2 3 4 1 2 3 4		2006			2007			2008			2009		2010			20	2011		2012			2013										
	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							
Provide interoperability test support to warfighter																																

Exhibit R-4a Schedule Detail	1	DATE: Februar	у 2007
APPROPRIATION/BUDGET ACTIVITY	PROGRAM ELEMENT		PROJECT NAME AND NUMBER
RDT&E, Defense-Wide/07	C4I Interoperability /	PE 0208045K	Major Range and Test Facility Base / T40

Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
Develop & implement	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q
Interoperability test	systems to s	support warfi	ighters					

Exhibit R-2, RDT&E Project Justif	ication		Dat	Date: February 2007									
APPROPRIATION/BUDGET ACTIVITY			R-1	R-1 ITEM NOMENCLATURE									
RDT&E, Defense-Wide/07			Joi	Joint/Allied Coalition Information Sharing/PE 0301144K									
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13					
Multinational Information Sharing (MNIS)/NND	0.000	0.000	26.321	23.224	22.374	26.545	24.721	26.361					

- A. <u>Mission Description and Budget Item Justification</u>: The Multinational Information Sharing (MNIS) program will improve sharing operational and intelligence information with multinational partners building on the current capabilities: Combined Enterprise Regional Information Exchange System (CENTRIXS); Globally Reaching Interactive Fully Functional Information Network (GRIFFIN), and the Combined Federated Battle Lab Network (CFBLNet).
- (U) Beginning in FY 2008, RDT&E funding will support centralization of service hosting and convergence of CENTRIXS and GRIFFIN capabilities into a single capability allowing approved interaction between national Secret domains for the Combined Communications Electronics Board (CCEB) nations, enterprise services for CENTRIXS users, and information sharing among CENTRIXS domains using the necessary guarding technologies, policies, and procedures to ensure that the right mission partners can access the right information in a timely fashion. Additionally the MNIS PMO, in coordination with Joint Staff prioritization and direction, will conduct the planning, requirements analysis/solution development, systems integration and testing, security certification and accreditation, life cycle planning, and transition to operations of net centric architectures and web-based services and capabilities necessary to migrate the existing operational systems to the objective MNIS desired end state as described in the supporting Joint Capabilities Integration and Development System (JCIDS) documentation prepared by the Navy. A key driver in successfully accomplishing this goal is completion of the Performance Benchmark to establish a performance baseline and identify Key Performance Parameters essential for measuring and evaluating continued progress of MNIS toward its objective end state. Griffin will also continue to improve architectural design of the multinational infrastructure and services to support evolving operational architectures; pilot implementation and testing between national networks and supporting information sharing in a multi-tiered domain environment. CENTRIXS will provide information sharing and secured, reliable means of communications with participating coalition nations. CFBLNet will provide enhanced measurement, auditing, analysis, and, development and test capabilities to support interoperability and supportability with our coalition partners, multinational and cross-domain initiatives to improve coalition information exchange capabilities, and, technology refresh and experimentation with emerging capabilities to identify deficiencies and practical solutions in existing applications, systems or equipment.

Exhibit R-2, RDT&E Project Justif	Da	e: Februar	y 2007						
APPROPRIATION/BUDGET ACTIVITY	R-3	L ITEM NOMEN	CLATURE			2 FY13			
RDT&E, Defense-Wide/07	Jo	Joint/Allied Coalition Information Sharing/PE 0301144K							
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Multinational Information Sharing (MNIS)/NND	0.000	0.000	26.321	23.224	22.374	26.545	24.721	26.361	
Sharing (MNIS)/NND									

In addition, these RDT&E activities will support capabilities enhancements for CENTRIXS as directed by Joint Staff. Enhancements will leverage proven capabilities from other defense and intelligence programs and build on the existing collaborative tools using the Net-Centric Enterprise Services (NCES) to improve performance and facilitate secure communications. A Global Information Grid (GIG) NetOps capability will monitor day-to-day performance, configuration management, and information assurance requirements of the MNIS component networks/enclaves. Continuous assessment of product upgrades / COTS technology to improve effectiveness supported by integration, testing, and security accreditation of products throughout the MNIS life cycle will accelerate delivery of increased capabilities to the warfighter while minimizing risk and cost.

В.

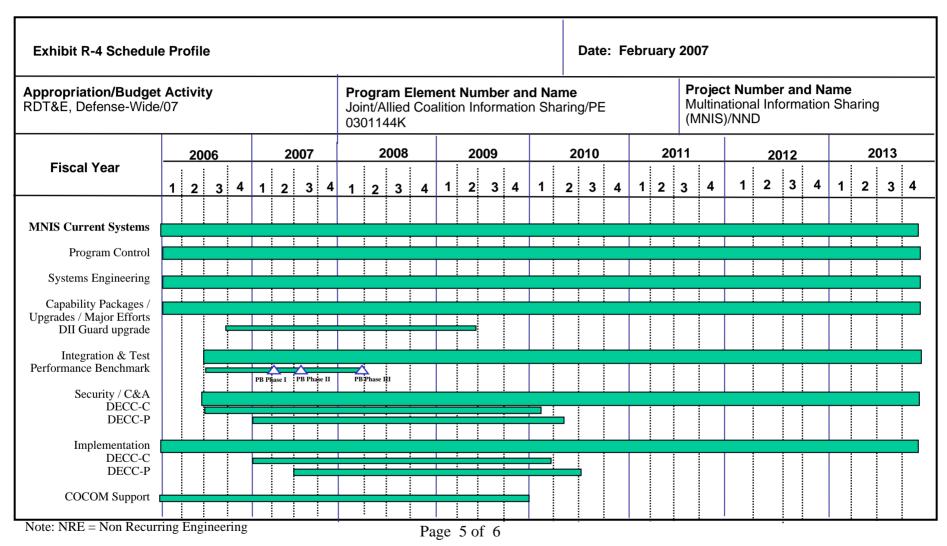
Program Change Summary:	FY06	FY07	FY08	FY09
Previous President's Budget	.000	.000	.000	.000
Current Submission	.000	.000	26.321	23.224
Total Adjustments	.000	.000	26.321	23.224

Change Summary Explanation:

Change due to FY 2008 President's Budget transfers functional responsibility for MNIS from the Navy to the Defense Information Systems Agency (DISA). The funding increase in FY 2008 and over the FYDP represents both the functional transfer and the expanded scope of the MNIS mission.

Exhibit R-3 Cost A	nalysis						DATE:	February	2007				
APPROPRIATION/BUDG		TY		GRAM EI		7241	T £	L !			AND NUMBER	Gls '	
RDT&E, Defense-Wid	ie/U/			nt/Alli aring/PE			Informa	tion		inationa S)/NND	l Informatio	n Snarii	ng
			DIIC	tring/ir	05011	1110			(1:114.7.)	3 / / TVIVD			
	Contract	Performi	ng	Total		FY07		FY08		FY09			Target
	Method &	Activity		PYs	FY07	Award	FY08	Award	FY09	Award	Cost To	Total	Value of
Cost Category	Type	Location	<u>n</u>	Cost	Cost	Date	Cost	Date	Cost	Date	<u>Complete</u>	Cost	Contract
<u>Product</u> Development													
Development		Harris,											
Development &		Falls											
Tech Services	T&M	Church, V	7A				\$3.5M	9/07	\$1.3M	9/08	Continuing	Contg	N/A
	CPFF	HAI, Fall	q										
	CIII	Church, V					\$1.7M	9/07	\$.9M	9/08	Continuing	Contg	N/A
	CPFF	GD, Falls											
		Church, V	7A				\$3.2M	2/08	\$.9M	TBD	Continuing	Contg	N/A
Support Cost													
Engineering /	CPFF	HAI,											
Technical Support		Arlington	1,										
	T-14	VA					\$3.0M	9/07	\$3.2M	9/08	Continuing	Contg	N/A
Systems Integration /	T&M	Harris, Falls											
Systems		Church, V	⁄A				\$4.8M	9/07	\$5.0M	9/08	Continuing	Contg	N/A
Engineering							•		•		_		
Systems	FFRDC	Mitre,											
Integration		Arlington VA	1,				\$1.9M	9/07	\$2.0M	9/08	Continuing	Contg	N/A
Systems	CPFF	GD, Falls	5				ΫΙ. ΣΗ	J / U I	γ ∠. ∪141	9/00	Concinuing	Conreg	IN / M
Engineering		Church, V					\$3.5M	2/08	\$4.7M	TBD	Continuing	Contg	N/A
Test & Evaluation													
Integration &	MIPR	JITC					\$1.0M	9/07	\$1.0M	9/08	Continuing	Contg	N/A
Test	1.1 T E IX	0110					γ 1 · ΟΙ·1	J / U I	γ 1. ΟΙ1	J/ 00	Concinuing	Contro	M/ W
IAVA / STIG Test	CPFF	HAI,											
		Arlington	1,										

Exhibit R-3 Cost A	Analysis			DATE: February 2007							
APPROPRIATION/BUDG RDT&E, Defense-Wic		ITY	PROGRAM ELEMENT Joint/Allied Coalition Sharing/PE 0301144K	Informat	ion	Multi	PROJECT NAME AND NUMBER Multinational Information Sharing (MNIS)/NND				
Coalition Lab T&E	T&M	VA HAI,		\$.800M	9/07	\$.900	9/08	Continuing	Contg	N/A	
Coafferon hab twe	Ιαιν	Arlington VA	1,	\$.900M	9/07	\$1.0M	9/08	Continuing	Contg	N/A	
Management Support											
Program Office		Ingenium, Falls									
	T&M FFRDC	Church, V Mitre, Arlington		\$.500M	9/07	\$.600	9/08	Continuing	Contg	N/A	
	CPFF	VA HAI, Arlington		\$.200M	9/07	\$.300M	9/08	Continuing	Contg	N/A	
	T&M	VA Harris, Falls		\$1.0M	9/07	\$1.0M	9/08	Continuing	Contg	N/A	
		Church, V	⁷ A	\$.300M	9/07	\$.400M	9/08	Continuing	Contg	N/A	



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Exhibit R-4a Schedule Detail			DATE:	February 2007	7		
APPROPRIATION/BUDGET ACTIVITY	PROGRAM ELEM	ENT	•		PROJECT NA	ME AND NUMBER	
RDT&E, Defense-Wide/07	Joint/Allied 0301144K	Coalition	Information	n Sharing/PE	Multinatio (MNIS)/NND	onal Information	Sharing
Schedule Profile	<u>FY 2006</u>	FY 2007	FY 2008	<u>FY 2009</u> <u>F</u>	<u>Y 2010</u> <u>FY</u>	2011 FY 2012	FY 2013
MULTINATIONAL INFORMATION SHARING (MNIS) Program Control	3						
Systems Engineering							
Capability Packages / Upgrades / Major Efforts Integration & Test (I&T)							
Performance Benchmark Phase I		2 nd Qtr					
Performance Benchmark Phase II		3 rd Qtr					
Performance Benchmark Phase III	- -		1st Qtr				
Security / C&A							
Implementation							

Exhibit R-2, RDT&E Budget Item Jus	on	DATE: February	2007		-	-	-	
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCI	LATURE						
RDT&E, Defense-Wide/07	National Milita	cy Command Sy	ystem-Wide S	upport (N	MCS) / PE	0302016K		
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
NMCS Command Center Engineering / S32	.610	.718	.713	.619	.578	.529	.534	.534

A. Mission Description and Budget Item Justification:

The National Military Command System (NMCS) provides the President of the United States, the Secretary of Defense, National Military Command Center (NMCC) and NMCC Site R, Executive Travel Fleet, Office of the Secretary of Defense (OSD), and Chairman, Joint Chiefs of Staff with the ability to maintain Command and Control (C2) capabilities, ensure continuous availability of emergency messaging, and maintain situational and operational awareness. Additionally, the NMCS provides informed, decision-making linkage between the President, the Secretary of Defense, and the Combatant Commanders. The NMCS program utilizes improved C2 methodologies and technology insertion opportunities to meet the command, control and information requirements for all crises and security threats involving US military forces.

DISA Command Center Engineering, within the Strategic Communications Office, provides innovative and cost-effective engineering solutions to ensure that the NMCS components and facilities located at the NMCC and NMCC Site R provide the Joint Staff with the necessary emergency messaging, situation awareness, crisis action, and operational capabilities. The NMCS engineering program provides concept development, requirements definition and calibration, technical specifications, proofs-of-concept, testing, rapid prototyping, technology insertions, systems engineering and integration and technical assessments. The projects comprising NMCS support provide C4I systems engineering for the NMCS in direct execution of Director, DISA's role as the DoD systems engineer, IAW Department of Defense Directive 5105.19. Furthermore, these projects support the Director's objective to provide responsive, timely, and accurate information to the warfighter. Support is provided to the Joint Staff in configuration management of over 150 systems and to the planning and implementation of the relocation of the NMCC as part of the Pentagon renovation. All efforts emphasize interoperability and are designed to contribute directly to the achievement of the global information infrastructure. This program element is under Budget Activity 07 because it involves efforts supporting operational systems development.

Accomplishments/Planned Program:

NMCS Systems Engineering	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	.610	.718	.713	.619

Exhibit R-2, RDT&E Budget Item Jus	DATE: February	2007						
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCE	LATURE						
RDT&E, Defense-Wide/07	National Milita	ry Command Sy	stem-Wide S	upport (N	MCS) / PE	0302016К		
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
NMCS Command Center	.713	.619	.578	.529	.534	.534		
Engineering / S32								

Specific accomplishments in FY 2006 included initial fielding and continued design of NMCS Information Resource Management (IRM) portal and Master Reference Guide, technical insertion evaluations, engineering studies/analyses/designs for NMCS component system upgrades/modernization included the Site R Integration Program (SRIP), and configuration management of NMCS systems and facilities. The continuations of these efforts are planned outputs for FY 2006-FY 2013.

B. Program Change Summary:

	FY 06	FY 07	FY 08	FY 09
Previous President's Budget	0.649	0.721	0.720	0.625
Current Submission	0.610	0.718	0.713	0.619
Total Adjustments	-0.039	-0.003	-0.007	-0.006

Change Summary Explanation:

FY 2006 reduction is due to undistributed congressional reductions to the Defense-wide RDT&E appropriation.

FY 2007 decrease is due to revised fiscal guidance.

FY 2008 and FY 2009 decreases are due to revised fiscal guidance.

C. Other Program Funding Summary:

									То	Total
	FY 06	FY 07	FY 08	FY 09	FY 10	FY 11	FY 12	FY 13	Complete	Cost
O&M DW	3.564	3.795	3.975	4.125	4.222	4.330	4.349	4.349	Contg	Contg

D. Acquisition Strategy:

Full and open competition; currently work is tasked via cost plus fixed fee contract.

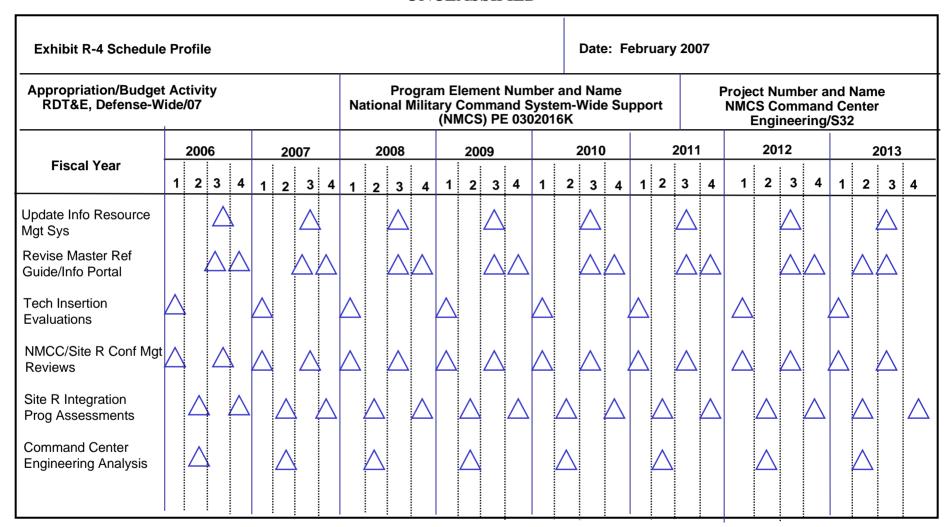
Exhibit R-2, RDT&E Budget Item Jus	DATE: February	2007						
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCE	LATURE						
RDT&E, Defense-Wide/07	National Milita	ry Command Sy	stem-Wide S	upport (N	MCS) / PE	0302016К		
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
NMCS Command Center	.713	.619	.578	.529	.534	.534		
Engineering / S32								

E. Performance Metrics:

The NMCS Command Center Engineering team conducts regularly scheduled In-progress Program Reviews (IPRs) and Configuration Control Board (CCB) meetings to monitor status of engineering projects/tasks. Each current project/task is evaluated in terms of how well the technical work is progressing and how allocated resources are being utilized. Adjustments to resources, schedules, and technical directions are made, as required. Future projects/tasks are also discussed, thereby ensuring an integrated approach is maintained across all related project/task areas.

To further increase the utility of the IPR/CCB structure, the Joint Staff customer participates in the project/task reviews. The result of this approach is a truly integrated effort of NMCS Command Center Engineering, contractor, and Joint Staff working together to achieve common program goals.

Exhibit R-3 Cost An	nibit R-3 Cost Analysis					: Febru	ary 200	7						
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07 Wide Support (NMCS) / PE 0302016K					ystem-			E AND NU l Center		ring / S32				
Cost Category	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 07 Cost	FY 07 Award <u>Date</u>	FY 08 Cost	FY 08 Award <u>Date</u>	FY 09 Cost	FY 09 Award <u>Date</u>	Cost to Complete	Total <u>Cost</u>	Target Value of Contract		
Support Costs Engineering/ Tech Services	CPFF/C	Raytheon E-Sys Arlington, VA	1.169	0.364	04/07	.357	4/08	.310	4/09	Contg	Contg	2.201		
Systems Engineering	CPFF/C	SRA Fairfax VA	2.172	0.354	04/07	.356	4/08	.309	4/09	Contg	Contg	3.193		
Total Cost			3.341	0.718		.713		.619						



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Exhibit R-4a Schedule	Detail			DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07 RDT&E (NMCS) PE 0302						DJECT NAME AN CS Command Ce		ering / S32		
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013		
Update Info Resource Mgt System	3Q	3Q	3Q	3Q	3Q	3Q	3Q	3Q		
Revise Master Ref Guide/Info Portal	3Q,4Q	3Q,4Q	3Q,4Q	3Q,4Q	3Q,4Q	3Q,4Q	3Q,4Q	3Q,4Q		
Tech Insertion Evals	10	1Q	1Q	1Q	1Q	1Q	1Q	1Q		
NMCC Configuration Management Reviews	1Q, 3Q	1Q, 3Q	1Q, 3Q	1Q, 3Q	1Q, 3Q	1Q, 3Q	1Q, 3Q	1Q, 3Q		
Site R Integration Program Assessments	2Q, 4Q	2Q, 4Q	2Q, 4Q	2Q, 4Q	2Q, 4Q	2Q, 4Q	2Q, 4Q	2Q, 4Q		
Command Center Engineering Analysis	2Q	2Q	2Q	2Q	2Q	2Q	2Q	2Q		

Exhibit R-2, RDT&E Budget Item Justifi	ication	DATE:	DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY	R-1 IT	R-1 ITEM NOMENCLATURE							
RDT&E, Defense-Wide/07	Defens	e Informat:	ion Infrast	ructure Eng	gineering &				
			Integr	ation / PE	0302019K				
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Total Program Element	5.548	7.804	8.921	9.143	9.515	9.215			
Global Information Grid Systems Engineering & Support/T62	2.621	2.794	2.874	2.963	3.012	2.712			
Modeling and Simulation/E65	5.124	2.927	5.010	6.047	6.180	6.503	6.503		
UHF SATCOM Integrated Waveform/KCD	22.500	28.000	0.000	0.000	0.000	0.000	0.000	0.000	

A. <u>Mission Description and Budget Item Justification</u>: This program element funds efforts involving the development and fielding of Global Information Grid (GIG) Enterprise Services, including engineering support for the resolution of critical interoperability and integration issues, and assessment of C4I initiatives that will ensure compatibility, interoperability, and technical integration.

Global Information Grid (GIG) Systems Engineering and Support, Project T62, involves the definition and implementation of various aspects of evolving the GIG. It will strengthen critical GIG foundation technologies and programs through the application of precise, short-term, technical, engineering and integration expertise.

Modeling and Simulation, Project E65, provides architecture, systems engineering, and modeling and simulation functions for DISA and its customers, ensuring integrated capabilities to fulfill warfighter mission requirements. Specifically, it performs a broad spectrum of activities for the DoD communications planning and investment strategy, to include: application assessments; contingency planning; network capacity planning and diagnostics; evaluation of horizontal (cross-cutting) operational and system architectures; and systems-level modeling and simulation. Modeling and Simulation develops across-theater information awareness for Combatant Commands through application solutions for integrated networks, to include DoD's missions in Iraq and Afghanistan and the Defense Information Systems Network (DISN), by: (1) supporting the development and consistency of DoD's GIG architectures and ensuring that critical GIG programs are consistent with them and with each other; (2) developing standardized DISA systems engineering and integration processes to improve systems integration across DISA for all DISA-developed communication systems; and (3) providing the underlying modeling and simulation and analytical support for end-to-end DISA and DoD systems engineering and assessment. These modeling and simulation operations are to provide DoD decision-makers, from the Office of the Secretary of Defense (OSD) level to the warfighter, with services and a suite of tools capable of identifying key points

Exhibit R-2, RDT&E Budget Item Justification	DATE: February 2007
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE
RDT&E, Defense-Wide/07	Defense Information Infrastructure Engineering &
	Integration / PE 0302019K

of impact on DoD command and control information systems and recommending tradeoffs within the GIG configuration with regard to prioritized performance, availability, and security.

The Ultra High Frequency (UHF) Satellite Communications (SATCOM) Integrated Waveform (IW) System, Project KCD, is developed by DISA as an improvement to the present UHF SATCOM waveforms. UHF SATCOM provides the US Department of Defense (DoD) and other US Government departments and agencies with critical beyond line-of-sight communications for tactical and special forces operations. UHF SATCOM is the only commercial or military system that enables users to operate communications on-the-move and under all weather conditions and cover. The present UHF SATCOM constellation is aging and the replacement system, the Mobile User Objective System (MUOS), will not provide initial operational capability (IOC) until 2010 and full operational capability (FOC) until 2014, at the earliest. The UHF SATCOM Integrated Waveform will more than double the UHF SATCOM capacity in accesses and data throughput. The majority of fielded UHF SATCOM terminals are software programmable and can be upgraded to IW by updating the software in the field.

This program element is under Budget Activity 07 because it involves efforts supporting operational systems development.

B. Program Change Summary:

	FY06	FY07	FY08	FY 09
Previous President's Budget	5.388	34.007	5.842	8.128
Current Submission	31.186	33.879	5.548	7.804
Total Adjustments	25.798	-0.128	294	324

Change Summary Explanation:

FY 2006 increase is due principally to funding for the new project UHF SATCOM Integrated Waveform.

FY 2007 changes are due to undistributed Congressional Reductions to the Defense-Wide RDT&E appropriation.

FY 2008 and FY 2009 are due to revised fiscal guidance.

Exhibit R-2a, RDT&E Project Justification DATE: February 2007									
APPROPRIATION/BUDGET ACTIVITY PROGRAM ELEMENT PROJECT NAME AND NUMBER									
RDT&E, Defense-Wide/07	DII Engine	DII Engineering & Integration /PE 0302019K Modeling & Simulation / E65							
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Project Cost *	5.124	3.288	2.927	5.010	6.047	6.180	6.503	6.503	

A. Mission Description and Budget Item Justification: This Modeling and Simulation project provides architecture, systems engineering and end-to-end analytical functions for DISA and its customers, ensuring integrated capabilities to fulfill warfighter mission requirements. Specifically, Modeling and Simulation performs a broad spectrum of activities for the DoD communications planning and investment strategy, to include: application assessments; contingency planning; network capacity planning and diagnostics; evaluation of horizontal (crosscutting) operational and system architectures; setting character-oriented message standards; and systems-level modeling and simulation. Modeling and Simulation develops across-theater information awareness for Combatant Commands through application solutions for integrated networks, to include DoD's missions in Iraq and Afghanistan and the Defense Information Systems Network (DISN), by: (1) supporting the development and consistency of DoD's Global Information Grid (GIG) architectures and ensuring that critical GIG programs are consistent with them and with each other; (2) developing standardized DISA systems engineering and integration processes to improve systems integration across DISA for all DISA developed communication systems and services; and (3) providing the underlying modeling and simulation and analytical support for end-to-end DISA and DOD systems engineering and assessment. These operations are to provide DoD decision makers, from the OSD level to the warfighter, with services and a suite of tools capable of identifying key points of impact on DoD command and control information systems and recommending tradeoffs within the GIG configuration with regard to prioritized performance, availability, and security.

• Beginning in FY 2006 this project has been realigned from PE 0303149K. Modeling and Simulation was formerly titled Technical Integration Services. The modeling and simulation portion of Technical Integration Services has been realigned to PE 0302019K due to its direct engineering and integration support to the GIG.

Exhibit R-2a, RDT&E Project Jus	tification		D2	ATE: Februar	ry 2007				
APPROPRIATION/BUDGET ACTIVITY			PR	ROJECT NAME AND	D NUMBER				
RDT&E, Defense-Wide/07	DII Engine	eering & In	tegration	/PE 0302019K	Mo	Modeling & Simulation / E65			
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Project Cost *	5.124	3.288	2.927	5.010	6.047	6.180	6.503	6.503	

B. Accomplishments/Planned Program:

Horizontal Engineering -

FY 2006 - Horizontal Engineering will explore, identify, and frame key end-to-end issues associated with the ability of the GIG to support the warfighter by improving system engineering decisions of DISA programs, and provide a DoD framework for assuring performance meets mission capability requirements.

FY 2007 - Horizontal Engineering will continue the development of a monitoring framework for the GIG to identify and prioritize key end-to-end issues using qualitative and quantitative methods for comparative assessment of alternative architectures in terms of system performance, mission outcome, and potential impact to DoD communication systems together with the assessment of performance management tools to improve application performance.

	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	$\frac{1.342}{}$	$\overline{1.096}$	0.000	0.000

Modeling and Simulation -

FY 2006 - Modeling and Simulation Applications will provide final net-centric transitional designs for the seamless convergence of all DISN customers/services onto GIG as a result of the GIG Bandwidth Expansion (GIG-BE) project, which provides a ubiquitous, secure, and robust network. These designs will provide the detailed roadmap for DISN customers to transition to the GIG-BE by providing "power to the edge" capabilities and capacity that far exceed the existing DISN. Perform FY08 Transport model re-designs for the DISN core. Transitioning legacy circuit onto the DISN core to effectively use the invested GIG Bandwidth Expansion (GIG-BE) project both Transport and IP layers.

FY 2007 - Modeling and Simulation Applications will provide predictive modeling capability and net-centric support for the ongoing and planned major Internet Protocol (IP) services and Net-centric Enterprise Services (NCES) applications

Exhibit R-2a, RDT&E Project Jus	D.F	ATE: Februar	ry 2007	7					
APPROPRIATION/BUDGET ACTIVITY				PROJ	ECT NAME AN	NUMBER			
RDT&E, Defense-Wide/07	DII Engine	eering & In	tegration .	/PE 0302019K		Mode	eling & Simu	lation / E65	
COST (in Millions)	FY06	FY07	FY08	FY09	FY10		FY11	FY12	FY13
Project Cost *	5.124	3.288	2.927	5.010	6.04	17	6.180	6.503	6.503

in the converged IP Services, which will improve quality of service and the ability to evaluate Service Level Agreements (SLAs) with the warfighter.

FY 2008 - Modeling and Simulation Applications will provide DISN predictive modeling capability planning and topology design. Incorporate Services models to provide End to End performance analysis if the GIG. Provide performance analysis and technical recommendations for COMCOMs network redesign, upgrades. Build and simulate GIG IP convergence model to predict network behavior, for design and upgrade. Perform modeling and simulation to assist DISA and DoD programs and services in migration to IPv6 network.

FY 2009 - Build model to validate the GIG architecture frame work. Provide performance measurement and instrumentation to DISA acquisition programs. Collaborate with Services to build and simulate the DoD Command and Control information systems and recommending tradeoffs within the GIG configuration with regard to prioritized performance, availability, and security. Perform/analyze and provide technical recommendation to improve performance of the tactical edge network within the GIG. Provide Modeling and DISN predictive modeling capability planning and topology design. Incorporate Services models to provide End to End performance analysis if the GIG. Provide performance analysis and technical recommendations for COMCOMs network redesign, upgrades. Build and simulate GIG IP convergence model to predict network behavior, for design and upgrade. Perform modeling and simulation to assist DISA and DoD programs and services in migration to IPv6 network.

	<u>FY 06</u>	<u>FY 07</u>	FY 08	FY 09
Subtotal Cost	3.782	2.192	2.927	5.010

C. Other Program Funding Summary: (\$M)

	FY 06	FY 07	FY 08	FY 09	FY 10	<u>FY11</u>	FY12	FY13	<u>To</u>	Total
O&M, DW	8.954	7.168	7.640	21.388	22.205	20.395	20.663	23.064	Complete Contg	<u>Cost</u> Contg

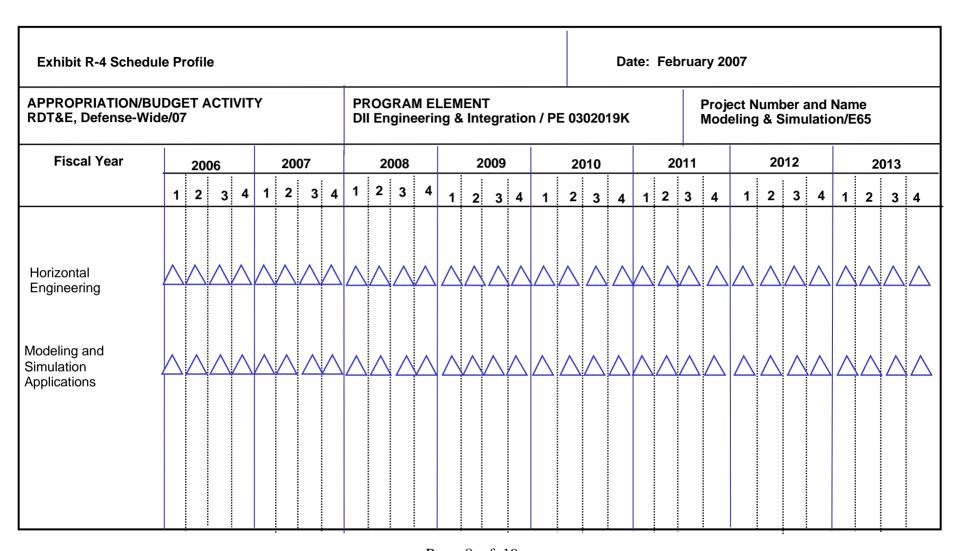
Exhibit R-2a, RDT&E Project Jus	stification		DZ	ATE: Februar	ry 2007			
APPROPRIATION/BUDGET ACTIVITY			P	ROJECT NAME AN	D NUMBER			
RDT&E, Defense-Wide/07	DII Engine	OII Engineering & Integration /PE 0302019K Modeling & Simulation / E65						
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost *	5.124	3.288	2.927	5.010	6.047	6.180	6.503	6.503

D. <u>Acquisition Strategy</u>: Uses a number of contractors for modeling support with Booz, Allen Hamilton, Inc. and OPNET Technologies being the two main providers of these services. The level of support includes network model development; software installation and maintenance; software revisions or patches; and software upgrades. These companies are uniquely qualified to provide the necessary level of technical support and services to ensure DISA uses the leading edge communication technologies.

E. Performance Metrics:

Modeling and Simulation's systems engineering is measured by its impact on the DoD communications planning and investment strategy, with criteria based on performance of a broad spectrum of technical activities. These include application assessments; contingency planning; network capacity planning and diagnostics; system architecture evaluation; technical and operational assessments of emerging technologies; and systems-level modeling and simulation.

Exhibit R-3 Cos	st Analysi:		DATE: February 2007									
APPROPRIATION/	BUDGET ACT	IVITY PROG	RAM ELE	MENT		PROJECT NAME AND NUMBER						
RDT&E, Defense-	-Wide/07	DII	Enginee	ring & In	tegration	n / PE 03	02019K	Mode	eling & S	imulation	/ E65	
	-	-	-	-	-	-		-			-	-
	Contract	Performing	Total		FY 07		FY 08		FY 09	Cost to		Target
	Method &	Activity &	PYs	FY 07	Award	FY 08	Award	FY 09	Award	Complet	Total	Value of
Cost Category	Type	Location	Cost	Cost	Date	Cost	<u>Date</u>	Cost	<u>Date</u>	<u>e</u>	Cost	Contract
Modeling and Simulation Systems	CPFF	Verizon/BBNT McLean, Va	0.925	0.729	02/07	0.627	1/08	1.310	1/09	Contg	Contg	1.454
Engineering and												
Integration Com modeling and simulation	CPFF	OPNET Tech, Inc.	0.916	0.460	01/07	0.400	01/08	0.800	01/09	Contg	Contg	0.876
	CPFF	Bethesda, MD Pragmatics, McLean, Va	0.875	0.679	01/07	0.600	01/08	0.700	01/09	Contg	Contg	1.354
	CPFF/8A	CNS, Inc Springfield, Va	0.900	0.400	01/07	0.400	01/08	0.900	01/09	Contg	Contg	0.800
	CPFF	Booz, Allen & Hamilton, McLean, VA	0.801	0.534	03/07	0.500	3/08	0.700	03/09	Contg	Contg	1.035
	CPFF	I-Assure	0.707	0.486	03/07	0.400	03/08	0.600	03/09	Contg	Contg	0.200
TOTAL			5.124	3.288		2.927		5.010				



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Exhibit R-4a Schedule De	tail			DATE: Fe	bruary 2007	1		
APPROPRIATION/BUDGET ACT	'IVITY	PROGRAM ELEMI	ENT			PROJECT NAME	AND NUMBER	
RDT&E, Defense-Wide/07		DII Engineer:	ing & Integr	ation / PE 0	302019К	Modeling and	l Simulation	/ E65
Schedule Profile Horizontal Engineering	FY 2006 1-4Q	FY 2007 1-4Q	<u>FY 2008</u> 1-4Q	FY 2009 1-4Q	FY 2010 1-4Q	FY 2011 1-4Q	FY 2012 1-4Q	<u>FY 2013</u> 1-4Q
Modeling and Simulation Applications	1-4Q	1-40	1-4Q	1-4Q	1-4Q	1-40	1-4Q	1-4Q

Exhibit R-2a, RDT&E Project J	ustification		DA	ATE: Februar	y 2007	7			
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT				PRO	JECT NAME ANI	NUMBER	
RDT&E, Defense-Wide/07	DII Engi:	neering & I	ntegration	/ PE 0302019	PΚ	UHF	SATCOM Integ	grated Wavefo	orm / KCD
COST (in Millions)	FY06	FY07	FY08	FY09	FY1	. 0	FY11	FY12	FY13
Project Cost *	22.500	28.000	0	0	0		0	0	0

A. Mission Description and Budget Item Justification: The Ultra High Frequency (UHF) satellite communications (SATCOM) system provides the US Department of Defense (DoD) and other US Government departments and agencies critical beyond line-of-sight communications for tactical and special forces operations. UHF SATCOM is the only commercial or military system that enables users to operate communications on-the-move and under all weather conditions and cover. The present UHF SATCOM constellation is aging and the replacement system, the Mobile User Objective System (MUOS), will not provide initial operational capability (IOC) until 2010 and full operational capability (FOC) until 2014, at the earliest. The MUOS deployment is contingent on the Joint Tactical Radio System (JTRS) terminals being fielded across all services. Assuming that the MUOS and JTRS are deployed on time and all current UHF satellites continue to operate, the UHF SATCOM system is short on meeting present user needs. DISA developed the Integrated Waveform (IW) as an improvement on the present UHF SATCOM waveforms. IW implementation will more than double the UHF SATCOM capacity in accesses and data throughput. The majority of fielded UHF SATCOM terminals are software programmable and can be upgraded to IW by updating the software in the field. The Commander of US Central Command (CENTCOM) reports that for the present military operations in Iraq and Afghanistan, CENTCOM was provided additional UHF SATCOM channels from the PACOM and EUCOM apportionments. But even with these additional channels, UHF SATCOM resources were not sufficient to meet CENTCOM needs.

B. Accomplishments/Planned Program:

FY 2006 - Supplemental funding for implementation of integrated waveform.

FY 2007 - By developing IW demand assignment capabilities, preplanned or ad-hoc services can be activated and deactivated by user terminals using orderwire messages. IW improves demand assigned service because the assignment is permitted across a larger pool of resources. IW is more efficient and will have more access resources available. Having more accesses, users will be able to receive a quicker response with IW than with the current Demand Assigned Multiple Access (DAMA) services. Implementing a much simpler and easier to use service-on-demand will enable warfighters to maximize the advantages of the present UHF SATCOM system. In addition, it will prepare the users for the Mobile User Objective System (MUOS), which will be a demand assignment system. Implementing the IW capabilities in the fielded software-programmable terminals will provide the warfighter:

• Substantially more system capacity

Exhibit R-2a, RDT&E Project J	ustification		DA	ATE: Februar	y 2007	7			
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT				PRO	JECT NAME ANI	NUMBER	
RDT&E, Defense-Wide/07	DII Engi:	neering & I	ntegration	/ PE 0302019	PΚ	UHF	SATCOM Integ	grated Wavefo	orm / KCD
COST (in Millions)	FY06	FY07	FY08	FY09	FY1	. 0	FY11	FY12	FY13
Project Cost *	22.500	28.000	0	0	0		0	0	0

- Demand assignment of preplanned services
- Support ad-hoc services
- Dynamic bandwidth allocation
- Join The NET request (Informs a user to join a NET in progress)
- Service-waiting notification (similar to call-waiting)

C. Other Program Funding Summary: N/A

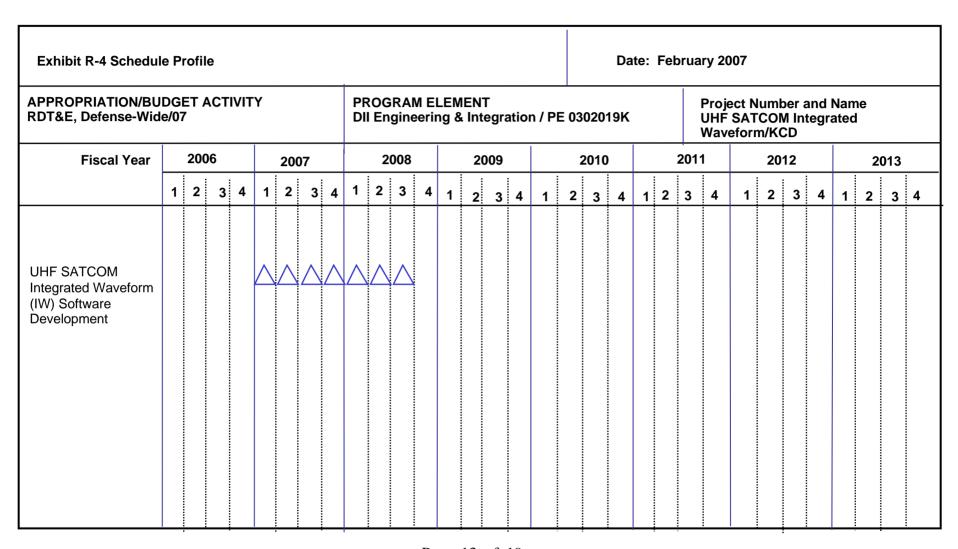
D. Acquisition Strategy:

Fixed price contract will be awarded for IW software development for selected UHF SATCOM terminals. Based on current military operations, the Joint Staff and STRATCOM have evaluated and recommended, which fielded terminals should be IW upgraded. The Net-Centric Functional Configuration Board endorsed the Joint Staff and STRATCOM recommended terminals for IW upgrades. DISA will lead the software development for six types of deployed UHF SATCOM terminals. The terminal list includes: the PRC-117F developed by Harris Corporation, the PSC-5C, PSC-5D and ARC-231 developed by Raytheon Corporation, and the MD-1324 and RT-1828 developed by ViaSat Corporation. In addition, the software of the channel Control Terminal (CT), developed by General Dynamics, and the Satellite Access Control (SAC) system developed by the Navy, will be upgraded to IW. The software will be certified for waveform compliance and interoperability and then will be fielded. Software installation and operating instructions will be developed to assist the UHF SATCOM users with the software upgrades and operations of the terminals.

E. Performance Metrics:

The system engineering for the IW waveform improvement has been completed and published in the latest revisions of information technology standards for UHF SATCOM. Integrated Waveform demonstrations using UHF SATCOM terminals have proven the performance improvement of IW, in terms of link and voice quality and capacity. The performance of the terminal software developed by the various vendors will be measured against the IW standards interoperability and performance requirements. Standards compliance and interoperability testing will be performed by the Joint Interoperability Test Command (JITC) on each and every terminal type upgraded to IW.

Exhibit R-3 Cost	Analysis				DAT	TE: Febru	uary 200)7				
APPROPRIATION/BUDG	GET ACTIVIT	TY PROGRAM E	LEMENT					PROJ	ECT NAM	E AND NUMB	ER	
RDT&E, Defense-Wid	de/07	DII Engin	eering &	Integra	ation /	PE 0302	019K	UHF	SATCOM :	Integrated	Wavefo:	rm / KCD
	Contract Method &	Performing Activity &	Total PYs	FY 07	FY 07 Award	FY 08	FY 08 Award	FY 09	FY 09 Award	Cost to	Total	Target Value of
Cost Category	<u>Type</u>	<u>Location</u>	<u>Cost</u>	Cost	<u>Date</u>	Cost	<u>Date</u>	Cost	<u>Date</u>	<u>Complete</u>	Cost	<u>Contract</u>
Deployed legacy terminals software development	FPAF	Harris Corp Rochester NY	10.000	4.000	02/07	0.000	N/A	0.000	N/A	4.000	4.000	4.000
	FPAF	Raytheon Corp Ft Wayne IND	6.000	3.500	01/07	0.000	N/A	0.000	N/A	3.500	3.500	3.500
	FPAF	ViaSat Corp Carlsbad Ca	0.000	4.000	01/07	0.000	N/A	0.000	N/A	4.000	4.000	4.000
SCA compliant terminal software development	FPAF	TBD	0.000	5.000	03/07	0.000	N/A	0.000	N/A	5.000	5.000	5.000
Channel Controller (CC) Software development	FPAF	TBD	0.000	5.000	02/07	0.000	N/A	0.000	N/A	5.000	5.000	5.000
CC terminal Software development	FPAF	Gen. Dynamics Scottsdale AZ	0.000	4.114	02/07	0.000	N/A	0.000	N/A	4.114	4.114	4.114
Terminal certification testing	FPAF	JITC Various Contracts	0.000	0.450	11/07	0.000	N/A	0.000	N/A	0.450	0.450	.450
Engineering & Help Desk Support	CPFF	Able Communications Sterling VA	6.500	1.936	01/07	0.000	N/A	0.000	N/A	1,936	1.936	1.936
TOTAL			22.500	28.000								28.000



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			UNCL	ASSIFIED				
Exhibit R-4a Schedule De	tail			DATE: Feb	oruary 2007			
APPROPRIATION/BUDGET ACT	IVITY	PROGRAM ELEME				PROJECT NAME		
RDT&E, Defense-Wide/07		DII Engineeri	ng & Integra	ation / PE 03	302019K	UHF SATCOM I	ntegrated Wa	veform / KCD
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	<u>FY 2011</u>	FY 2012	FY 2013
UHF SATCOM Integrated Waveform (IW) Software Development		1-4Q	1-3Q					

Exhibit R-2a, RDT&E Project Just	cification		Date	e: Februar	cy 2007			
APPROPRIATION/BUDGET ACTIVITY	PROGRA	M ELEMENT				PROJECT NAME A	ND NUMBER	
RDT&E, Defense-Wide/07	DII En	gineering 8	k Integrati	on / PE 030	02019K	Global Informa	ation Grid (0	GIG)
						Systems Engine	ering and Su	upport/ T62
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost	3.562	2.591	2.621	2.794	2.874	2.963	3.012	2.712

A. Mission Description and Budget Item Justification:

Efforts under this project will strengthen critical Global Information Grid (GIG) technologies and programs through the establishment of DISA technology strategies, and through the implementation of those strategies in DISA programs and services. This engineering and technical expertise will be applied in conducting technical reviews of all solutions, products, and services to determine compliance with overall DISA strategy, and to evaluate soundness of technical approach. This effort will support end-to-end reviews of all solutions, programs, and services to ensure all are consistent with GIG architecture and standards. This project supports definition of various aspects of evolving the GIG, including developing system architecture constructs for the GIG and its components, providing engineering guidance for component evolution including incorporation of new technology from industry. Subtasks are assigned based on need to address specific technical problems, mitigate risks, and take advantage of cross-program synergies.

B. Accomplishments/Planned Program:

	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	3.562	2.591	2.621	2.794

Engineering and technical support of DISA programs that implement the GIG involves technical research and analysis of state-of-the-art and emerging technologies, security, architectures, and application frameworks. This involves the identification and recommendation of innovative engineering techniques, technologies and products effort. It includes the support of information exchanges with the Services, OSD, the Combatant Commanders, and the Joint Staff to identify opportunities, issues, and solutions to improve DISA products; and facilitation and harmonization of cross-corporate programs relative to DISA programs and the GIG.

C. Other Program Funding Summary: O&M, DW

FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
0.987	0.928	0.889	0.911	0.921	0.875	0.897	0.893

Exhibit R-2a, RDT&E Project Just	ification		Date	e: Februar	ry 2007			
APPROPRIATION/BUDGET ACTIVITY	PROGRA	M ELEMENT				PROJECT NAME A	ND NUMBER	
RDT&E, Defense-Wide/07	DII En	gineering 8	k Integrati	on / PE 030	02019K	Global Informa	ation Grid (0	GIG)
						Systems Engine	ering and Su	upport/ T62
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost	3.562	2.591	2.621	2.794	2.874	2.963	3.012	2.712

D. <u>Acquisition Strategy</u>: This project provides technical, engineering, and integration expertise to the DISA Chief Technology Officer (CTO) in support of the major GIG components, which include: GIG Enterprise Services (GES), Defense Information Systems Network (DISN), Satellite Communications (SATCOM), GIG Directory Service, Global Combat Support System (GCSS), Net-Enabled Command Capability (NECC), Teleport, Global Command and Control System (GCCS), Enterprise Services Management (ESM), Information Assurance (IA), Wireless Services, Net-Centric Enterprise Services (NCES), and other related components. Through this project MITRE will support the definition and implementation of various aspects involving the GIG. MITRE will provide support to DISA in its mission of providing end-to-end systems engineering for the DoD for GIG Enterprise Services. MITRE will ensure that system integration and implementation is coordinated with other major C2 systems via its support to other C2 System Program Executive Offices.

E. Performance Metrics:

The Task Order is composed of multiple short-suspense technology research/exploration components with a concrete deliverable targeted at some facet of the DISA mission.

Each research initiative is produced in collaboration with a designated task subject matter specialist.

These engineering tasks are short term in nature and designed to facilitate bringing high-potential over-the-horizon technology into engineering programs supporting the Agency mission.

Engineering support is provided for CTO technical reviews of DISA programs, at least 4 reviews supported per month.

Exhibit R-3 Cost A	nalysis				DATE:	February	<u>7</u> 2007					
APPROPRIATION/BUDG	ET ACTIVITY	PRO	GRAM ELEMEN	1T			PROJEC	T NAME	AND NUM	BER		
RDT&E, Defense-Wid	le/07	DII	Engineerir	ng & Int	egration	1/PE	Global	Inform	ation G	rid (GIG)	Syste	ms
		030	2019K				Engine	ering a	nd Suppo	ort / T62		
	Contract	Performing	-	·	FY07	·	FY08	·	FY09	-	·	Target
	Method &	Activity &	Total PYs	FY07	Award	FY08	Award	FY09	Award	Cost To	Total	Value of
Cost Category	Type	Location	Cost	Cost	Date	Cost	Date	Cost	Date	Complete	Cost	Contract
Engineering /Tech	Other Than	MITRE										
Services	Full &	McLean, VA	11.616	2.591	1 Oct	2.621	1 Oct	2.794	1 Oct	Contg	Contg	19.622
	Open CPFF				06 and		07 and		08 and			
					1 Feb		1 Feb		1 Feb			
					07		08		09			

ppropriation/Bud DT&E, Defense-W	get A /ide/0	ctiv 7	ity						Pi Di	ogr I Er	am ngin	Ele: eeri	men ing a	t Nı & In	ımb tegr	er a atio	nd N n/PE	ame : 030) 0201	9K		G	loba E	ıl Inf	ject orma neeri	ation	ո Gr	id (G	iG)	Sys	tem:	S
Fiscal Year		20	006			20	07			20	800			20	009			20	10			2	011			20	12			20	013	
	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	1	2	3	
echnical Direction gent (TDA)																																

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Exhibit R-4a Schedule Detail			DATE: Februa:	ry 2007			
APPROPRIATION/BUDGET ACTIVITY	PROGRAM ELEM	ENT		PROJECT 1	NAME AND NUM	IBER	
RDT&E, Defense-Wide/07	DII Engineer	ing & Integ	gration/			Grid (GIG) S	ystems
	PE 0302019K			Engineer:	ing and Supp	ort / T62	
Schedule Profile	FY 2005	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011
Technical Direction Agent (TDA)	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q
recinitear birection Agent (IDA)	1 10	1 10	1 40	1 10	1 40	1 10	1 40

Exhibit R-2, RDT&E Project Justification				Date: February 2007						
APPROPRIATION/BUDGET ACTIVITY				ITEM NOMEN	CLATURE					
RDT&E, Defense-Wide/07				Long Haul Communications - DCS/PE 0303126K						
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13		
Total Program Element	1.712	5.353	16.487	4.537	3.610	3.657	2.715	2.715		
DISN Systems Engineering Support/T82	1.712	5.353	1.487	1.537	1.610	1.657	1.715	1.715		
National Emergency Action		_	15.000	3.000	2.000	2.000	1.000	1.000		
Decision Network (NEADN)	_	_	13.000	3.000	2.000	2.000	1.000	1.000		

A. Mission Description and Budget Item Justification: This Program Element (PE) funds the DISA Direct suite of tools which is the front-end web-based applications utilized by thousands of DISA Customers to order DISN and non-DISN telecommunications and equipment. The ordering software supports the Enhanced Planning Process (EPP) now referred to as DISN Subscription Services, which is the OSD, mandated cost recovery program started in October 2005. The unclassified DISA Direct suite was implemented in December 1999/January 2000 and is undergoing enhancements to accommodate the revisions to the DISN Subscription programs along with new development to support the customer/warfighter's requirements and to keep up-to-date with the rules for ordering telecommunications and equipment. The classified DISA Direct suite was implemented in May 2006. Both platforms work with numerous other legacy and new systems that are being developed in order to provision and procure telecommunications products and services. DISA Direct is currently mandated for use by all DISA customers ordering telecommunications services from DISA. This system will be funded for sustained operations. In addition, this PE funds systems engineering for the DISN Element Management Systems (EMS) and Secure Voice over Internet Protocol (VoIP) Real Time Services (RTS) which provides DISN-wide network element management for the day-to-day operations of the DoD and serves as the core of DoD wartime communications for the President and Secretary of Defense, the Joint Chiefs of Staff (JCS), the Combatant Commanders, and other critical users. PE 0303126K provides the engineering to consolidate operational communications networks into DISN and supports the convergence of Service and Agency network services (i.e. telephony, video, etc) into the GIG. This PE funds the critical and essential engineering required to modify/expand upon commercial equipment and service offerings, to implement rapidly advancing communications technology, to update network design tools in order to continue providing cost savings, and to continue offering valuable new cost effective information technology capabilities and services to customers. It provides for the development of needed information technology capabilities by targeting RDT&E efforts to DoD mission needs. In addition, this PE funds system engineering evaluations and development of critical features for Secure Voice over IP Real Time Services (RTS) that is beyond the features of commercial VoIP offerings. These special features such as Multi-Level Security, Quality of Service, Assured Service, large conference management and control are necessary capabilities that must be developed for a Secure VoIP application to be able to replace the existing TDM Defense Red Switch Network (DRSN). The Distributed Ground Network (DGN) is required to support New Triad Command, Control, and Communications missions assigned to United States Strategic Command (USSTRATCOM). This funding provides systems engineering, planning, and development of broadband, survivable, voice, video, and data capability for Commander USSTRATCOM support to the

Exhibit R-2, RDT&E Project Justification				Date: February 2007					
APPROPRIATION/BUDGET ACTIVITY				ITEM NOMEN	CLATURE				
RDT&E, Defense-Wide/07				Long Haul Communications - DCS/PE 0303126K					
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Total Program Element	1.712	5.353	16.487	4.537	3.610	3.657	2.715	2.715	
DISN Systems Engineering	1.712	5.353	1.487	1.537	1.610	1.657	1.715	1.715	
Support/T82									
National Emergency Action	-	-	15.000	3.000	2.000	2.000	1.000	1.000	
Decision Network (NEADN)									

President, Secretary of Defense, Chairman, Joint Chiefs of Staff, and other national/military leaders. This project includes the critical and essential engineering required to implement technologies such as Asynchronous Transfer Mode (ATM) and Dense Wave Division Multiplexing (DWDM) into the National Command and Control System (NCCS).

As the National Emergency Action Decision Network (NEADN) formerly the Presidential and National Voice Conferencing (PNVC) project lead and system engineer, this PE also funds system engineering, planning, development, integration, and testing of new baseband (cryptographic and voice encoder/vocoder) equipment needed to provide survivable, near toll-quality voice conferencing capability for the President, Secretary of Defense, Chairman, Joint Chiefs of Staff, and other national/military leaders. This project includes the critical and essential engineering required to develop new vocoder and cryptographic equipment by taking advantage of ongoing RDT&E efforts by another Defense component. These baseband devices, referred to as the Baseband Interface Group (BIG), implement new technology capabilities such as multi-stream cryptography/vocoding and information technology capabilities such as baseband Ethernet interfaces supporting baseband Internet Protocol (IP) addressing. This project implements Joint Staff requirements for Advanced Extremely High Frequency (AEHF) voice conferencing in synchronization with the AEHF terminal fielding schedules.

В.

Program Change Summary:	FY06	FY07	FY08	FY09
Previous President's Budget	1.449	1.523	1.555	$\overline{1.59}1$
Current Submission	1.712	5.353	16.487	4.537
Total Adjustments	0.263	3.830	14.932	2.946

Change Summary Explanation:

FY 2006 change due to below threshold reprogramming.

FY 2007-2009 changes are due to revised fiscal guidance.

Exhibit R-2a, RDT&E Project Justi	Date	Date: February 2007							
APPROPRIATION/BUDGET ACTIVITY			R-1	R-1 ITEM NOMENCLATURE					
RDT&E, Defense-Wide/07			Long	Long Haul Communications - DCS/PE 0303126K					
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
DISN Systems Engineering Support/T82	1.712	5.353	1.487	1.537	1.610	1.657	1.715	1.715	

A. Mission Description and Budget Item Justification: This Program Element (PE) funds the DISA Direct suite of tools which is the front-end web-based applications utilized by thousands of DISA Customers to order DISN and non-DISN telecommunications and equipment. The ordering software supports the Enhanced Planning Process (EPP) now referred to as DISN Subscription Services, which is the OSD, mandated cost recovery program started in October 2005. The unclassified DISA Direct suite was implemented in December 1999/January 2000 and is undergoing enhancements to accommodate the revisions to the DISN Subscription programs along with new development to support the customer/warfighter's requirements and to keep up-to-date with the rules for ordering telecommunications and equipment. The classified DISA Direct suite was implemented in May 2006. Both platforms work with numerous other legacy and new systems that are being developed in order to provision and procure telecommunications products and services. DISA Direct is currently mandated for use by all DISA customers ordering telecommunications services from DISA. This system will be funded for sustained operations. In addition, this PE funds systems engineering for the DISN Element Management Systems (EMS) and Secure Voice over Internet Protocol (VoIP) Real Time Services (RTS) which provides DISN-wide network element management for the day-to-day operations of the DoD and serves as the core of DoD wartime communications for the President and Secretary of Defense, the Joint Chiefs of Staff (JCS), the Combatant Commanders, and other critical users. PE 0303126K provides the engineering to consolidate operational communications networks into DISN and supports the convergence of Service and Agency network services (i.e. telephony, video, etc) into the GIG. This PE funds the critical and essential engineering required to modify/expand upon commercial equipment and service offerings, to implement rapidly advancing communications technology, to update network design tools in order to continue providing cost savings, and to continue offering valuable new cost effective information technology capabilities and services to customers. It provides for the development of needed information technology capabilities by targeting RDT&E efforts to DoD mission needs. In addition, this PE funds system engineering evaluations and development of critical features for Secure Voice over IP Real Time Services (RTS) that is beyond the features of commercial VoIP offerings. These special features such as Multi-Level Security, Quality of Service, Assured Service, large conference management and control are necessary capabilities that must be developed for a Secure VoIP application to be able to replace the existing TDM Defense Red Switch Network The Distributed Ground Network (DGN) is required to support New Triad Command, Control, and Communications missions assigned to United States Strategic Command (USSTRATCOM). This funding provides systems engineering, planning, and development of broadband, survivable, voice, video, and data capability for Commander USSTRATCOM support to the President, Secretary of Defense, Chairman, Joint Chiefs of Staff, and other national/military leaders. This project includes the critical and essential engineering required to implement technologies such as Asynchronous Transfer Mode (ATM) and Dense Wave Division Multiplexing (DWDM) into the National Command and Control System (NCCS).

Exhibit R-2a, RDT&E Project Justification				Date: February 2007					
APPROPRIATION/BUDGET ACTIVITY			R-1	R-1 ITEM NOMENCLATURE					
RDT&E, Defense-Wide/07			Lon	Long Haul Communications - DCS/PE 0303126K					
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
DISN Systems Engineering	1.712	5.353	1.487	1.537	1.610	1.657	1.715	1.715	
Support/T82									

B. Accomplishments/Planned Program:

 FY 06
 FY 07
 FY 08
 FY 0

 Subtotal Cost

Systems Engineering for DISA Direct Order Entry (DDOE) Development - DISA Direct provides users the capability to order from a classified or unclassified platform. It allows DoD and non-DoD agencies to control who submit and approve (both from a funding and a quality assurance) requirements prior to them being sent to DISA for provisioning and procurement. The suite also tracks the DISN Subscriptions for the cost recovery program mandated by OSD. Performance is based upon the feedback from the customer community along with the DISA Direct Configuration Control Board (CCB), which is made up of the major DISA Direct customers. Other performance metrics are provided by software tools that are part of the production unclassified and classified platforms located at the DECC in Oklahoma City. These tools are currently being evaluated and the metrics outlined in order to monitor the performance of the suite of tools. Enhancements include adding new type services as well as enhancing the original Telecom Request versions to an updated Smart Telecom Request version. In FY 2006, only one fourth of the Telecom Requests type services have been converted to the Smart TR versions. The remaining type services are projected in FY 2007. Additional changes to the DISN Subscriptions are also projected along with the customer suggested enhancements.

 FY 06
 FY 07
 FY 08
 FY 09

 Subtotal Cost
 .570
 .914
 .892
 .922

Systems Engineering for Element Management Systems (EMS) - Provide ongoing COTS systems research, evaluation, test and integration to reduce the risks and delays of inserting new communications technologies into the DISN EMS tools by performing assessments and proof of concept implementations. Engineer the insertion of technology into the DISN Core EMS systems (e.g., Fault Management, Performance Management, Configuration Management, etc.). Continue engineering support for on-going technology assessments, testbed assessments, prototyping, and mission support. Provide technical leadership in implementing recommended solutions involving DISN EMS tools. New efforts involve supporting the evaluation of a new Optical EMS tool, Single Sign-on solution, Service Oriented Architecture, and supporting integration of DISN network management onto the DISN EMS tools. Funding is required to evaluate, develop and integrate Element Management Systems (EMS) to consolidate legacy DISN EMSs. Key DISN consolidation efforts that will require this support

Exhibit R-2a, RDT&E Project Justi	Dat	Date: February 2007							
APPROPRIATION/BUDGET ACTIVITY			R-1	R-1 ITEM NOMENCLATURE					
RDT&E, Defense-Wide/07			Lon	Long Haul Communications - DCS/PE 0303126K					
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
DISN Systems Engineering Support/T82	1.712	5.353	1.487	1.537	1.610	1.657	1.715	1.715	

in FY 2007 - FY 2013 are DATMS, Teleport, Promina, DSN, and DRSN. This is a continuation of the efforts started in FY06 & FY07 focusing on IP EMS consolidation (NIPR/SIPR). This funding will be used to evaluate, consolidate and integrate existing EMSs to provide the functionality currently provided by AMS, PANAVUE/netMS, ADMISS, ARDMISS and Teleport EMS solutions and integrate them into the DISN Core EMS tools. Consolidation & integration of tools results in more efficient utilization of existing resources, provides end-to-end situational awareness, allows for the decommissioning of legacy tools, and reduces future sustainment costs.

 FY 06
 FY 07
 FY 08
 FY 09

 Subtotal Cost
 .352

Systems Engineering for DISN Leading Edge Services (DISN-LES) - Provides systems engineering, support and planning for the transition of the DISN-LES pilot network into the DISN and Sustainment to provide an RDT&E infrastructure as a future Defense Working Capital Fund (DWCF) DISN Subscriber Service (DSS). Support provides the architecture, engineering and planning necessary to migrate the DISN-LES network infrastructure from an Internet Protocol (IP) over Asynchronous Transfer Mode (ATM) commercial Public ATM (PATM) infrastructure to the DISN government infrastructure. The migration requires an architecture and engineering approach that supports the existing customer base and transition from ATM to IP. This infrastructure will provide the network and computing infrastructure that supports Advanced Concept Technology Demonstrations (ACTDs) and Test and Evaluation of new technologies and value-added services not offered as part of the DSS but planned as candidate systems for Net-Centric Enterprise Services (NCES).

 FY 06
 FY 07
 FY 08
 FY 09

 Subtotal Cost
 .609
 .595
 .615

Systems Engineering for Secure Voice over Internet Protocol - Provide systems engineering to develop and insert new communications technologies into the DISN by performing assessments and proof of concept implementations. Engineer the insertion of technology into the DISN Secure Voice over Internet Protocol (VoIP), IP Class of Service/Quality of Service (CoS/QoS), Multi-Level Security for Voice RTS. New efforts involve developing overarching design for next generation routing/QoS/CoS, and IP enabled Services such as Telephony.

 FY 06
 FY 07
 FY 08
 FY 09

 Subtotal Cost
 3.850

Exhibit R-2a, RDT&E Project Justification				Date: February 2007					
APPROPRIATION/BUDGET ACTIVITY			R-	1 ITEM NOMEN	CLATURE				
RDT&E, Defense-Wide/07			Lo	Long Haul Communications - DCS/PE 0303126K					
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
DISN Systems Engineering Support/T82	1.712	5.353	1.487	1.537	1.610	1.657	1.715	1.715	

Systems Engineering for Distributed Ground Network (DGN) - Provides systems engineering, planning, and development of broadband, survivable, voice, video, and data capability for Commander USSTRATCOM support to the President, Secretary of Defense, Chairman, Joint Chiefs of Staff, and other national/military leaders. This project includes the critical and essential engineering required to implement technologies such as Asynchronous Transfer Mode (ATM) and Dense Wave Division Multiplexing (DWDM) into the National Command and Control System (NCCS).

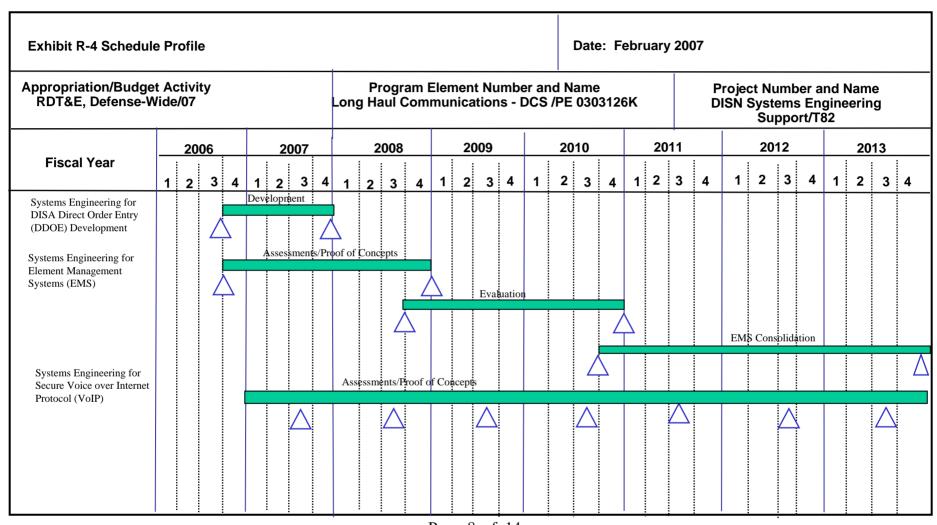
C. Other Program Funding Summary: N/A

D. <u>Acquisition Strategy</u>: For DDOE and EMS, continue with the same acquisitions that include a Small Disadvantaged contractor under the DISN Global Services (DGS) contract. Procure test hardware and tools from a variety of Commercial Off-the-Shelf vendors. For Secure VoIP RTS, MIPR funds to NSA to contract with their security technology firms for studies and specification development for Multi-Level Security implementations for Secure Voice Real Time Services. Use existing DISA contracts to study and develop specifications for IP Class of Service/Quality of Service and Assured Service. For DGN, continue to use existing DISN support contracts for engineering and technical assistance.

E. Performance Metrics:

- 1. Planned versus actual schedule (difference in days) for major milestones/deliverables.
- 2. Number of planned versus actual funds spent.
- 3. Adherence of contractor deliverables to SOW specifications.
- 4. Compliance with Performance Surveillance Plans contained in contracted efforts.

Exhibit R-3 Cost	Analysis					DATE:	Februar	ry 200	7			
APPROPRIATION/BU		'ITY	PROGRAM							AME AND I		
RDT&E, Defense-W	ide/07		Long Hau 0303126K		unicati	ons -DC	S / PE	DIS	DISN Systems Engineering			g Support / T82
Cost Category	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY07 Cost	FY07 Award Date	FY08 Cost	FY08 Award Date	FY09 Cost	FY09 Award <u>Date</u>	Cost To Complete	Total Cost	Target Value of Contract
Systems Engineering for Element Management Systems (EMS)	DGS & Time and Materials	Apptis/SAIC- DISA	.570	.914	10/06	.892	10/07	.922	10/08	Contg	Contg	N/A
Systems Engineering for Secure Voice over Internet Protocol (VoIP)	Various	Various performers	-	.609	03/07	0.595	TBD	.615	TBD	Contg	Contg	N/A
Systems Engineering for Distributed Ground Network (DGN)	Various	Various	-	3.830	TBD	_	-	-	_	Contg	Contg	N/A



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Exhibit R-4a Schedule Detail			DATE:	February	2007			
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT			PROJECT NAME	AND NUMBER	t	
RDT&E, Defense-Wide/07	Long Hav	ul Communica	ations - DC	S/	DISN Systems	Engineerin	ng Support/	T82
	PE 0303	126K						
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
Systems Engineering for DISA Direct Order Entry (DDOE) Development	4 Q	1-4Q						
Systems Engineering for Element Management Systems (EMS): Assessments/Proof of Concepts	4Q	1-4Q	1-4Q					
Evaluation			4Q	1-4Q	4Q			
EMS Consolidation					4Q	1-4Q	1-4Q	1-4Q
Systems Engineering for Secure Voice over Internet Protocol (VoIP)		1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	

Exhibit R-2a, RDT&E Project Justificat	DAT	E: Februa:	ry 20	07						
APPROPRIATION/BUDGET ACTIVITY		PROGRAM ELEMENT					PROJECT NAME AND NUMBER			
RDT&E, Defense-Wide/07		Long Haul Communications - DCS / PE					National Emergency Action Decision			
	0303126K				Network (NEADN)					
Cost (in millions)	FY06	FY07	FY08	FY09	F	'Y10	FY11	FY12	FY13	
National Emergency Action Decision	0.000	0.000	15.000	3.000	2	.000	2.000	1.000	1.000	
Network (NEADN) / PC01										

A. <u>Mission Description and Budget Item Justification</u>: As the National Emergency Action Decision Network (NEADN) formerly the Presidential and National Voice Conferencing (PNVC) project lead and system engineer, this PE funds system engineering, planning, development, integration, and testing of new baseband (cryptographic and voice encoder/vocoder) equipment needed to provide survivable, near toll-quality voice conferencing capability for the President, Secretary of Defense, Chairman, Joint Chiefs of Staff, and other national/military leaders. This project includes the critical and essential engineering required to develop new vocoder and cryptographic equipment by taking advantage of ongoing RDT&E efforts by another Defense component. These baseband devices, referred to as the Baseband Interface Group (BIG), implement new technology capabilities such as multi-stream cryptography/vocoding and information technology capabilities such as baseband Ethernet interfaces supporting baseband Internet Protocol (IP) addressing. This project implements Joint Staff requirements for Advanced Extremely High Frequency (AEHF) voice conferencing in synchronization with the AEHF terminal fielding schedules.

B. Accomplishments/Planned Program:

	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	0.000	0.000	1 <u>5.00</u> 0	3.000

FY2006/07 saw the completion of the PNVC Baseband Interface Group (BIG) Design Specification. FY2005 RDT&E dollars were used to complete this effort. The primary effort in FY 2008 is to place on contract the two-year NEADN Baseband Interface Group (vocoder/crypto) development effort, to continue engineering and technical analysis to ensure terminal, baseband, and satellite synchronization, and to conduct a refresh of the BIG (crypto/vocoder) technical specifications to meet the goal of beginning production at the start of FY 2010. In FY 2008, \$13.8M will be used for the BIG development effort requiring approximately 18 months (65,800 man-hours) of engineering and technical efforts to produce eight Engineering Development Models(EDM). This estimate of cost and schedule is based on other similar NSA vocoder/crypto development efforts. In FY 2009 the NEADN BIG equipment security and airworthiness certifications effort will commence. NEADN production, integration and installation (to be funded by the Services), and system testing are scheduled to start in FY 2010 and to be completed in conjunction with AEHF terminal fielding schedules.

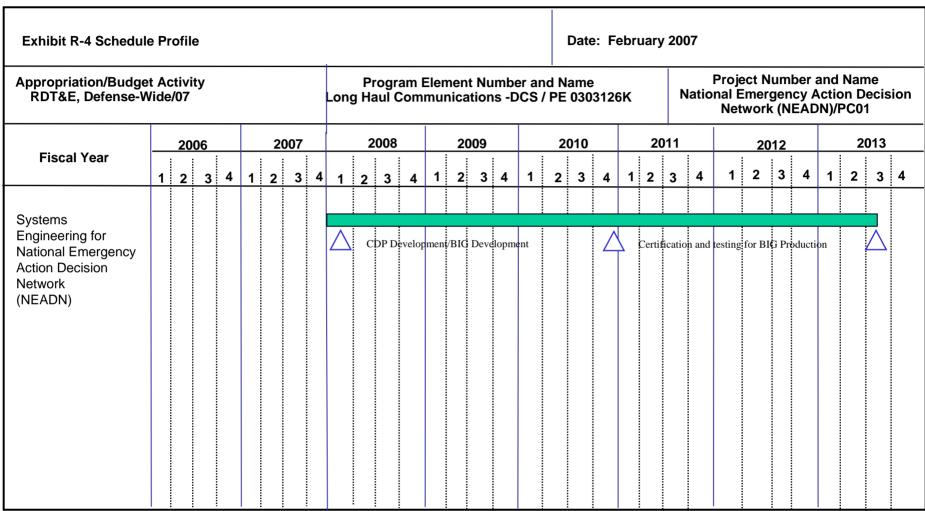
Exhibit R-2a, RDT&E Project Justificat		DAT	E: Februa:	ry 2007					
APPROPRIATION/BUDGET ACTIVITY	I	PROGRAM ELEMENT				PROJECT NAME AND NUMBER			
RDT&E, Defense-Wide/07	I	Long Haul Com	munication	s - DCS / F	E Nation	National Emergency Action Decision			
030312					Netwo	ck (NEADN)			
Cost (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
National Emergency Action Decision	0.000	0.000	15.000	3.000	2.000	2.000	1.000	1.000	
Network (NEADN) / PC01									

C. Other Program Funding Summary:

	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Procurement, DW:	0.000	0.000	3.000	1.000	1.000	0.000	0.000	0.000

- D. <u>Acquisition Strategy</u>: NSA, as the NEADN acquisition agent for DISA, intends to award a Firm Fixed Price (FFP) contract for the development and certification of the new Baseband Interface Group (BIG) equipment (vocoder/crypto). In addition, an Indefinite Delivery, Indefinite Quantity (IDIQ) contractual vehicle will be established for BIG production in FY 2010 for procurement of BIG units by the Services and Agencies beginning in FY 2010. Although some limited in-house government capability exists, the expertise necessary to fulfill the mission and responsibilities of the NEADN does not exist. Engineering support services for the NEADN is provided by contract and FFRDC support. Full and open competition is used for the acquisition of support through existing DISA contracts.
- E. <u>Performance Metrics</u>: NEADN Project metrics track the development of various documents: Project Management Plan (PMP), Concept of Operations (CONOPS), Test and Evaluation Master Plan (TEMP), and other documents needed to manage the project. Data metrics based on cost, schedule, and performance will be used for the NEADN BIG development and certification efforts. The Engineering Development Models from the BIG development effort will be evaluated during Developmental Testing and Evaluation (DT&E) and security certification for performance compliance. System level testing will be conducted to validate that the performance meets the requirements of the Nuclear Technical Performance Criteria (CJCSI-6811.01A). The Project also uses the funding obligation rate (planned vs. actual) and financial reporting requirements as metrics throughout the life cycle of the project.

Exhibit R-3 Cost A	Analysis				DAT	E: Febru	ary 20	2007				
APPROPRIATION/BUDG			PROGRAM EL							ND NUMBER		
RDT&E, Defense-Wid	de/07		Long Haul (Communica	tions -	DCS / PI		National Emergency Action Decision Network (NEADN)/PC01				sion
			0303126K				N	Jetwork	(NEADN)/PC01		
Cost Category	Contract Method & Type	Perform Activity Location	y & PYs	FY07	FY07 Award <u>Date</u>	FY08 <u>Cost</u>	FY08 Award <u>Date</u>	FY09 Cost	FY09 Award <u>Date</u>	Cost To	Total <u>Cost</u>	Target Value of Contract
Systems Engineering and Baseband Interface Group (BIG) and Development	MIPR	NSA	0.000	0.000	N/A	13.900	12/08	1.900	12/09	Contg	15.800	
Engineering and Technical Support	FFRDC	Aerospace	0.000	0.000	N/A	0.700	12/08	0.700	12/09	Contg	2.870	
Engineering and Technical Support	CPFF	ВАН	0.000	0.000	N/A	0.400	12/08	0.400	12/09	Contg	5.330	



Note: NRE = Non Recurring Engineering

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Exhibit R-4a Schedule Detail			DATE:	February 2	007			
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07	PROGRAM ELEM Long Haul Con		· ·		PROJEC Nation	T NAME AND lal Emergen k (NEADN)/	cy Action I	Decision
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
Systems Engineering and Baseband Interface Group (BIG) and Development			1-40	1-40				
Engineering and Technical Support	=		1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q

Exhibit R-2, RDT&E Budget Item Just	ibit R-2, RDT&E Budget Item Justification			TE: Februa:	ry 2007			
APPROPRIATION/BUDGET ACTIVITY R-1 ITEM NOMENCLATURE								
RDT&E, Defense-Wide/07 Minimum Essential Eme				cy Communica	tions Netwo	rk (MEECN) /	PE 0303131	K
Cost (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Total Program Element	8.056	7.662	9.482	9.749	10.106	10.420	10.420	10.420
Strategic C3 Support / T70	3.277	2.672	3.462	3.723	3.885	4.001	4.001	4.001
Special Projects / T64	4.779	4.990	6.020	6.026	6.221	6.419	6.419	6.419

A. Mission Description and Budget Item Justification:

This program element (PE) supports DISA's role as the Nuclear Command, Control, and Communications (NC3) system engineer in five major areas: (1) Plans and Procedures; (2) Systems Analysis; (3) Operational Assessments; (4) Systems Engineering; and (5) Development of Concepts of Operation and Architectures. The NC3 System is composed of C3 assets that provide connectivity from the President and the Secretary of Defense through the National Military Command System (NMCS) to nuclear execution forces integral to fighting a "homeland-to-homeland," as well as theater, nuclear war. This MEECN includes the Emergency Action Message (EAM) dissemination systems and those systems used for integrated Tactical Warning/Attack Assessment (TW/AA), Presidential decision making conferencing, force report back, re-targeting, force management, and requests for permission to use nuclear weapons. Supporting efforts assure positive control of nuclear forces and connectivity between the Secretary of Defense and strategic and theater forces. Efforts assure an informed decision making linkage between the President, the Secretary of Defense, and the Commanders of the Unified and Specified Commands. Additionally, through this program element, DISA provides direct and specialized support to ASD(NII) and the Joint Staff (JS) and recommends support or non-support for NC3 programs as well as fail-safe procedures and risk reduction actions. This program element is under Budget Activity 07 because it involves efforts supporting operational systems development. The increase is in support of Senior Leadership Communication research and development and military exercises.

B. Program Change Summary:

	<u>FY 06</u>	FY 07	<u>FY 08</u>	FY 09
Previous President's Budget	7.332	7.691	7.862	8.045
Current Submission	8.056	7.662	9.482	9.749
Total Adjustments	0.724	-0.029	1.620	1.704

Change Summary Explanation:

FY 2006 increase is due to revised financial guidance

FY 2007 decrease is due to revised financial guidance.

FY 2008 and FY 2009 increases reflect increased system exercises.

Exhibit R-2a, RDT&E Project Justifica	hibit R-2a, RDT&E Project Justification				ry 2007			
APPROPRIATION/BUDGET ACTIVITY PROGRAM ELEMENT						PROJECT NAME	AND NUMBER	
	Minimum Esse Network (MEI				ions	Strategic C3	Support/T70	
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Strategic C3 Support/T70	3.277	2.672	3.870	4.149	4.312	4.426	4.426	4.426

A. Mission Description and Budget Item Justification: This project has four elements: (1) Systems Analysis; (2) Operational Assessments; (3) Plans and Procedures; and (4) Systems Engineering. Together, these elements perform the mission of the Nuclear Command Control and Communications (C3) Systems Engineer and provide Executive Leadership and Nuclear C3 support for the Office of the Assistant Secretary of Defense (OASD), Networks and Information Integration (NII)) and the Joint Staff. Systems Analysis supports long range planning and vulnerability assessments to ensure the Nuclear C3 System is adequate under all conditions of stress or war. This element analyzes the Nuclear Command and Control System (NCCS) (i.e., strengths and weaknesses) and recommends investment strategies to evolve the NCCS to achieve desired capabilities. Nuclear threats to include terrorist activities, both regional and global, are analyzed in special reports for ASD(NII) and the Joint Staff. Operational Assessments of fielded systems and weapon platforms are the sole means for positive verification of communications plans and procedures, operation orders, training, equipment, and end-to-end system configuration. Assessments include strategic and theatre and national level C3 interfaces into the Nuclear C3 System. DISA conducts assessments in an operational setting with the Joint Staff, Combatant Commanders, and nuclear forces worldwide. Plans and procedures support the Chairman, Joint Chiefs of Staff and the nuclear C3 warfighting community during times of stress and national emergency, up to and including nuclear war. The Nuclear C3 System is composed of C3 assets that provide connectivity from the President and the Secretary of Defense through the National Military Command System (NMCS) to nuclear execution forces integral to fighting a "homeland-to-homeland," as well as theater, nuclear war. It includes the Emergency Action Message (EAM) dissemination systems and those systems used for Integrated Tactical Warning/Attack Assessment (TW/AA), Presidential decision making conferencing, force report back, re-targeting, force management, and requests for permission to use nuclear weapons. Supporting efforts assure positive control of nuclear forces and connectivity between the Secretary of Defense and strategic and theater forces. Systems engineering provides the Senior Leaders Communications System with technical and management advice, planning and engineering support, and Test & Evaluation (T&E). Leading Edge C4I technology is assessed for all communication platforms supporting Executive Travelers and Senior Leaders to include the interoperability of hardware and operational procedures. These elements support the President's and other DoD command centers and aircraft, e.g., Air Force One and the National Airborne Operations Center (NAOC).

B. Accomplishments/Planned Program:

	FY 2006	FY 2007	FY 2008	FY 2009	
Subtotal Cost	0.562	0.620	0.664	.600	

Exhibit R-2a, RDT&E Project Justific	ation		Dat	e: Februar	ry 2007			
APPROPRIATION/BUDGET ACTIVITY	PROGRAM ELE	MENT				PROJECT NAME A	AND NUMBER	
RDT&E, Defense-Wide/07	Minimum Ess Network (ME				lons	Strategic C3 S	Support/T70	
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Strategic C3 Support/T70	3.277	2.672	3.870	4.149	4.312	4.426	4.426	4.426

Provide NC3 Review Report and Systems Analysis Documents.

Update Emergency Conferencing and Action Plans and Procedures.

Subtotal Cost $\frac{\text{FY } 2000}{2.029}$

FY 2007 1 349 FY 2008 2 050 FY 2009

Plan and Conduct Strategic and Theater Operational Assessments.

Plan and Conduct Staff Assistance Visits for US Strategic Command, US Northern Command, US Pacific Command and JS Battle Staffs.

Participate in military exercises.

Subtotal Cost .686

<u>FY 2</u>

FY 2008 .748 FY 2009 1.348

Provide Aircraft and Command Center Engineering.

C. Other Program Funding Summary:

D. <u>Acquisition Strategy</u>:

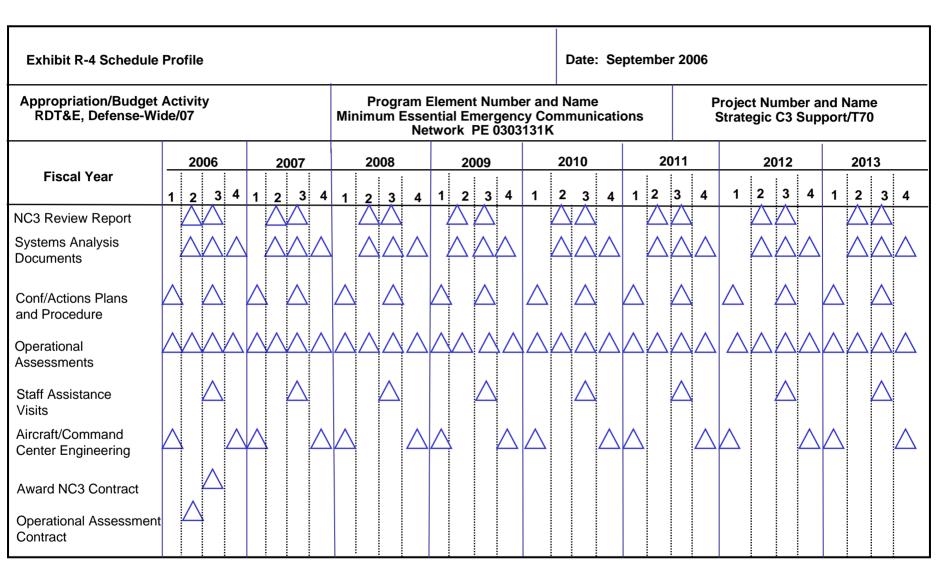
Full and open competition resulted in contract vehicles with Raytheon, Arlington, VA; Science Applications International Corporation (SAIC), McLean, VA; and Booz Allen & Hamilton (BAH), Falls Church, VA.

Exhibit R-2a, RDT&E Project Justifica	tion		Date	e: Februar	ry 2007			
APPROPRIATION/BUDGET ACTIVITY	PROGRAM ELEI	MENT				PROJECT NAME	AND NUMBER	
RDT&E, Defense-Wide/07	Minimum Esse Network (ME)				ons	Strategic C3	Support/T70	
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Strategic C3 Support/T70	3.277	2.672	3.870	4.149	4.312	4.426	4.426	4.426

E. Performance Metrics:

Performance of the Nuclear C3 System is directly measured by the operational assessments funded by this program element. These periodic assessments evaluate the connectivity used for the five functions of Nuclear Command and Control: Situation Monitoring, Planning, Decision Making, Force Execution, and Force Management. Assessment results are used by the Joint Staff to direct changes in system engineering and integration, programmatic execution, and training.

Exhibit R-3 Co	st Analysi	.s				DATE	: Febr	uary 2	007				
APPROPRIATION/	BUDGET ACT	IVITY	PROGR	AM ELEM	ENT			PRO	OJECT N	AME AND	NUMBER		
RDT&E, Defense	-Wide/07		Minim	um Esse	ntial E	mergency	7	St	rategic	C3 Supp	ort / T70		
			Commu	nicatio	ns Netw	ork/PE (303131F	ζ					
			•										
Cost Category	Contract Method & <u>Type</u>	Performing Acti Location		Total PYs <u>Cost</u>	FY 07 Cost	FY 07 Award <u>Date</u>	FY 08 <u>Cost</u>	FY 08 Award <u>Date</u>	FY 09 Cost	FY 09 Award <u>Date</u>	Cost to Complete	Total <u>Cost</u>	Target Value of Contract
Systems Engineering	CPAF	Science Applica International Corporation McL		1.848	.620	06/07	.664	6/08			Cont	Cont	3.132
	CPAF	Raytheon Company Arlington, VA	<i>?</i>	4.525	1.349	02/07	2.050	2/08			Cont	Cont	7.924
	CPFF	Booz Allen & Har Falls Church, V.		1.974	.703	10/06	1.074	10/07			Cont	Cont	3.425
		Total		8.347	2.672		3.870						14.481



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Exhibit R-4a Schedule Det	ail			DATE: Sep	tember 200	6		
APPROPRIATION/BUDGET ACTI RDT&E, Defense-Wide/07		PROGRAM ELEMEN Minimum Essent Network (MEECN	ial Emerger		tions	PROJECT NAME Strategic C3		70
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
NC3 Review Report	2-3Q	2-3Q	2-3Q	2-3Q	2-3Q	2-3Q	2-3Q	2-3Q
Systems Analysis Documents	2-4Q	2-4Q	2-4Q	2-4Q	2-40	2-40	2-4Q	2-4Q
Plans and Procedures	1,3Q	1,3Q	1,3Q	1,3Q	1,3Q	1,3Q	1,3Q	1,3Q
Operational Assessment	1-4Q	1-4Q	1-4Q	1-40	1-4Q	1-40	1-4Q	1-40
Staff Assistance Visits	3Q	3Q	3Q	3Q	3Q	3Q	3Q	3Q
Aircraft/Command Center Engineering	1,4Q	1,4Q	1,4Q	1,4Q	1,4Q	1,4Q	1,4Q	1,4Q
Award NC3 Contract	3Q							
Operational Assessment Contract	2Q							

Exhibit R-2a, RDT&E Project Justification			D	ATE: Februar	ry 2007			
APPROPRIATION/BUDGET ACTIVITY	PROG	RAM ELEM	MENT		PROJEC	CT NAME AND	NUMBER	
RDT&E, Defense-Wide/07		unicatio	ential Eme ons Netwo	ergency rk (MEECN)/PE	_	al Projects	/ T64	
Cost (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Project Cost	4.779	4.990	5.612	5.600	5.794	5.994	5.994	5.994

- A. <u>Mission Description & Budget Item Justification</u>: The mission is performing classified work. All aspects of this project are classified and require special access. Detailed information on this project is not contained in this document, but is available to individuals having special access to program details.
- B. Other Program Funding Summary: N/A
- C. Acquisition Strategy: Information requires special access.

RDT&E, Defense-Wide/07 Minimum Essential Emergency Communications Network / PE 0303131K Cost Category Cost Category Method & Activity & PYS Cost Type Location Cost Category Systems Engineering And Integration CPAF Performing MIPR Activities Minimum Essential Emergency Communications Network / PE 0303131K FY07 FY08 Award FY09 Award FY09 Award FY09 Award Cost To Total Cost Date Cost Date Cost Date Cost Date Cost Date Cost Date Cost Cost Cost Date Cost Date Cost Date Complete Cost Cost Cost Date Cost Date Cost Date Complete Cost Cost Date Date Date Date Date Date Date Dat				ME AND NU	ECT NAI	PROJ	: Febr	<u>'</u>		RAM ELEMEN			APPROPRIATION/BUDGI
Cost Category Method & Activity & PYs Cost Fy07 Award Fy08 Award Fy09 Award Cost To Total Type Location Systems Engineering And Integration SS/C CPAF Multiple Performing PYs Cost Cost Date Cost Cost Date Cost Cost Date Cost Cost Cost Date Cost Date Cost Cost Date Cost Cost Date Cost Cost Date Date Date Date Date Date Date Dat			54 	ojects/T6	cial Pro		303131K					2/07	RDT&E, Defense-Wide
and Integration CPAF Performing	Target Value o Contrac			Award		Award		Award			Activity &	Method &	Cost Category
	N/A	Contg	Contg	Various	5.600	Various	5.612	Various	4.990	20.118	Performing	CPAF	

xhibit R-4 Schedule	7 F I	OIII	-																Date	· ·		Jai y										
propriation/Budge RDT&E, Defense-W	t Ac /ide	tivi /07	ty						М	P inim	rogi ium	ram Ess No	Elei enti etwo	men ial E ork	t Nu mei PE (ımb ger 030:	er ar ncy C 31311	nd N Somi K	ame mun	icati	ions	3		F	Proje Sp	ct No ecia	umb I Pr	oer a ojec	nd I ts/T	Nam 64	1e	
		20	06			2	007			2	2008			20	09			20	10			20	11			20)12			2	013	
Fiscal Year	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	1	2	3	2
All aspects of this project are classified and requispecial access.	ire																															

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	a Schedule Det				E: February 20			
PROPRIATIO	N/BUDGET ACTI	VITY	PROGRAM ELEME	ENT			PROJECT NAME AN	ID NUMBER
T&E, Defer	nse-Wide/07		Minimum Esser	ntial Emergenc	y Communication	ons	Special Project	:s/T64
			Network (MEEC	CN) PE 0303131	K			
chedule rofile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
aspects	of this proje	ct are class	sified and requ	ire special a	ccess.			
_			_	_				

Exhibit R-2, RDT&E Project Just	ification			DATE: Februar	ry 2007			
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOME	NCLATURE			
RDT&E, Defense-Wide/07				Information Sy	ystems Secu	rity Program	(ISSP) PE 0	303140K
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Information Systems Security	0.000	0.000	2.300	0.000	0.000	0.000	0.000	0.000
Program / IA3								

A. <u>Mission Description and Budget Item Justification</u>: The DISA Information Systems Security Program (ISSP) is focused on designing and deploying proactive protections, deploying attack detection, and on performing Information Assurance (IA) operations to ensure that adequate security is provided for information collected, processed, transmitted, stored, or disseminated on the Global Information Grid (GIG). These efforts include tasks associated with affording protection to telecommunications, information systems, and information technology that process sensitive and classified data as well as efforts to ensure the confidentiality, authenticity, integrity, and availability of the information and the systems. The information provided here demonstrates how DISA supports the DoD IA Strategic Plan.

DISA defends systems and networks to ensure that no access is uncontrolled and all systems and networks are capable of self-defense. This is accomplished by "building in" technologies that recognize, react, and respond to threats, vulnerabilities, and deficiencies. The RDT&E portion of DISA's ISSP budget will be used to develop detailed architectures and technology insertion strategies for securing the perimeter of our networks. In FY 2008 to support the implementation of additional security features at the perimeter, there will be several efforts to plan and develop solutions to provide enhanced critical mission capabilities. These efforts fall under Budget Activity 7 due to operational system development efforts to upgrade systems that have been fielded and planned for production funding in the current or subsequent fiscal year. Beginning in FY08, funds were appropriated to ISSP for DMZ and NIPRNet Gateway for this effort.

B. Accomplishments/Planned Program:

Systems Engineering & Integration	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	0.000	0.000	2.300	0.000

RDT&E dollars support basic Systems Engineering activities such as developing architecture documents evaluating integration of new technologies to address the IA ICD Operational and Architecture gaps at the NIPRNet and Internet Gateways and DMZs. DISA is working closely with the Joint Staff, Services, Agencies, and COCOMs as well as with industry, to ensure implementability of these architectures and technologies and proper implementation of these enterprise wide acquisitions through leveraging emerging commercial capabilities.

Exhibit R-2, RDT&E Project Just	ification			DATE: Februar	cy 2007			
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOME	ICLATURE			
RDT&E, Defense-Wide/07				Information Sy	ystems Secu	rity Program	(ISSP) PE 0	303140K
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Information Systems Security	0.000	0.000	2.300	0.000	0.000	0.000	0.000	0.000
Program / IA3								

B. Program Change Summary:

	FY06	FY07	FY08	FY09
Previous President's Budget	0.000	0.000	2.300	0.000
Current Submission	0.000	0.000	2.300	0.000
Total Adjustments	0.000	0.000	0.000	0.000

Change Summary Explanation: N/A

C. Other Program Funding Summary:

	FY06	FY 07	FY 08	FY 09	FY 10	FY 11	FY 12	FY13
Operations and Maintenance:	185. 006	$\overline{181.0}61$	$\overline{182.224}$	249.4 31	240.455	220.788	211.598	225.592
Procurement:	21.915	34.607	45.564	59.871	50.661	40.968	40.676	36.976

D. Acquisition Strategy:

IT integration companies with IA as a core competency will assist DoD in addressing the challenge of securing the perimeter of DoD's networks while keeping in step with COTS evolution.

The overall Perimeter Defense strategy is based upon the fundamental premise that COTS products will continue their evolution through the constant refresh of commercial technology. All contracts will be competitively awarded and provide support in the following areas: identifying IA architecture gaps, technology evaluations, technology insertion strategies, program planning and control; analytic services/system integration; tactical deployment; operations; and configuration management.

Exhibit R-2, RDT&E Project Just	ification			DATE: Februar	ry 2007							
APPROPRIATION/BUDGET ACTIVITY			R-1 ITEM NOME	ICLATURE								
RDT&E, Defense-Wide/07			Information Systems Security Program (ISSP) PE 0303140F									
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13				
Information Systems Security	2.300	0.000	0.000	0.000	0.000	0.000						
Program / IA3												

E. Performance Metrics:

Assist in making operational assessments of the Gateways/DMZs security strategies to improve operational readiness.

Exhibit R-3 Cost Analysis				DAT	E: Fel	oruar	y 2007					
APPROPRIATION/BUDGET ACTION RDT&E, Defense-Wide/07	VITY		LEMENT on System ISSP)/ PE		-		PROJECT N Informati				rogram	/IA3
Cost Category	Contract Method & <u>Type</u>	Performing Activity & Location	Total PYs <u>Cost</u>	FY 06 Cost	FY 06 Award <u>Date</u>	FY 07 Cost	FY 07 7 Award <u>Date</u>	FY 08 <u>Cost</u>	FY 08 Award <u>Date</u>	Cost to Complete	Total <u>Cost</u>	Target Value of Contract
Product Development Systems Engineering and Integration for De-Militarized Zones (DMZs)	TBD	TBD	0.000	0.000	N/A	0.000) N/A	1.300	N/A	0.000	1.300	1.300
Systems Engineering and Integration for Internet/NIPRNet Gateways	TBD	TBD	0.000	0.000	N/A	0.000) N/A	1.000	N/A	0.000	1.000	1.000
Subtotal Product Development			0.000	0.000		0.000)	2.300		0.000	2.300	2.300
Total			0.000	0.000		0.000		2.300		0.000	2.300	2.300

APPROPRIATION/BURDT&E, Defense-Wid	_		ACT	IVIT	Υ				Inf	forn	am I natio	on S	Syste	t Nu	ımb Sec	er a urity	nd N Pro	ame	m (IS	SSP)			Proje Proje	ect N	luml SSP/	ber a	and	Nan	ne		
Fiscal Year		20	07			20	800			2	009			20	10			20)11			20)12			20	013					
	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	1	2	3	4
DMZ Products Architecture, Tech Eval & Tech Insertion Gateway Products Architecture, Tech Eval & Tech Insertion																																

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Exhibit R-4a Schedule Detail			DATE: Fe	bruary 200	07			
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07	PROGRAM EL Informatio 0303140K		ecurity Pr	ogram (ISS	P) PE	PROJECT N	IAME AND NU	MBER
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
De-Militarized Zones Architecture			1Q - 3Q					
De-Militarized Zones Tech Eval & Tech Insertion	1		2Q - 4Q					
NIPRNET/Internet Gateway Architecture	2		1Q - 3Q					
NIPRNET/Internet Gateway Eval & Tech Insertion			2Q - 4Q					

Exhibit R-2, RDT&E Budget Item Justific	cation			DATE: Februar	ry 2007								
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMEN	ICLATURE								
RDT&E, Defense-Wide/07				DISA Mission Support Operations/PE 0303148K									
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13					
DISA Standard Finance and Accounting	1.219	0	1.174	1.219	0	0	0						
System/DE01													

A. Mission Description and Budget Item Justification:

Office of the Chief Financial Executive (CFE) activities in the Mission Support area focus on the legislative mandates contained in the Chief Financial Officer (CFO) Act, Financial Managers Financial Integrity Act (FMFIA), and the Government Performance and Results Act (GPRA) as well as the Budget and Performance Integration goal of the President's Management Agenda (PMA). The Directorate provides financial services support and financial automation support to the Agency as well as annual Agency-wide financial statements. In addition, it conducts economic analyses, cost estimating and program and organizational assessments. A major challenge is to provide accurate, reliable, and timely financial information in a cost-effective way to support planning, engineering, acquiring, and fielding Global Net-centric solutions and supporting the Global Information Grid.

Direction from the DoD Comptroller requires DISA to implement a new accounting system in order to meet the Presidential Management Agenda for Financial Management Improvements that specifically requires: 1) financial management systems meet federal financial management system requirements and applicable federal accounting and transaction standards; 2) accurate and timely financial information; 3) integrated financial and performance management systems supporting day-to-day operations; and 4) unqualified and timely audit opinion on the financial statements; no material internal control weaknesses reported by the auditors. In addition, the OMB/DoD mandated audit of DISA's financial statements have identified material weaknesses in DISA's accounting of its resources. Some of these weaknesses can only be fixed with a new accounting system. This program element is under Budget Activity 7 because it supports operational systems development.

Accomplishments/Planned Program:

Accounting System	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	3.195	$\overline{1.219}$	0.000	1.174

RDT&E dollars are required to conduct testing; certification; interface development; and system upgrades of the DISA Standard Finance and Accounting System (DSFAS). DSFAS is a Commercial-Off-the-Shelf (COTS) software that will replace DISA's existing accounting systems: Washington Headquarters Services Allotment Accounting System (WAAS), Financial Accounting Management Information System - Telecommunication Services and Enterprise Acquisition Services (FAMIS-TSEAS). DSFAS will comply with the DoD Enterprise Architecture and will be Joint Financial Management Improvement Plan (JFMIP) certified.

Exhibit R-2, RDT&E Budget Item Justifi	.cation		D	ATE: Februar	cy 2007			
APPROPRIATION/BUDGET ACTIVITY			R	-1 ITEM NOMEN	ICLATURE			
RDT&E, Defense-Wide/07			D	ISA Mission S	Support Opera	tions/PE 0	303148K	
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
DISA Standard Finance and Accounting	3.195	1.219	0	1.174	1.219	0	0	0
System/DE01								
Congressional Add	FY 06		FY 07 FY 08 FY09					
Subtotal Cost	6.000		0.	000	0.0	000	0.0	00

Additional dollars received in support of the Critical Infrastructure Test Range at the Idaho National Laboratory. This is a congressional add that will be executed by the Department of Energy.

B. Program Change Summary:

	FY 06	FY 07	FY 08	FY 09
Previous President's	9.291	1.224	0.000	$\overline{1.174}$
Budget				
Current Submission	3.195	1.219	0.000	1.174
Total Adjustments	-6.096	-0.005	0.000	0.000

Change Summary Explanation: FY 2006 change is due to the Congressional Add for the Critical Infrastructure Test Range that will be executed by the Department of Energy, as well as undistributed Congressional reductions to the Defense-Wide RDT&E appropriation. FY2007 change is due to revised fiscal guidance.

C. Other Program Funding Summary:

	FY 06	FY 07	FY 08	FY 09	FY 10	FY 11	FY 12	<u>FY 13</u>	<u>To</u> Complete	Total Cost
Procurement, DW	0	0.812	0	0	0	0	0	0	.812	.812
O&M, DW	25.731	30.245	12.394	15.012	15.118	13.858	12.437	12.384	Contg	Contg

D. <u>Acquisition Strategy</u>: The overall strategy is based upon the fundamental premise that COTS products will continue their evolution through the constant refresh of commercial technology. To maintain an interoperable system, DSFAS will use a single contractor as an overall integrator. Additionally, DSFAS will utilize other contract vehicles within DISA to acquire additional equipment and services to support the implementation of DSFAS.

Exhibit R-2, RDT&E Budget Item Justific	cation			DATE: Februar	ry 2007							
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMEN	ICLATURE							
RDT&E, Defense-Wide/07				DISA Mission Support Operations/PE 0303148K								
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13				
DISA Standard Finance and Accounting	1.219	0	1.174	1.219	0	0	0					
System/DE01												

E. <u>Performance Metrics</u>: DSFAS will be measured by how successfully it reduces the number of financial audit findings with the end result of obtaining a clean audit opinion. DSFAS will also be measured by how well it supports the DISA Balanced Scorecard Strategy to provide greater transparency, quality and timeliness of financial information.

Exhibit R-3 Cost Analysi	s			DA:	re: Fel	brua	ary 2007					
APPROPRIATION/BUDGET ACT	IVITY	PROGRAM ELE	MENT				PROJECT NAM	ME AND	NUMBER	1		
RDT&E, Defense-Wide/07		DISA Mission 0303148K	n Support	Operat	tions/ I	PE	DISA Standa System/DE01		ance a	nd Accour	ıting	
Cost Category	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 07 Cost	FY 07 Award <u>Date</u>	FY Cos		FY 09 Cost	FY 09 Award <u>Date</u>	Cost to Complete	Total <u>Cost</u>	Target Value of Contract
Testing	TBD	TBD	0.000	0.600	TBD	0.0	000 TBD	0.800	TBD	Contg	Contg	2.419
Certification	TBD	TBD	0.000	0.200	N/A	0.0	000 N/A	0.000	N/A	Contg	Contg	1.006
Interface Development	TBD	TBD	0.000	0.419	TBD	0.0	000 TBD	0.374	TBD	Contg	Contg	1.208
Congressional Add			6.000	0.000	N/A	0.0	000 N/A	0.000	N/A	0.000	0.000	6.000
TOTAL			6.000	1.219		0.0	000	1.174				

DISA is currently collaborating with BTA-DAI. BTA-DAI is in control of the schedule. They expect the contract to be awarded mid FY07.

APPROPRIATION/BU RDT&E, Defense-Wid			ACT	TIVIT	Υ				Pi Di	rog ISA	ram Mis	Ele ssic	emo on S	ent Sup	Nu opo	mb rt O	er a per	nd N atior	lame ns/Pl	e E 03	0314	18K			DISA Acco								
Fiscal Year		20	006			2	007			20	800				200	09			20	10			20)11			20	12			20)13	
	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	1	2	3	<u></u>
Testing								\wedge	\setminus	<u></u>																							
Certification											^	/																					
nterface Development								^			^	\																					
System Upgrade								_			V	<u> </u>								\wedge	\wedge			Δ	Δ								

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Exhibit R-4a Schedule Detail			DATE:	February	2007			
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07		M ELEMENT	ont Openati	ong / DE O	20214012		NAME AND NU ndard Finan	
RDI&E, Delense-wide/07	DISA MI	lssion Supp	ort Operati	ONS / PE U	303146K		ng System/D	
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
Testing		4Q	1Q - 4Q					
Certification			3Q - 4Q					
Interface Development		4Q	1Q - 4Q					
System Upgrade					3Q - 4Q	3Q - 4Q		

Exhibit R-2, RDT&E Proj	ect Justi	fication	DATE: February 2007									
APPROPRIATION/BUDGET AC	TIVITY		PROGRAM ELEM	ENT		PROJECT NAME AND NUMBER						
RDT&E, Defense-Wide/07			C4I for the N	Warrior/PE 0	303149K	NETWARS (Formerly Technical Integration Services) /E62						
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13				
Project Cost	6.197	6.526	0.000	0.000	0.000	0.000	0.000	0.000				

A. <u>Mission Description and Budget Item Justification</u>: This effort supports the successful deployment of DoD information systems by performing a broad spectrum of activities in support of C4I programs. DISA supports the development of C4I programs and systems through analytical and technical integration activities including application performance assessments; cross-domain network solutions; contingency planning; network capacity planning and diagnostics; system architecture development and evaluation; technical and operational assessment of emerging technologies; and systems-level modeling and simulation. DISA provides systems engineering and technical integration support dedicated to solving problems for, and meeting the unique engineering, integration and analysis needs of its customers (Combatant Commands (COCOMs), Services, Defense Agencies, Office of the Secretary of Defense, and the Joint Staff).

The Network Warfare Simulation (NETWARS) is a state-of-the-art C4 modeling and simulation (M&S) tool that can be used by C4 planners and analysts to: (a) assess the effects of full operational combat traffic loading on current and future communications systems and networks in a joint task force major theater of war scenario, (b) conduct quick turn-around communications planning for contingency operations including small regional conflicts and peacekeeping scenarios, and (c) evaluate the impact of new communications technologies, organizational structures, and operational concepts. NETWARS supports the acquisition process by conducting end-to-end analyses of networks with new C4 systems and C2 applications applied, reducing new system testing costs and risks, and providing empirical support for C4 acquisition decisions. NETWARS also provides C4 measures of performance to the Joint Warfare Simulation (JWARS) tool and fulfills the M&S requirements of the Joint Network Management System (JNMS). Ultimately, NETWARS makes it possible for communications planners and analysts to validate their C4 support plans and assess their ability to execute them, thus enabling the warfighter to achieve network-centric warfare operations.

* Beginning in FY 2007, only the NETWARS part of this project will remain in PE 0303149K. The other portion has been realigned to Modeling and Simulation/Project E65 under PE 0302019K because it directly supports DISA's Engineering and Integration tasks under that program element.

Exhibit R-2, RDT&E Proj	ect Justi	fication		DATE: February 2007									
APPROPRIATION/BUDGET AC	TIVITY		PROGRAM ELEM	ENT		PROJECT NAME AND NUMBER							
RDT&E, Defense-Wide/07			C4I for the	Warrior/PE 0	303149К	NETWARS (Formerly Technical Integration Services) /E62							
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13					
Project Cost	6.197	6.526	0.000	0.000	0.000	0.000	0.000	0.000					

B. Program Change Summary:

Program Change Summary:	<u>FY06</u>	<u>FY07</u>	FY08	FY09
Previous President's Budget	$6.\overline{197}$	6.551	<u>6.65</u> 6	6.775
Current Submission	6.197	6.526	.000	.000
Total Adjustments	0.000	-0.025	-6.656	-6.775

Change Summary Explanation:

FY 2007 change is due to undistributed Congressional reductions to the Defense-Wide RDT&E appropriation. FY 2008 and FY 2009 changes are due to revised fiscal guidance and program realignment to Modeling and Simulation.

C. Accomplishments/Planned Program:

	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	6.197	6.526	0.000	0.000

FY 2006 - Enhance the NETWARS program by establishing communication plans for tactical networks, based on traffic generated by Net-Centric Enterprise Services (NCES) Core Enterprise Services.

FY 2007 - Enhance the NETWARS Program to increase usability for the warfighter through: 1. addition of models of new and emerging communications technology. 2. expansion of the organization library to include new doctrinal structures. 3. inclusion of additional application traffic.

FY 2008 - Realigned to Modeling and Simulation.

FY 2009 - Realigned to Modeling and Simulation.

Exhibit R-2, RDT&E Proj	ect Justi	fication		DATE: Fe	bruary 2007					
APPROPRIATION/BUDGET AC	TIVITY		PROGRAM ELEM	ENT		PROJECT NAME AND NUMBER				
RDT&E, Defense-Wide/07			C4I for the N	Warrior/PE 0	303149К	NETWARS (Formerly Technical Integration Services) /E62				
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13		
Project Cost	6.197	6.526	0.000	0.000	0.000	0.000	0.000	0.000		

C. Other Program Funding Summary: (\$M)

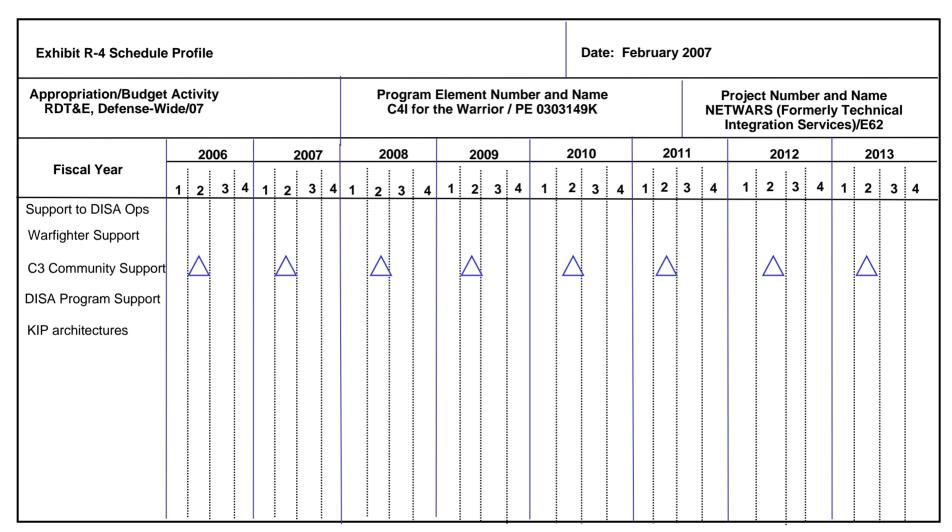
	FY 06	FY 07	FY 08	FY 09	FY 10	FY 11	FY 12	FY 13	To	<u>Total</u>
									<u>Complete</u>	Cost
O&M,	0.327	0.724	0.000	0.000	0.000	0.000	0.000	0.000	0.724	

D. <u>Acquisition Strategy</u>: Uses a number of contractors for modeling support. The level of support includes network model development; software installation and maintenance; software revisions or patches; and software upgrades. These companies are uniquely qualified to provide the necessary level of technical support and services to ensure DISA uses leading edge communication technologies.

E. Performance Metrics:

This project is measured by its impact on the DoD communications planning and investment strategy, with criteria based on the performance of a broad spectrum of technical activities. These include application assessments; contingency planning; network capacity planning and diagnostics; system architecture evaluation; technical and operational assessments of emerging technologies; and systems-level modeling and simulation. In FY 2006 and thereafter, NETWARS will be evaluated based on its ability to provide DoD decision makers with the impact on Net-Centric Enterprise Services prior to conflict.

Exhibit R-3 Cost Analysi	s				DATE:	Februar	ry 2007					
APPROPRIATION/BUDGET ACT	TIVITY	PROGRAM	ELEMENT				PROJEC	T NAME	AND NUM	MBER		
RDT&E, Defense-Wide/07		C4I for	the War	rior/PE	030314	9K	NETWAF	RS (Form	erly Te	echnical 1	Integra	tion
							Servi	ces) /E6	52			
	Contract	Performing	Total		FY 07		FY 08		FY 09			Target
	Method &	Activity &	PYs	FY 07	Award	FY 08	Award	FY 09	Award	Cost to	Total	Value of
Cost Category	Type	Location	Cost	Cost	Date	Cost	Date	Cost	Date	<u>Complete</u>	Cost	Contract
Technical Integration Services System Engineering and Integration	CPFF/Comp	OPNET Tech, Inc. Bethesda, MD	7.389	3.685	01/07	0.000	12/07	0.000	12/08	Contg	Contg	18.274
Com modeling and simulation	FFRDC	RAND Tysons Corner, VA	.555	0.000	N/A	0.000	N/A	0.000	N/A	Contg	.555	.555
	CPFF/Comp	Northrop Grumman Reston, VA	1.750	0.000	N/A	0.000	N/A	0.000	N/A	Contg	1.750	1.750
	CPFF/Comp	SAIC Seven Corners, VA	1.630	0.000	N/A	0.000	N/A	0.000	N/A	Contg	1.630	1.630
	FFRDC	MITRE Seven Corners, VA	.597	0.000	N/A	0.000	N/A	0.000	N/A	Contg	.597	.597
	CPFF/Comp	Verizon/BBNT McLean, Va	.853	0.000	N/A	0.000	N/A	0.000	N/A	Contg	.853	.853
	CPFF/8A	CNS, Inc Springfield, Va	.800	0.000	N/A	0.000	N/A	0.000	N/A	Contg	.800	.800
	CPFF/Comp	Pragmatics, McLean, Va	.733	0.000	N/A	0.000	N/A	0.000	N/A	Contg	.733	.733
	CPFF/Comp	Booz, Allen & Hamilton, McLean, Va	5.922	2.841	12/06	0.000	12/07	0.000	12/08	Contg	Contg	13.897
		Various Contracts	.599	0.000		0.000	12/07	0.000		Contg	.599	N/A
Subtotal Product Development			20.828	6.526		0.000		0.000				
TOTAL			20.828	6.526		0.000		0.000				



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Exhibit R-4a Schedule Detail	DATE:	DATE: February 2007							
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07		OGRAM ELEMENT I for the Wa		303149K	NETWARS	PROJECT NAME AND NUMBER NETWARS (Formerly Technical Integration Services) /E62			
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013	
Support to DISA Ops									
Warfighter Support									
C3 Community Support	2Q	2Q	2Q	2Q	2Q	2Q	2Q	2Q	
DISA Program Support									
KIP architectures									

Exhibit R-2, RDT&E Budget Iter	n Justificat	ion		DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY			R-1 ITEM NON		G	(GGGG) / DE	02021507			
RDT&E, Defense-Wide/07				Global Comma	and and cont	roi System	(GCCS) / PE	U3U315UK		
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13		
Total Program Element	50.882	62.237	47.237	36.613	27.961	9.242	4.800	0.000		
Global Command and Control System- Joint/CC01	48.570	55.237	38.937	28.313	19.661	9.242	4.800	0.000		
Collaborative Force Analysis, Sustainment, and Transportation System (CFAST)/CC02	2.312	7.000	8.300	8.300	8.300	0.000	0.000	0.000		

A. Mission Description and Budget Item Justification: The Global Command and Control System-Joint (GCCS-J) is the Department of Defense joint Command and Control (C2) system of record for achieving full spectrum dominance. GCCS-J is the principal foundation for dominant battlespace awareness, providing an integrated, near real-time picture of the battlespace necessary to conduct joint and multinational operations. It enhances information superiority and supports the operational concepts of full-dimensional protection and precision engagement. GCCS-J provides a robust and seamless C2 capability to the Commander-in-Chief, Secretary of Defense, National Military Command Center, Combatant Commanders, Joint Force Commanders, and Service Component Commanders. Employing the Defense Information Systems Network, GCCS-J offers vital connectivity to the systems the joint warfighter uses to plan, execute, and manage military operations. GCCS-J is a major Information Technology investment and is designated an Acquisition Category IAM Major Automated Information System (MAIS) program. GCCS-J is being implemented in an evolutionary manner through distinct blocks, using spiral development. Each block is self-contained, targets a specific set of Joint Staff validated, prioritized user requirements, and delivers multiple releases of GCCS-J functional capabilities. GCCS-J employs a predominantly open system client/server architecture, which is evolving to a web-based architecture that allows a diverse group of commercial-off-the-shelf (COTS) and government-off-the-shelf (GOTS) software packages to operate at any GCCS-J location. GCCS-J integrates C2 mission applications/capabilities, database, web technology, and office automation tools. It fuses select C2 capabilities into a comprehensive, interoperable system by exchanging imagery, intelligence, status of forces, and planning information. GCCS-J Block V version releases will continue to address high priority requirements, and implement enhancements to fielded capabilities in support of the following mission areas: Intelligence; Situational Awareness; Readiness; and Force Planning, Employment, Protection, and Deployment. The program will continue to develop and refine enhancements to the core planning and assessment tools required by combatant commanders and their subordinate joint task force commanders. Because the GCCS-J program provides capability products that are critical to the direct fulfillment of military, intelligence, and other National Security Systems,

Exhibit R-2, RDT&E Budget Item Justification	DATE: February 2007
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE
RDT&E, Defense-Wide/07	Global Command and Control System (GCCS) / PE 0303150K

the management of the GCCS-J program is an inherently governmental function. The requested RDT&E funding is critical to support DoD Transformation efforts in the area of Strategic and Operational Command and Control. In FY 2006, RDT&E funding financed the development of candidate applications and integration of Advanced Concept Technology Demonstrations (ACTDs) such as Situational Awareness enhancement tools to improve information warfare visualization and display. These tools will directly enhance the capabilities of the Deployable Joint Command and Control (DJC2), a tailorable system addressing Joint Force Commanders' needs for air-, land-, and sea-based operations and the materiel solution for Standing Joint Force Headquarters.

Adaptive Planning (AP) is the DoD's methodology for constructing timely and agile war plans that achieve national security objectives. The Collaborative Force Analysis, Sustainment, and Transportation System (CFAST) is a suite of software tools that provides AP capabilities to include: campaign planning, forecast predictions, information management and rapid execution. As an operational prototype, CFAST will continue to evolve as required to support the Joint Planning and Execution Community (JPEC) and is aimed to reduce the deliberate planning timeline from two years to six months. CFAST facilitates the dynamic preparation of campaign plans for rapid expeditionary environments to meet DoD planning doctrine requirements of ongoing operations such as the Global War on Terrorism (GWOT) and future contingencies. The U.S. Pacific Command (USPACOM), U.S. European Command (USEUCOM), Joint Staff and other Combatant Commands currently utilize CFAST. OSD and Joint Staff use CFAST to model how DoD will respond to current and future conflicts using a variety of current and future forces for all Services as part of their Operational Analysis missions.

CFAST has been identified for migration into the Net Enabled Command Capability (NECC) Program. In preparation for the transition, CFAST must evolve to the Service Oriented Architecture (SOA) while continuing to provide functional enhancements to meet Joint Staff validated and prioritized requirements. These enhancements include user-intuitive capabilities for rapidly determining transportation requirements, performing course of action analyses, and projecting delivery profiles of troops and equipment by air, land, and sea. The improved system will be tailored for use by the Combatant Commanders Component Services, Regional Commanders, Joint Task Forces (JTFs), and the Service staffs as a planning, forecasting, analysis, and execution tool for both deliberate and crisis action planning. The goal end-state is for rapidly produced, near-execution ready campaign plans that provide multiple courses of action. CFAST will provide "living plans" in a net-centric, collaborative, virtual environment, updated routinely to reflect changes in guidance/ strategic environment with automated triggers, linked to real time authoritative sources, that alert planners to key assumptions or planning parameters.

CFAST RDT&E funding has been extended (8.3M annually beginning in FY08 through FY10) to continue development of AP capabilities against Joint Staff requirements and to support the synchronization with NECC.

Exhibit R-2, RDT&E Budget Item Justification	DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY	R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/07	Global Command and Control System (GCCS) / PE 0303150K						

Program Change Summary:	FY06	FY07	FY08	FY09
Previous President's Budget	51.584	59.681	43.972	44.061
Current Submission	50.882	62.237	47.237	36.613
Total Adjustments	0.702	+2.556	+3.265	-7.448

Change Summary Explanation:

В.

FY 2006 change is due the following:

• Revised Fiscal Guidance due to the Defense Wide RDTE Appropriations (0.702)

FY 2007 change is due the following:

- Congressional Section 8106 Economic Assumptions (-\$0.644M) and
- Due to congressional funding of Tactical 3D Common Operational Picture (+\$3.2M)

FY 2008 change is due the following:

- Congressional Adjustment (-\$1.935M)
- Intradepartmental realignment of funding (+\$8.3M) associated with CFAST to extend the development of AP capabilities and to synchronize with NECC
- Intradepartmental realignment of funding (-\$3.1M) from GCCS-J to OSD's Defense Readiness Reporting System (DRRS)

FY 2009 change is due to the following:

- Congressional Adjustment (-\$1,487M)
- Internal realignment of funding by appropriations to begin the migration of the Joint Operations Support Center (JOSC) to the DISA Defense Enterprise Computing Centers (DECC) in order to support net-centric operations (-\$11.061M)
- Intradepartmental realignment of funding (+\$8.3M) associated with CFAST to extend the development of AP capabilities and to synchronize with NECC
- Intradepartmental realignment of funding (-\$3.2M) from GCCS-J to OSD's Defense Readiness Reporting System (DRRS)

Exhibit R-2a, RDT&E Project Justification				DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/07				Global Command and Control System (GCCS) / PE 0303150K						
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13		
Global Command and Control	48.570	55.237	38.937	28.313	19.661	9.242	4.800	0.000		
System- Joint/CC01										

A. Mission Description & Budget Item Justification: The Global Command and Control System-Joint (GCCS-J) is the Department of Defense joint Command and Control (C2) system of record for achieving full spectrum dominance. GCCS-J is the principal foundation for dominant battlespace awareness, providing an integrated, near real-time picture of the battlespace necessary to conduct joint and multinational operations. It enhances information superiority and supports the operational concepts of full-dimensional protection and precision engagement. GCCS-J provides a robust and seamless C2 capability to the Commander-in-Chief, Secretary of Defense, National Military Command Center, Combatant Commanders, Joint Force Commanders, and Service Component Commanders. Employing the Defense Information Systems Network, GCCS-J offers vital connectivity to the systems the joint warfighter uses to plan, execute, and manage military operations. GCCS-J is a major Information Technology investment and is designated an Acquisition Category IAM Major Automated Information System (MAIS) program. GCCS-J is being implemented in an evolutionary manner through distinct blocks, using spiral development. Each block is self-contained, targets a specific set of Joint Staff validated, prioritized user requirements, and delivers multiple releases of GCCS-J functional capabilities. GCCS-J employs a predominantly open system client/server architecture, which is evolving to a web-based architecture that allows a diverse group of commercial-off-the-shelf (COTS) and government-off-the-shelf (GOTS) software packages to operate at any GCCS-J location. GCCS-J integrates C2 mission applications/capabilities, database, web technology, and office automation tools. It fuses select C2 capabilities into a comprehensive, interoperable system by exchanging imagery, intelligence, status of forces, and planning information. GCCS-J Block V version releases will continue to address high priority requirements, and implement enhancements to fielded capabilities in support of the following mission areas: Intelligence; Situational Awareness; Readiness; and Force Planning, Employment, Protection, and Deployment. The program will continue to develop and refine enhancements to the core planning and assessment tools required by combatant commanders and their subordinate joint task force commanders. Because the GCCS-J program provides capability products that are critical to the direct fulfillment of military, intelligence, and other National Security Systems, the management of the GCCS-J program is an inherently governmental function. The requested RDT&E funding is critical to support DoD Transformation efforts in the area of Strategic and Operational Command and Control. In FY 2006, RDT&E funding financed the development of candidate applications and integration of Advanced Concept Technology Demonstrations (ACTDs) such as Situational Awareness enhancement tools to improve information warfare visualization and display. These tools will directly enhance the capabilities of the Deployable Joint Command and Control (DJC2), a tailorable system addressing Joint Force Commanders' needs for air-, land-, and sea-based operations and the materiel solution for Standing Joint Force Headquarters.

Exhibit R-2a, RDT&E Project Just	Di	DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY	R-	R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/07	G.	Global Command and Control System (GCCS) / PE 0303150K						
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Global Command and Control System- Joint/CC01	48.570	55.237	38.93	7 28.313	19.661	9.242	4.800	0.000

B. Accomplishments/Planned Program:

	<u>FY06</u>	<u>FY 07</u>	<u>FY 08</u>	FY 09
Subtotal Cost	42.941	43.355	29.387	20.864

Development and Strategic Planning: GCCS-J is currently executing Block V (FY 2004 through FY 2009). GCCS-J Block V will incorporate new and enhanced capabilities to the v4.0 baseline. By partnering with Global Information Grid (GIG) enterprise services initiatives, GCCS-J will evolve the initial web-based architecture and maximize the use of emerging net-centric/web services. Block V releases of GCCS-J will deliver a secure, collaborative, web-enabled, and tailorable C2 architecture that provides decision superiority and vertical/horizontal interoperability. Major Block V capabilities include:

FY06: Emergent releases (SORTS 4.0.3, JOPES 4.0.3, Global 4.0.2) that included implementation of new functionality, functionality enhancements and architecture and infrastructure enhancements. New functionality included net-centric capabilities such as the JOPES web-based Data Exchange (DEX), JDNETS web service and the Readiness Input Tool and the addition of Joint Blue Force Situational Awareness (JBFSA) capabilities and common operational picture military operations other than war (MOOTW) symbology. Functionality enhancements included the addition of new interfaces such as the Geospatial Information Access & Sharing (GIAS) interface, enhancements to the Theater Ballistic Missile Defense (TBMD) capabilities, upgrades to Force Readiness input tool for the USMC and Force Readiness database for Navy overall C-level reporting. Architecture and infrastructure enhancements included COP client stability and synchronization improvements, migration of the Deployment Visualization Tool (DVT) from a local to an enterprise level capability and core infrastructure commercial off the shelf version updates and security patches.

<u>FY07</u>: In FY07 GCCS-J is focused on the development of GCCS-J 4.1 Spiral Releases (Global 4.1, SORTS 4.1, JOPES 4.1) addressing operational requirements and net-centric architecture implementation. Includes core infrastructure upgrades to operating system, database, and security capabilities, Force Readiness implementation of tiered readiness reporting data (strategic, operational, tactical) and Force Planning web enablement of the JOPES editing Tool (JET) and integration of deliberate and crisis action medical planning tools. COP enhancements add capabilities to process and

Exhibit R-2a, RDT&E Project Just	D	DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY	R	R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/07	G	Global Command and Control System (GCCS) / PE 0303150K						
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Global Command and Control	48.570	55.237 38.9		7 28.313	19.661	9.242	4.800	0.000
System- Joint/CC01								

display moving target indicator data, manage blue force tracks and provide static and dynamic web based access to the common operational picture. Intelligence enhancements include management of multiple data services in the COP and continued integration of intelligence information into the COP through automatic association of multiple data sources.

FY08: In FY08 GCCS-J will be focused on the development of GCCS-J 4.2 Spiral Releases (Global 4.2, SORTS 4.2, JOPES 4.2) addressing operational requirements and net-centric architecture implementation. Includes core infrastructure upgrades to operating system, database, and security capabilities, completing the implementation of unified account management via PKI and single sign on. New functionality includes web based access to Force Planning and Force Readiness data, ability to aggregate readiness data, implementation of dynamic and deployment Force Modules, web enablement of the JOPES Rapid Query Tool (RQT), common operational picture track management capability increase (100K Tracks), Cross Domain Services (CDS), time critical targeting, the ability to process and display Combat Survivor Evader Locator (CSEL) events, and target coordinate production from ISR sensor images. Architectural enhancements include the migration of Adaptive Course of Action (ACOA) from a local to an enterprise level capability and eliminating the need for local replication of readiness data.

As a result of an intradepartmental realignment of funding (\$3.1M) from GCCS-J to OSD's Defense Readiness Reporting System (DRRS), GCCS-J will not develop any new capabilities for SORTS beginning in FY08. GCCS-J will complete testing and fielding SORTS v4.2 in FY08, and provide ongoing sustainment.

FY09: In FY09, GCCS-J will complete the development, testing, and fielding of GCCS-J 4.2 Spiral Releases (Global 4.2) addressing operational requirements and net-centric architecture implementation. Includes core infrastructure upgrades to operating system, database, and security capabilities, completing the implementation of unified account management via PKI and single sign on. New functionality includes web based access to Force Planning and Force Readiness data, ability to aggregate readiness data, implementation of dynamic and deployment Force Modules, web enablement of the JOPES Rapid Query Tool (RQT), common operational picture track management capability increase (100K Tracks), Cross Domain Services (CDS), time critical targeting, the ability to process and display Combat Survivor Evader Locator (CSEL) events, and target coordinate production from ISR sensor images. Architectural enhancements include the migration of Adaptive Course of Action (ACOA) from a local to an enterprise level capability and eliminating the need for local replication of readiness data.

As a result of an intradepartmental realignment of funding (\$3.2M) from GCCS-J to OSD's Defense Readiness Reporting

Exhibit R-2a, RDT&E Project Just	D	DATE: February 2007						
APPROPRIATION/BUDGET ACTIVITY	R	R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/07	G	Global Command and Control System (GCCS) / PE 0303150K						
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Global Command and Control	48.570	55.237	38.93	28.313	19.661	9.242	4.800	0.000
System- Joint/CC01								

System (DRRS), GCCS-J will not develop any new capabilities for SORTS beginning in FY08. GCCS-J will complete testing and fielding SORTS v4.2 in FY08, and provide ongoing sustainment.

Integration and Test (I&T): GCCS-J's incremental, spiral I&T approach permits an earlier start of integration testing since all new segments will not be available at the beginning of integration testing. This risk reduction strategy allows testing in smaller, more manageable increments, while still enforcing a level of Block V testing commensurate to the operational and technical complexity of each release. In accordance with DOT&E guidelines, and determined through an initial risk assessment conducted by the GCCS-J Program Manager Office (PMO), Block V spiral releases will be relatively low risk, with minimal potential to (1) impact other system applications and (2) disrupt the basic system's ability to support the mission.

 $\frac{\text{FY 06}}{\text{Subtotal Cost}} = \frac{\text{FY 06}}{0.000} = \frac{\text{FY 07}}{3.200} = \frac{\text{FY 08}}{0.000} = \frac{\text{FY 09}}{0.000}$

Tactical 3-D Common Operational Picture (T3DCOP) - The T3DCOP 3D display provides a complete air, ground, and sea picture in a situational awareness environment that can enhance the warfighters' understanding of the COP. This C4ISR transformational enhancement will provide immediate benefit to the warfighter, combining intuitive visualization and powerful functionality for enhanced situational awareness. In real-time operations, in playback for shift changeover, and in briefing material preparation, incorporation of this mature commercial technology will have a positive impact from the watch station, throughout the command chain.

C. Other Program Funding Summary:

 FY 06
 FY 07
 FY 08
 FY 09
 FY 10
 FY 11
 FY 12
 FY 13
 Complete

 O&M
 86.506
 87.318
 69.078
 79.918
 65.114
 65.021
 64.339
 65.183
 Contg
 Contg

Exhibit R-2a, RDT&E Project Jus	DAT	E: February	2007						
APPROPRIATION/BUDGET ACTIVITY	R-1	ITEM NOMENCL	ATURE						
RDT&E, Defense-Wide/07			Glo	Global Command and Control System (GCCS) / PE 0303150K					
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	
Global Command and Control	48.570	55.237	38.937	28.313	19.661	9.242	4.800	0.000	
System- Joint/CC01									
Procurement 5.403 5.562	10.779	11.060	9.624	5.502	5.694 5.69	94 Contg	Contg	-	

D. <u>Acquisition Strategy</u>: GCCS-J development, integration, and migration efforts are primarily supported through Cost Reimbursable Task Orders (TO) issued under competitively awarded contracts. Use of performance-based contract awards is maximized while use of Time and Material (T&M) contracts is minimized to those providing programmatic support vs. software development, integration, or testing. The GCCS-J Acquisition Strategy is structured to retain contractors capable of satisfying cost, schedule, and performance objectives. PMO contract awards incorporate provisions requiring contractors to establish and manage specific earned value data. The PMO's strategy mitigates risk by requiring monthly Contract Performance Reviews (CPR) and utilizes Award Fee contracts where appropriate to incentivize performance.

E. Performance Metrics:

Capabilities Provided: In August 2005 Joint Staff published the GCCS-J Block V Requirements Identification Document (RID) as the requirements baseline for Block V. Each Block V version release addresses outstanding high priority requirements, while continuing to implement enhancements to fielded capabilities. These enhancements may take the form of modifications to existing GCCS-J mission applications, new candidate solutions provided by executive agents, technical refresh actions to minimize COTS end-of-life issues, and/or interfacing with additional high value data sources.

Cost & Schedule Management: The GCCS-J program does implement/track a tailored subset of earned value concepts that fit within ANSI/EIA Standard 748. Contractors are required to plan, budget, and schedule resources in time-phased "planned value" increments constituting a cost and schedule measurement baseline. This approach encourages contractors to use effective internal cost and schedule management control systems. The PMO evaluates performance by conducting thorough Post-award Contract Reviews (PCRs) and monthly Contract Performance Reviews (CPRs). The GCCS-J Program Manager (PM) also conducts weekly critical path reviews of the GCCS-J release schedules to ensure tasks are on track and to mitigate risk across the entire program.

Exhibit R-3 Cost Analysis DA							DATE: February 2007						
APPROPRIATIO	ON/BUDGET	ACTIVITY	PROGRAM E	LEMENT	'			T NAME AN	D NUMBER				
RDT&E, Defer	nse-Wide/(07	Global Con (GCCS) PE			System	Global	Global Command and Control System-Joint / CC01					
Cost Category	Contract Method & Type	Performing Activity & Location	Total PYs <u>Cost</u>	FY 07	FY 07 Award <u>Date</u>	FY 08 Cost	FY 08 Award <u>Date</u>	FY 09 Cost	FY 09 Award <u>Date</u>	Cost to Complete	Total <u>Cost</u>	Target Value of Contract	
Product Development	CPAF	NGMS Reston, VA	36.401	17.138	May-07	7.998	May-08	6.238	May-09	Contg	Contg	67.775	
Product Development	CPAF	NGMS Reston, VA	23.261	8.316	Feb-07	10.304	Feb-08	5.616	Feb-09	Contg	Contg	47.497	
Product Development	CPAF	AB Floyd Alexandria, VA	10.730	0.000	N/A	0.000	N/A	0.000	N/A	Contg	12.477	10.730	
Produce Development	CPAF	Femme Comp Inc., Chantilly, VA	1.847	3.551	TBD	0.000	TBD	0.000	TBD	Contg	Contg	5.398	
Product Development	CPFF	SAIC Falls Church, VA	5.876	0.000	N/A	0.000	N/A	0.000	N/A	0.000	5.876	5.876	
Product Development	CPFF	SAIC Falls Church, VA	3.892	1.547	Jan 07	1.593	Jan 08	1.243	Jan 09	Contg	Contg	8.275	
Product Development	FFP	Dynamic Systems Los Angeles, CA	1.742	0.542	Feb-07	0.558	Feb-08	0.575	Feb-09	Contg	Contg	3.417	
Product Development	CPFF	Pragmatics McLean, VA	14.358	3.861	Jul-07	2.971	Jul-08	1.925	Jul-09	Contg	Contg	23.115	
Product Development	MIPR	Booz Allen Hamilton McLean, VA	3.394	0.000	N/A	0.000	N/A	0.000	N/A	0.000	3.394	3.394	
Product Development	MIPR	JDISS Suitland, MD	6.039	0.000	N/A	0.000	N/A	0.000	N/A	0.000	10.590	6.039	
Product Development	FFP	NGMS Reston, VA	4.301	0.849	TBD	0.425	TBD	0.213	TBD	Contg	Contg	5.788	
Product Development	FFP	TBD (Source Selection)	0.000	5.028	TBD	2.939	TBD	3.027	TBD	Contg	Contg	10.994	

Exhibit R-3	Cost Anal	ysis			DA'	re: Febru	ary 2007					
APPROPRIATIO	N/BUDGET	ACTIVITY	PROGRAM E	LEMENT	•		PROJEC'	r name an	D NUMBER			
RDT&E, Defer	se-Wide/0	17	Global Cor	mmand and	Control	System	Global	Command a	and Contro	l Syste	m-Joint	/ CC01
			(GCCS) PE	0303150K								
Cost Category	Contract Method & Type	Performing Activity & Location	Total PYs <u>Cost</u>	FY 07 Cost	FY 07 Award Date	FY 08 Cost	FY 08 Award Date	FY 09 Cost	FY09 Award Date	Cost to	Total Cost	Target Value of Contract
	1700	<u>Locacion</u>		<u> </u>	<u>Date</u>	<u> </u>	<u> </u>		<u>Date</u>	COMPICEC	COBC	Concrace
Product Development	MIPR	SPAWAR, Charleston, SC	2.799	0.000	Jun-07	0.000	Jun-08	0.000	Jun-09	Contg	Contg	2.799
Product Development	FFRDC	MITRE, McLean, VA	3.438	1.194	Oct-06	1.230	Oct-07	0.959	Oct-08	Contg	Contg	6.821
Product Development	MISC	MISC	2.126	0.000	N/A	0.000	N/A	0.000	N/A	0.000	2.400	2.126
Product Development	FFP	Joint Info Technology Center Initiative	20.400	0.000	N/A	0.000	N/A	0.000	N/A	0.000	20.400	20.400
Product Development	MIPR	DIA	1.200	1.329	Jan-07	1.369	Jan-08	1.068	Jan-09	Contg	Contg	4.966
Product Development	FFP	Tactical 3-D COP (T3DCOP)	0.000	3.200	TBD	0.000	N/A	0.000	N/A	0.000	3.200	3.200
Test & Evaluation	CPAF	SAIC, Falls Church, VA	15.091	5.416	Feb-07	5.958	Feb-08	4.647	Feb-09	Contg	Contg	31.112
Test & Evaluation	MIPR	JITC, Ft Huachuca, AZ	7.808	2.872	Oct-06	3.159	Oct-07	2.464	Oct-08	Contg	Contg	16.303
Test & Evaluation	MIPR	TBD, Slidell, LA	0.436	0.394	TBD	0.433	TBD	0.338	TBD	Contg	Contg	1.601
Test & Evaluation	MIPR	SSC, San Diego, CA	3.636	0.000	Nov-06	0.000	Nov-07	0.000	Nov-08	Contg	Contg	3.636
Total			168.775	55.237		38.937		28.313				291.262

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Appropriation/Budge RDT&E, Defense-W	t A Vid	e/07	ity ,							Glo	bal	Coi	ogra nma	m E and	and	nent d Co	Nur ntro	nbei ol Sy	and sten	d Na n/PE	me : 030	315	50K	G	loba	Projed Il Col	ct Ni mma	and	er a and	nd i Cor	ntrol/	e CC	01
Fiscal Year		20	06			2	007	7			20	800			20	09			20)10			20)11		2012			2013				
FISCAL TEAL	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	1	2	3	4
Development and	Δ	Δ	\wedge	\triangle			<u>\</u>	\/	Δ	\triangle	Δ	Δ			Δ	\triangle			Δ	\triangle		\triangle	Δ	\triangle			\triangle	<u></u>			\triangle		
Strategic Planning	В	loci	(s l'	V/V	В	loc	ks	IV/	V	E	3loc	k V		E	3loc	k V		E	Bloc	k۷		В	ock	V		BI	ock	V		В	llock	V	
Integration and Testing	Δ	Δ	\wedge	\triangle			\/\	\/	Δ		\triangle	\wedge	Δ			\/\	\triangle		Δ	Δ	\triangle		$^{\wedge}$	\wedge	\triangle	\land	Δ	Δ					
3		loc	ks I	V/V	В	loc	ks	IV/	v	В	locl	κ V		E	Bloc	k V		E	3loc	k V		В	ock	V		В	lock	V		ı	Bloc	k V	

During Block V, GCCS-J will enhance the GCCS-J infrastructure and functional capabilities to support the Department's net-centric vision. GCCS-J will migrate to a more sophisticated "ntier" architecture supporting dynamic infrastructure resources, thin browser-based clients, and net-centric, enterprise services. High priority services for early inclusion are identity management via Public Key Infrastructure (PKI), directory services, portal framework, and publish/subscribe capability. To achieve this GCCS-J will fully implement a new interface capability using XML to provide the flexibility to support independent version changes and improved availability to enterprise data.

Post Block V, GCCS-J will transition to the Net Enabled Command Capability (NECC) Program, in accordance with schedules that will be established in concert with the NECC Program. During the transition period, until all GCCS-J functionality is available in NECC, GCCS-J will be sustained. Sustainment efforts include, but are not limited to, the design and testing of technical changes/software patches to the operational GCCS-J system to address high priority Global System Problem Reports (GSPRs) and Information Assurance Vulnerabilities (Alerts, Bulletins, and Technical Advisories).

Exhibit R-4a Schedule Detail			DATE:	February	2007			
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07			d Control S	System (GCC	S) /	PROJECT NAME AND NUMBER Global Command and Contr System-Joint / CC01		
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
Development and Strategic Planning	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q
Integration and Test	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q

During Block V, GCCS-J will enhance the GCCS-J infrastructure and functional capabilities to support the Department's net-centric vision. GCCS-J will migrate to a more sophisticated "n-tier" architecture supporting dynamic infrastructure resources, thin browser-based clients, and net-centric, enterprise services. High priority services for early inclusion are identity management via Public Key Infrastructure (PKI), directory services, portal framework, and publish/subscribe capability. To achieve this GCCS-J will fully implement a new interface capability using XML to provide the flexibility to support independent version changes and improved availability to enterprise data.

Post Block V, GCCS-J will transition to the Net Enabled Command Capability (NECC) Program, in accordance with schedules that will be established in concert with the NECC Program. During the transition period, until all GCCS-J functionality is available in NECC, GCCS-J will be sustained. Sustainment efforts include, but are not limited to, the design and testing of technical changes/software patches to the operational GCCS-J system to address high priority Global System Problem Reports (GSPRs) and Information Assurance Vulnerabilities (Alerts, Bulletins, and Technical Advisories).

Exhibit R-2a, RDT&E Project Justifi	cation		DATE: Febr	uary	2007				
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT			PROJ	ECT NAME AN	D NUMBER		
RDT&E, Defense-Wide/07	Global C	Command and	d Control Sy	stem	Coll	aborative F	orce Analysi	s, Sustain	nent, and
	/ PE 030)3150K			Tran	sportation	System (CFAS	T)/CC02	
Cost (in millions)	FY06	FY07	FY08	FY	09	FY10	FY11	FY12	FY13
Collaborative Force Analysis,	2.464	7.000	8.300	8.3	300	8.300	0.000	0.000	0.000
Sustainment, and Transportation									
System (CFAST)/CC02									

A. Mission Description and Budget Item Justification:

Adaptive Planning (AP) is the DoD's methodology for constructing timely and agile war plans that achieve national security objectives. The Collaborative Force Analysis, Sustainment, and Transportation System (CFAST) is a suite of software tools that provides AP capabilities to include: campaign planning, forecast predictions, information management and rapid execution. As an operational prototype, CFAST will continue to evolve as required to support the Joint Planning and Execution Community (JPEC) and is aimed to reduce the deliberate planning timeline from two years to six months. CFAST facilitates the dynamic preparation of campaign plans for rapid expeditionary environments to meet DoD planning doctrine requirements of ongoing operations such as the Global War on Terrorism (GWOT) and future contingencies. The U.S. Pacific Command (USPACOM), U.S. European Command (USEUCOM), Joint Staff and other Combatant Commands currently utilize CFAST. OSD and Joint Staff use CFAST to model how DoD will respond to current and future conflicts using a variety of current and future forces for all Services as part of their Operational Analysis missions.

CFAST has been identified for migration into the Net Enabled Command Capability (NECC) Program. In preparation for the transition, CFAST must evolve to the Service Oriented Architecture (SOA) while continuing to provide functional enhancements to meet Joint Staff validated and prioritized requirements. These enhancements include user-intuitive capabilities for rapidly determining transportation requirements, performing course of action analyses, and projecting delivery profiles of troops and equipment by air, land, and sea. The improved system will be tailored for use by the Combatant Commanders Component Services, Regional Commanders, Joint Task Forces (JTFs), and the Service staffs as a planning, forecasting, analysis, and execution tool for both deliberate and crisis action planning. The goal end-state is for rapidly produced, near-execution ready campaign plans that provide multiple courses of action. CFAST will provide "living plans" in a net-centric, collaborative, virtual environment, updated routinely to reflect changes in guidance/ strategic environment with automated triggers, linked to real time authoritative sources, that alert planners to key assumptions or planning parameters.

CFAST RDT&E funding has been extended (8.3M annually beginning in FY08 through FY10) to continue development of AP capabilities against Joint Staff requirements and to support the synchronization with NECC.

Exhibit R-2a, RDT&E Project Justif	ication		DATE: Febr	ruary	2007				
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT			PROJ	ECT NAME AN	D NUMBER		
RDT&E, Defense-Wide/07	Global C	ommand and	d Control S	ystem	Colla	aborative F	orce Analysi	s, Sustain	ment, and
	/ PE 030	3150K			Tran	sportation	System (CFAS	ST)/CC02	
Cost (in millions)	FY06	FY07	FY08	FY	09	FY10	FY11	FY12	FY13
Collaborative Force Analysis,	2.464	7.000	8.300	8.3	300	8.300	0.000	0.000	0.000
Sustainment, and Transportation									
System (CFAST)/CC02									

B. Accomplishments/Planned Program:

	FY 06	<u>FY 07</u>	FY 08	FY 09
Subtotal Cost	2.176	6.250	7.800	7.800

Development and Strategic Planning: CFAST continues to produce capabilities via spiral development, allowing for the rapid introduction of more sophisticated planning capabilities to include execution planning/re-planning during crisis and execution. In FY06, CFAST received 167 validated and prioritized requirements. In addition, The Secretary of Defense approved the AP Roadmap on 13 December 2005. CFAST will meet this AP guidance, preserving the best characteristics of present day deliberate (contingency) and crisis planning, while establishing common joint processes and systems to support the development and execution of plans. Furthermore, CFAST has been identified as a technical solution to address the NECC Force Projection Mission Capability Package as articulated in the draft NECC CDD. Within the FY08 to FY10 timeframe, CFAST will sustain existing capabilities, continue to development emergent AP capabilities to satisfy the 167 requirements as well as meet the intent of the AP Roadmap and alignment with the NECC CDD. CFAST is funded to provide four operational versions annually.

In FY08-09, RDT&E will finance the following:

- Capability and Force Requirements Manipulation: improving the Force Builder force generation tool to include Task Organization and Mass/Selective Edits for units within the Time Phased Force And Deployment Data (TPFDD) files. The improvements enable the scheduled movement of forces and supplies into an area of operations. Force Builder allows the planner to build a draft list of forces, group them into force modules and place them into a priority of movement that is honored by scheduling applications. Improvements will include a refined level of detail which provides a higher quality estimate for logistics and transportation needs and reduces the time required to build a plan. The following tools will receive modifications:
 - Force Packager An application used to quickly build TPFDD requirements including "below the line" Combat

Exhibit R-2a, RDT&E Project Justific	cation		DATE: Feb:	ruary	2007				
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT			PROJ	ECT NAME AN	D NUMBER		
RDT&E, Defense-Wide/07	Global C	ommand and	d Control S	ystem	Coll	aborative F	orce Analysi	s, Sustain	ment, and
	/ PE 030	3150K			Tran	sportation	System (CFAS	T)/CC02	
Cost (in millions)	FY06	FY07	FY08	FY	709	FY10	FY11	FY12	FY13
Collaborative Force Analysis,	2.464	7.000	8.300	8.3	300	8.300	0.000	0.000	0.000
Sustainment, and Transportation									
System (CFAST)/CC02									

Support and Combat Service Support (CS/CSS) capability based on rules of allocation for each Service. Will provide a "one click" process for building large force requirements in support of the published Concept of Operations (CONOPS).

- Plan Builder Generate decision logs and reports for a specific Operation Plan (OPLAN).
- Plan Viewer Option to show force flow data across modules by date range.
- Plan Evaluation and Quality Assurance: providing a feedback loop from models which simulate warfare and transportation needs from initial US entry into theatre through mission completion. The feedback allows planners to alter the force composition and size according to the mission needs. The improvements include modifications to the Lift Allocator and the Joint Force Analysis, Sustainment, and Transportation (JFAST) tools, a pair of collaborative tools sponsored by United States Transportation Command (USTRANSCOM) and the other Combatant Commands that rapidly calculates an average daily throughput tonnage by day.
- Logistics Analysis Capabilities: CFAST will provide improved capabilities which estimate logistics requirements for an operation. This includes all classes of supply daily. Improvements will include Transportation estimate improvements by improving the Sealift estimation algorithm, increasing the level of detail for sustainment planning, and increasing the data for individual ports. The increased detail provides better information and makes the initial estimate more accurate and reduces the planning cycle. Improvements will be made to:
 - AmmoGen Tool Generate ammo sustainment requirements during the building of a plan.
- PerGen Tool Personnel Generator will allow modifications of scenarios by service for inclusion in dynamic plans/adaptive situations.
- SusGen Tool Sustainment Generator allows for merging of scenarios by service. Imports scenarios created in standalone Joint Flow and Analysis System for Transportation (JFAST), the robust TRANSCOM used for scheduling movement.
- Execution management tool A CFAST tool used to absorb and manage USTRANSCOM analysis and scheduling system data. It allows the user to create tools that validate movement requirements, assign requirements to carriers, report movement, and track strategic and theater lift assets and requirement movement through the Defense Transportation System globally.
- Theater log CONOPS management tool A CFAST tool that enables logistics planners to develop theater-wide concept of operations. It provides automated planning, and enables planning for theater distribution of supplies and equipment. Include support available, where applicable, from the host nation.
- Log Force adequacy tool The Log Force Adequacy tool will enable logistics planners, via automation, to evaluate the force list (Time Phased Force Deployment Data TPFDD) and develop estimates of supportability/concept of

Exhibit R-2a, RDT&E Project Justific	ation		DATE: Febr	ruary	2007				
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT			PROJ	ECT NAME AN	D NUMBER		
RDT&E, Defense-Wide/07	Global C	ommand and	d Control Sy	stem	Colla	aborative F	orce Analysi	s, Sustainn	ment, and
	/ PE 030	3150K			Tran	sportation	System (CFAS	T)/CC02	
Cost (in millions)	FY06	FY07	FY08	FY	09	FY10	FY11	FY12	FY13
Collaborative Force Analysis,	2.464	7.000	8.300	8.3	300	8.300	0.000	0.000	0.000
Sustainment, and Transportation									
System (CFAST)/CC02									

operations for providing adequate and timely support.

- **Planning Workflow:** New capability will allow authorized users to track the status of each OPLAN and the approval process for the plan. The planning capability will receive modifications which provide redeployment planning capabilities from theatre back to home station. Modifications are required for the following tools:
- Plan Development and Execution Process Workflow Manager Provide capability similar to Microsoft Project for management and graphical layout of the campaign and war planning process.
- Planning Application Integration Develop a collaborative working environment that provides the capability to absorb, manipulate, model, display and provide updated data containing critical plan elements to/from DLA, the intelligence community, the Standing Joint Force HQ, special operations forces and the Joint medical community.
- Interoperability: CFAST contains unique software capabilities but relies upon data feeds from external systems. Data requirements and improvements will include Readiness data; fine grain unit information; migration to new data standards; and importing/exporting into new formats.
- Course of Action Development Provide an initial capability that allows planners to simulate the scheduled TPFDD flow of forces into the area of operations and the actions required to fulfill the mission. The simulation shall include effects based operations as well as attrition warfare. The course of action will allow feedback into the planning applications in order to refine the forces required for an operation.
- Net Enabled Command Capabilities (NECC) In order for CFAST to provide Adaptive Planning capabilities for the NECC program, CFAST must move to the SOA technical specifications dictated by OSD NII in order to reduce cost by providing reuse of code and enterprise level capabilities through FY10.

	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	0.288	0.750	0.500	0.500

Integration and Test (I&T): CFAST employs an incremental spiral I&T methodology in accordance with testing and information assurance regulations, as applicable. This risk reduction strategy allows testing in smaller, more manageable versions, while still enforcing a level of testing commensurate to the operational and technical complexity of each release. This approach permits an earlier start of integration testing as well as on making capability

Exhibit R-2a, RDT&E Project Justific	cation		DATE: Feb:	ruary	2007				
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT			PROJ	ECT NAME AN	D NUMBER		
RDT&E, Defense-Wide/07	Global C	ommand and	d Control S	ystem	Coll	aborative F	orce Analysi	s, Sustain	ment, and
	/ PE 030	3150K			Tran	sportation	System (CFAS	T)/CC02	
Cost (in millions)	FY06	FY07	FY08	FY	709	FY10	FY11	FY12	FY13
Collaborative Force Analysis,	2.464	7.000	8.300	8.3	300	8.300	0.000	0.000	0.000
Sustainment, and Transportation									
System (CFAST)/CC02									

available to users for evaluation during actual planning events. CFAST also finances independent security evaluations of CFAST versions in order to maintain the ATO status. This approach ensures the operational suitability and effectiveness, interoperability, and security of CFAST for warfighter use.

C. Other Program Funding Summary:

									То	Total
	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	Complete	Cost
Procurement, DW	0.000	0.000	6.000	1.500	1.500	0.000	0.000	0.000	0.000	9.000
O&M, DW	3.939	0.360	8.700	8.700	8.700	0.000	0.000	0.000	0.000	30.600

D. Acquisition Strategy:

Joint Requirements Oversight Council (JROC) memorandum (JROCM) 102-04, Subject: Collaborative Force Analysis, Sustainment and Transportation System (CFAST) Future Development, designated U.S. Joint Forces Command (USJFCOM) as the Functional Proponent for CFAST and the Defense Information Systems Agency (DISA) as the Material Solution Provider, effective July 2004. The CFAST Acquisition Strategy is structured to retain contractors capable of satisfying cost, schedule, and performance objectives. CFAST utilizes Cost Reimbursable Task Orders (TO) issued under competitively awarded contracts. CFAST maximizes the use of competitively awarded IDIQ contracts and requires contractors to establish and manage specific earned value data. The CFAST strategy mitigates risk by requiring Contract Performance Reviews (CPR) and utilizes Award Fee contracts where appropriate to incentivize performance.

E. Performance Metrics:

Cost & Schedule Management - CFAST utilizes earned value management to manage technical cost and schedule requirements. Contractors are required to plan, budget, and schedule resources in time-phased "planned value" increments constituting a cost and schedule measurement baseline. This approach encourages contractors to use effective internal cost and

Exhibit R-2a, RDT&E Project Justific	ation		DATE: Feb:	ruary	2007				
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT			PROJE	ECT NAME AN	D NUMBER		
RDT&E, Defense-Wide/07	Global C	ommand and	. Control S	ystem			orce Analysi		ment, and
	/ PE 030	3150K			Trans	sportation	System (CFAS	ST)/CC02	
Cost (in millions)	FY06	FY07	FY08	FY	.09	FY10	FY11	FY12	FY13
Collaborative Force Analysis, Sustainment, and Transportation System (CFAST)/CC02	2.464	7.000	8.300	8.3	300	8.300	0.000	0.000	0.000

schedule management control systems. Performance is evaluated by conducting CPRs as well as weekly critical path reviews of the CFAST release schedules to ensure tasks are on track and to mitigate risk across the entire lifecycle.

Exhibit R-3 Cost A	Analysis				DA'	IE: Febr	uary 200	7				
APPROPRIATION/BUDG	ET ACTIVI	TY	PROGRAM ELE	MENT			PROJI	ECT NAME	AND NUI	MBER		
RDT&E, Defense-Wid	de/07		Global Comm (GCCS) PE 0	and and 303150K		System				Analysis, em (CFAST)		nment, and
Cost Category	Contract Method & <u>Type</u>	Performing Activity & Location	•	FY 07 Cost	FY 07 Award <u>Date</u>	FY 08 Cost	FY 08 Award Date	FY 09 Cost	FY 09 Award Date	Cost to Complete	Total <u>Cost</u>	Target Value of Contract
Product Development	MIPR	ORNL, Oak Ridge, TN		6.250	Feb-07	6.500	Feb-08	6.500	Feb-09	Contg	Contg	23.650
Product Development	CPAF	Pragmatics McLean, VA	, 2.000	0.000	N/A	0.000	N/A	0.000	N/A	Contg	Contg	2.000
Test and Evaluation	MIPR	ORNL, Oak Ridge, TN		0.750	Feb-07	0.500	Feb-08	0.500	Feb-09	Contg	Contg	2.700
Product Development	IATAC	BAH McLean, V	2.300 A	0.000	Sep-07	1.300	Sep-08	1.300	Sep-09	Contg	Contg	4.900
Total			12.850	7.000	N/A	8.300	N/A	8.300	N/A	Contg	Contg	33.250

Exhibit R-4 Schedule																							/ 200									
Appropriation/Budget RDT&E, Defense-W	t Ac ide	tivi /07	ty						Gle	oba	Pro I Co	ogra mm	am E and	Elem and	nent d Co	Nur	nber I Sy	r and ster	d Na n/PE	ame E 030	0315	0K		F	Proje	ct Nu CFA	ımb ST	er a / CC	nd N :02	lam	е	
		2	006				200	7		2008 2009			2010 2		20	011		2012			2013											
Fiscal Year	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	1	2	3	4
Development and		\wedge	\wedge	^			^		\backslash		\wedge	\wedge		\wedge	Δ	\wedge	\triangle	Δ	Δ													
Strategic Planning										Four	CFA	ST C				:	s Fun	ded	Annı	ually												
Integration and Testing		^	\wedge		$\sqrt{}$	\\\\	^		lacksquare	\wedge	\triangle	Δ	\triangle	Λ	Δ	Δ	\triangle	Δ	Δ													
3									F	our (FAS	ТОр	erati	onal	Vers	ions	Fund	ed A	nnua	ally												

In FY06, CFAST received 167 validated and prioritized requirements. In FY06 and FY07, CFAST developed, tested and fielded capabilities to satisfy those requirements. Within the FY08 to FY10 timeframe, CFAST will sustain existing capabilities, continue to development emergent AP capabilities to satisfy the 167 requirements as well as meet the intent of the AP Roadmap and alignment with the NECC CDD. CFAST is funded to provide four operational versions annually. CFAST will provide "living plans" in a net-centric, collaborative, virtual environment, updated routinely to reflect changes in guidance/ strategic environment with automated triggers, linked to real time authoritative sources, that alert planners to key assumptions or planning parameters. CFAST is funded to provide four operational versions annually.

Exhibit R-4a Schedule Detail			DATE:	February	2007			
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07		ELEMENT Command and 150K	NAME AND NUMBER rative Force Analysis, ment, and Transportation / CC02					
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
Development and Strategic Planning	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	N/A	N/A	N/A
Integration and Test	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q	N/A	N/A	N/A

In FY06, CFAST received 167 validated and prioritized requirements. In FY06 and FY07, CFAST developed, tested and fielded capabilities to satisfy those requirements. Within the FY08 to FY10 timeframe, CFAST will sustain existing capabilities, continue to development emergent AP capabilities to satisfy the 167 requirements as well as meet the intent of the AP Roadmap and alignment with the NECC CDD. CFAST is funded to provide four operational versions annually. CFAST will provide "living plans" in a net-centric, collaborative, virtual environment, updated routinely to reflect changes in guidance/ strategic environment with automated triggers, linked to real time authoritative sources, that alert planners to key assumptions or planning parameters. CFAST is funded to provide four operational versions annually.

Exhibit R-2, RDT&E Budget Item Justific	cation		1	DATE: Februa:	ry 2007			
APPROPRIATION/BUDGET ACTIVITY			1	R-1 ITEM NOME	NCLATURE			
RDT&E, Defense-Wide/07	Joint Spectrum Center /PE 0303153K							
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Joint Spectrum Center /JS1	14.356	12.401	18.653	19.446	20.140	18.007	18.970	17.670

A. Mission Description and Budget Item Justification:

The Joint Spectrum Center's (JSC) mission is to ensure the Department of Defense's (DoD) effective use of the electromagnetic spectrum in support of national security and military objectives. The JSC serves as the DoD center of excellence for Electromagnetic (EM) spectrum management matters in support of the Unified Commands, Joint Staff, Assistant Secretary of Defense for Networks and Information Integration (ASD (NII)), Military Departments, and Defense Agencies. The JSC supports the Electronic Protect missions of Information Warfare (IW) as they relate to spectrum supremacy. It is responsible for developing and maintaining DoD standard information systems that support DoD spectrum related activities and processes. Specifically, the Center designs, develops, and maintains DoD automated spectrum management systems, evaluation tools, and databases employed by the Unified Commands, Military Departments, and Defense Agencies. The JSC databases are the prime sources of information for DoD use of the EM spectrum. The JSC provides technical assistance to the Office of Assistant Secretary of Defense (OASD) NII, the Joint Staff, DoD activities and the Unified Commands in support of spectrum policy decisions and ensuring the development, acquisition, and operational deployment of systems that are compatible with other spectrum dependent systems operating within the same EM environment. Additional focus is centered on improving future warfighter EM spectrum utilization through technological innovation accomplished by researching, studying, and steering the direction of Research and Development (R&D) emerging technology efforts from a spectrum perspective. The Center is the DoD focal point for technical spectrum related support, Electromagnetic Environmental Effects (E³), and EM interference resolution assistance to operational units including deployable support to COCOM Joint Task Forces. The JSC mission is integral to other vital activities such as Information Operations (IO), Command and Control (C2) Protect and other defensive IW activities as directed by the Joint Staff. This program element is under Budget Activity 07 because it supports operational systems development.

Accomplishments/Planned Program:

Spectrum Knowledge Resources	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	7.113	6.721	6.517	6.924

This function includes development and updates of DoD systems such as the Frequency Resource Record System (FRRS), the Spectrum Certification System (SCS), and the Spectrum Requirements System (SRS) which provide critical frequency assignment and equipment data that is necessary in predicting and avoiding spectrum conflicts. This area also includes development and updates of the SPECTRUM XXI, the joint standard DoD spectrum management system. This system ensures DoD has adequate spectrum access to accomplish its missions by addressing the regulatory requirements of host nation

Exhibit R-2, RDT&E Budget Item Justific	cation		I	DATE: Februa	ry 2007							
APPROPRIATION/BUDGET ACTIVITY			I	R-1 ITEM NOME	NCLATURE							
RDT&E, Defense-Wide/07				Joint Spectrum Center /PE 0303153K								
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13				
Joint Spectrum Center /JS1	14.356	12.401	18.653	19.446	20.140	18.007	18.970	17.670				

spectrum administrations and by ensuring that a common operating picture of the spectrum is available to the warfighter. SPECTRUM XXI Version 4.2 was released in FY 2005 with periodic releases planned thereafter.

Electromagnetic Environmental	<u>FY 06</u>	<u>FY 07</u>	FY 08	FY 09
Effects (E3)				
Subtotal Cost	3.076	2.766	2.963	3.022

The mission of this program is to ensure that DoD platforms, systems, equipment, and other assets can effectively use the Electromagnetic (EM) spectrum in support of national security and military objectives. It supports the requirements generation system, the DoD acquisition process, operational test and evaluation, and EM compatibility standardization. Algorithms and E3 analytical tools are developed for functions such as Hazards of Electromagnetic Radiation to Ordnance (HERO) risk assessments in support of the COCOMS and the Joint Task Force (JTF). Assessments are conducted to determine system and equipment limitations in the operational EM environment. Efforts also include the development and maintenance of the JSC Ordnance E3 Risk Assessment Database (JOERAD), a decision support system that helps the warfighter make critical decisions about the hazards associated with the use of introduced ordnance within complex EM environments.

Emerging Spectrum Technology (EST)	FY 06	<u>FY 07</u>	<u>FY 08</u>	FY 09
Subtotal Cost	4.167	2.914	4.673	5.000

The JSC, in conjunction with the Strategic Planning Office, has the responsibility of planning, developing, and executing the DISA Emerging Spectrum Technology (EST) program to improve future warfighter EM spectrum utilization through technological innovation accomplished by researching, studying, and steering the direction of Research and Development (R&D) emerging technology efforts from a spectrum perspective. This support will provide R&D analysis support to NII and other organizations with executive summary presentations; high-level reports and briefings; development of EST roadmaps; development of an EST Testbed; and detailed survey and review of emerging technologies to identify trends and analyze their implications on DoD spectrum management and supportability processes and procedures. As part of the outreach efforts, focused partnerships will be pursued with internal DoD departments, federal agencies, private industry, and the academic world to complement current and future DoD R&D spectrum initiatives and to provide collaborative spectrum R&D opportunities; advocacy of new spectrum strategies; and sponsorship of spectrum conferences and technical information exchanges. The JSC will produce necessary tools for conducting technical analyses of next-generation technologies in support of efficient DoD use of the spectrum. Efforts include the development of models,

Exhibit R-2, RDT&E Budget Item Justific	cation		I	DATE: Februa:	ry 2007						
APPROPRIATION/BUDGET ACTIVITY			F	R-1 ITEM NOME	NCLATURE						
RDT&E, Defense-Wide/07			5	Joint Spectrum Center /PE 0303153K							
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13			
Joint Spectrum Center /JS1	14.356	12.401	18.653	19.446	20.140	18.007	18.970	17.670			

algorithms, and measurement tools for use in analyzing ultra-wideband technologies, software defined radios, and high-power and directed-energy weapons. In software defined radios, the parameters (frequency range, modulation type, or maximum power) can be altered by making a software modification without changing hardware components that can affect the radio frequency emissions. As for directed energy weapons, these systems will be evaluated with respect to E3 and measurements conducted to assist in modifying Military Standards to ensure compatible coexistence of these systems with legacy systems. The FY 2006 program included the development of the EST Testbed Prototype. The goal of the Spectrum Testbed initiative is to establish simulation capabilities to assess and measure performance of innovative spectrum access methods, systems, and components. The initial spectrum testbed prototype is intended to demonstrate the knowledge that can be gained from such a capability and the benefits in terms of more effective spectrum operations. The JSC will conduct an assessment of the electromagnetic spectrum implications of adaptive networks and potential application to support DoD warfighting concepts. These networks typically consist of mobile nodes that communicate over wireless links, without any fixed network infrastructure or central control. JSC will investigate how network management functions such as initialization, routing, and security are distributed among the nodes can be combined with spectrum management for effective spectrum operations in support of network-centric warfare.

Global Electromagnetic Spectrum	FY 06	FY 07	FY 08	FY 09
Information System (GEMSIS)				
Subtotal Cost	0.000	0.000	4.500	4.500

On 23 January 2006, the Joint Requirements Oversight Council (JROC) approved the GEMSIS Initial Capabilities Document (ICD). GEMSIS is intended to provide capabilities for integrated spectrum operations across the entire Department of Defense (DoD) in addition to interoperability with Federal, State and local government spectrum agencies, and coalition forces. GEMSIS is envisioned as a net-centric emerging capability providing commanders with an increased common picture of spectrum situational awareness of friendly and hostile forces while transparently deconflicting competing mission requirements for spectrum use. This capability will enable the transformation from the current preplanned and static assignment strategy into autonomous and adaptive spectrum operations.

GEMSIS is expected to provide a long-term solution for spectrum management capabilities. GEMSIS will provide a family of spectrum capabilities and a joint enabling concept. As a family of spectrum capabilities, GEMSIS will support all levels of warfare (Strategic, Operational, and Tactical) and National Strategy through the fielding of supportable and adaptive RF spectrum-dependent capabilities. Military readiness, mobilization, strategic operations, logistics, and

Exhibit R-2, RDT&E Budget Item Justific	cation		I	DATE: Februa:	ry 2007						
APPROPRIATION/BUDGET ACTIVITY			F	R-1 ITEM NOME	NCLATURE						
RDT&E, Defense-Wide/07			5	Joint Spectrum Center /PE 0303153K							
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13			
Joint Spectrum Center /JS1	14.356	12.401	18.653	19.446	20.140	18.007	18.970	17.670			

space-based capabilities depend on the availability of the electromagnetic spectrum to plan and execute missions. Global communications, the sustaining infrastructure, interagency, local government, and coalition operations similarly depend on spectrum planning and execution. The GEMSIS architecture will provide GIG-based capabilities enabling the seamless exchange of spectrum access resources, equipment supportability assessments, mission planning and rehearsal guidance, and acquisition decision support inputs DOD wide.

Near-term GEMSIS concepts include: 1) Spectrum operations will begin to be transformed by providing visibility into the spectrum supportability process through a set of web-based capabilities, 2) An interoperable spectrum management system will provide an end-to-end tool suite for use by all spectrum management organizations, 3) Spectrum data will be standardized to improve the interoperability with NATO, NTIA, and coalition partners. and 4) Spectrum considerations will become a part of the strategic planning process enabling the command staff to plan for and coordinate specific access prior to the start of operations. Far-term GEMSIS concepts include: 1) Future spectrum operations will require far less manual intervention than today's operations that require the custom matching of frequency resources to unique hardware characteristics; 2) Future spectrum operations will be conducted over the network and will integrate command and control, intelligence, surveillance, reconnaissance, logistics, and offensive IO with platforms, and on-board sensors and weapon systems; 3) Situational awareness applications will determine and warn operators of potential radiation hazards through network integration of ordnance, munitions, and radiators; and 4) Preplanned and static frequency assignment spectrum management will be transformed to allow the decentralized and autonomous self-assignment of spectrum for use in accordance with the commander's intent and consistent with national and international rules and regulations.

Exhibit R-2, RDT&E Budget Item Justific	cation		DA	ATE: Februa	ry 2007							
APPROPRIATION/BUDGET ACTIVITY			R-	-1 ITEM NOME	NCLATURE							
RDT&E, Defense-Wide/07					Joint Spectrum Center /PE 0303153K							
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13				
Joint Spectrum Center /JS1	14.356	12.401	18.653	19.446	20.140	18.007	18.970	17.670				

B. <u>Program Change Summary</u>:

Previous President's	<u>FY 06</u>	<u>FY 07</u>	<u>FY 08</u>	<u>FY 09</u>
Budget	13.896	12.448	14.804	15.468
Current Submission Total Adjustments	14.356	12.401	18.653	19.446
	0.460	-0.047	3.849	3.978

Change Summary Explanation: FY 2006 decrease is due to below-threshold reprogramming. FY 2007 change is due to reductions for Section 8106 Economic Assumptions. FY 2008 and 2009 funding changes are due to revised fiscal guidance and the addition of the new GEMSIS function.

C. Other Program Funding Summary:

	<u>FY 06</u>	<u>FY 07</u>	FY 08	<u>FY 09</u>	<u>FY 10</u>	<u>FY 11</u>	<u>FY 12</u>	FY 13	<u>To</u> Complete	Total Cost
O&M, DW	19.893	43.072	28.721	31.707	32.265	34.365	34.456	35.735	Contg	Contg

D. <u>Acquisition Strategy</u>: Engineering support services for the JSC are provided via contract. No in-house government capability exists, nor is it practical to develop one that can provide the expertise necessary to fulfill the mission and responsibilities of the JSC. Full and open competition was used for the acquisition of the current contract with ITT Industries, Inc. that became effective 5 August 2005 with a basic period of three years and seven one year options. The previous contract with ALION science and Technology expired 31 December 2006.

Exhibit R-2, RDT&E Budget Item Justific	cation		Γ	DATE: Februa:	ry 2007							
APPROPRIATION/BUDGET ACTIVITY R-1 ITEM NOMENCLATURE												
RDT&E, Defense-Wide/07 Joint Spectrum Center /PE 0303153K												
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13				
Joint Spectrum Center /JS1	14.356	12.401	18.653	19.446	20.140	18.007	18.970	17.670				

E. Performance Metrics:

Support through analyses, planning, and policy recommendations, emerging spectrum-dependent technologies to enhance DoD operational capabilities by:

- a. Identifying beneficial and potentially threatening spectrum technologies with respect to DoD spectrum access and operations (% of spectrum-dependent technologies assessed).
- b. Forming strategic alliances with government, industry and academia to advocate, influence, and promote spectrum dependent emerging technologies (% of partnerships formed after outreach and engagement).

Exhibit R-3 Cost Analy	rsis					DATE:	Februa	ary 2007	1				
APPROPRIATION/BUDGET A	CTIVITY		PROGRAM	ELEMENT				PROJEC'	r name a	AND NUMB	ER		
RDT&E, Defense-Wide/07	7		Joint Sp	ectrum	Center /	PE 030	3153K	Joint	Spectrum	n Center	/ JS1		
Cost Category	Contrac t Method & <u>Type</u>	Perform Activit Location	y &	Total PYs Cost	FY 07 Cost	FY 07 Award <u>Date</u>	FY 08 Cost	FY 08 Award <u>Date</u>	FY 09 Cost	FY 09 Award Date	Cost to Complete	Total <u>Cost</u>	Target Value of Contract
Contractor Engineering/Technical Spt	C/CPAF	IIT Res Inst Ar MD	search nnapolis,	13.408							0	13.408	13.408
GFE	C/CPAF	IIT Res	search nnapolis,	.800							0	.800	.800
Engineering/Technical Support	C/FFP	Georgia	a Tech	.186							0	.186	.186
Engineering/Technical Support	C/FFP	Virgini	ia Tech	.170							0	.170	.170
Engineering/Technical Support	MIPR	Various	3	2.640	.423	10/06	.453	10/07	.462	10/08	0	3.978	3.978
Contractor Engineering/Technical Spt	C/CPFF	Various	5	1.619							0	1.619	1.619
Contractor Engineering/Technical Spt	C/CPAF	ALION A	Annapolis,	73.441							0	73.441	73.441
GFE	C/CPAF	ALION A	Annapolis,	4.439							0	4.439	4.439
Contractor Engineering Technical/Spt	C/TBD	ITT Ind	dustries,		11.978	10/06	18.200	10/07	18.984	10/08	Contg	Contg	Contg
Subtotal Test & Evaluation				96.703	12.401		18.653		19.446				
Total				96.703	12.401		18.653		19.446				

Exhibit R-4 Schedule	Pr	ofile	;																				[Date	e: Fe	ebrua	ary 2	2007	,				
Appropriation/Budget RDT&E, Defense-W			:y													umb iter/f										Proje oint							
		20	06			2	2007	7			200	8		2	009			20	010				20	11			2	012			20)13	
Fiscal Year	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	3 4	4	1	2	3	4	1	2	3	4	1	2	3	4
Spectrum XXI Enhancements Development and Release			,	Δ				Δ		_		Δ	7			Δ					7				Δ				Δ				Δ
Completed Development of JOERAD 9.2				Δ																													
Complete Independent Testing of JOERADw1.1						\triangle	Y																										
Incorporate JOERAD Power Density Module and Complete IV&V Testing								\triangle																									
Complete IV&V Testing of JOERADw2.0 and 3.0										7				7																			
Develop Integrated Intersite Model (IIM) Version 3.0 Area Coverage Services (NMSA Antenna Path Format)	e					Δ																											

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Appropriation/Budge			ty															nd N							roje							
RDT&E, Defense-W	ide.	/07								J	oint	Spe	ectri	um (Cen	ter/F	PE 03	3031	53K					J	oint	Spec	tru	m Co	ente	r/JS	31	
		20	06			;	2007	7		:	2008	3		20	009			20	10			20	11			20)12			20	013	
Fiscal Year	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	1	2	3	4
IIM – Complete Test Plan for New Receiver and NSMA Antenna Pattern							Δ	7	-																							T
Complete Testing of IIM Version 3.0 and Conduct Prototype Demo								\triangle																								
Complete Test Plan and Festing of IIM Version 0.4												Δ																				
nitial Development of EST Testbed Prototype				Δ																												
Spectrum Scorecard nitial Version								\triangle																								
Develop Mixed Environment Models and Enhance Radio Frequency RF) Adaptability								Δ																								
Adaptive Networks Assessments												Δ				Δ				\triangle				Δ				\triangle				

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Exhibit R-4a Schedule Detail			DATE:	February	2007			
APPROPRIATION/BUDGET ACTIVITY		M ELEMENT					NAME AND NU	
RDT&E, Defense-Wide/07	Joint S	Spectrum Ce	nter / PE (303153K		Joint Sp	ectrum Cent	er / JS1
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
Spectrum XXI Enhancements Development	4Q	4Q	4Q	4Q	4Q	4Q	4Q	4Q
Completed Development JOERAD 9.2	4Q							
Independent Testing of JOERADw1.1		2Q						
Incorporate JOERAD Power Density Module and Complete IV&V Testing		4 Q						
Complete IV&V Testing of JOERADw2.0 and 3.0			10	10				
Develop Integrated Intersite Model (IIM) Version 3.0 Area Coverage Services (NMSA Antenna Path Format)		2Q						
IIM - Complete Test Plan for New Receiver and NSMA Antenna Pattern		3Q						
Complete Testing of IIM Version 3.0 and Conduct Prototype Demo		4 Q						
Complete Test Plan and Testing of IIM Version 0.4			4 Q					
Initial EST Testbed Prototype	4Q							
Spectrum Scorecard Initial Version		4Q						
Develop Mixed Environment Models and Enhance RF Adaptability		4Q						
Adaptive Networks Assessments			4Q	4Q	4Q	4Q	4Q	4Q

Exhibit R-2, RDT&E Budget Item Justification	1		DA	TE: Decembe	r 2006			
APPROPRIATION/BUDGET ACTIVITY			R-	1 ITEM NOMEN	CLATURE			
RDT&E, Defense-Wide/07			Ne	t-Centric En	terprise Se	rvices (NCES	S)/PE 0303	170K
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Net-Centric Enterprise Services (NCES)/T57	74.511	28.522	43.424	9.490	9.758	9.950	9.950	9.950

A. Mission Description and Budget Item Justification:

The Net-Centric Enterprise Services (NCES) vision is to enable the secure, agile, robust, dependable, and interoperable data sharing environment for the Department of Defense (DoD) whereas the warfighter, business, and intelligence users share information on a global network that facilitates information superiority, accelerated decision-making, effective operations, and net-centric transformation. Data is an essential enabler of network-centric warfare. As the DoD Components implement DoD 8320.2, "Data Sharing in a Net-Centric Department of Defense," data will be made visible, accessible and understandable to other potential users by metadata ("tagging"), web-service enabling, and registering of metadata. NCES services are essential for making that data useful to others within the enterprise. NCES enables the DoD to fully leverage the value of its information by providing discovery and accessing of data.

The operational benefits enabled by NCES include:

- 1. Increased speed of command and greater precision of desired effects resulting from shared situational awareness and informed decision-making.
- 2. Improved interoperability resulting from the use of shared services and authoritative data that is timely, understandable, complete, and available to all users.
- 3. Enhanced information superiority, with the objective to achieve enhanced decision superiority through an increase in the availability of relevant and authoritative information.
- 4. Increased agility enabled by the improvement in machine-to-machine interactions reducing the need for human intervention and reduced footprints resulting from greater ability to access information and services regardless of where they reside.
- 5. An improved ability to conduct planning and support of coordinated execution at multiple echelons (National, Strategic, Operational, and Tactical) in a nearly parallel fashion using the concepts of shared spaces and common collaboration and decision support tools.
- 6. An improved security posture providing dynamic, continual security measures, and ensuring identity, data authenticity, and secure communications.

NCES supports DoD's transformation goals to achieve rapid decision superiority, to streamline business processes, and to conduct effective and discriminate information operations. NCES transforms legacy planning and execution capabilities into protected, web-based, real-time collaborative business processes, including Joint and Coalition information exchanges across organizational boundaries. NCES meets the military requirement to provide dramatically

Exhibit R-2, RDT&E Budget Item Justification			DA'	TE: Decembe:	r 2006			
APPROPRIATION/BUDGET ACTIVITY			R-	1 ITEM NOMEN	CLATURE			
RDT&E, Defense-Wide/07			Ne	t-Centric En	terprise Se	rvices (NCES	S)/PE 03033	L70K
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Net-Centric Enterprise Services (NCES)/T57	74.511	28.522	43.424	9.490	9.758	9.950	9.950	9.950

improved situational awareness, robust alerting, shortened decision cycles, and shared understanding.

NCES Increment I will eliminate costly legacy interfaces among disjointed, disparate, and stove-piped systems by providing a comprehensive set of nine (9) interoperable core enterprise services. These nine (9) core enterprise services are:

- (1) Collaboration: this service will enable real-time situational updates to time critical planning activities among joint, coalition partners, the intelligence community, and Agencies at all levels (DoD, Federal, State, and Local) and provide real-time information sharing and processing anywhere and anytime, by any user with privileges on the DoD network. Collaboration includes being able to see, hear, and talk to all participants in a collaborative session; securely share files, information, and applications stored on local computers; and make presentations to large or small audiences;
- (2) Mediation: this service will enable users to translate data from one format to another so that the data can be used by all users no matter what format they prefer. This service increases data interoperability and enables all warfighting and business users to be able to communicate with each other to support rapid decision-making;
- (3) Information Assurance/Security (IAS): this service provides authentication, access management, and domain security services. These security services enable resistance to non-user system access and interference, in addition to preventing user misuse and security errors. The security service interoperates with the other core services to protect the NCES as a whole entity. This service relies on the Public Key Infrastructure (PKI) and supports user authentication and validation services;
- (4) Discovery: the enabling of all users no matter where they are to find the necessary information required to do their jobs faster and make better decisions faster. This service includes finding services provided by other DoD programs for users with the proper credentials to have access to (Service Discovery), finding people logged onto the network and any devices connected to the network (People and Device Discovery), finding all types of web content, and data distributed throughout DoD;
- (5) Enterprise Services Management (ESM): this service provides the ability to monitor, manage, and scale web services appropriately, thereby assuring that the NCES services are available to the user whenever the user needs it. Enterprise Services Management (ESM) will also provide performance monitoring, mission impact assessment, and problem detection

Exhibit R-2, RDT&E Budget Item Justification	1		DA	TE: Decembe	r 2006			
APPROPRIATION/BUDGET ACTIVITY			R-	1 ITEM NOMEN	CLATURE			
RDT&E, Defense-Wide/07			Ne	t-Centric En	terprise Se	rvices (NCES	S)/PE 03033	L70K
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Net-Centric Enterprise Services (NCES)/T57	74.511	28.522	43.424	9.490	9.758	9.950	9.950	9.950

and resolution to make sure that the user is getting information and services in ways that are useful;

- (6) Storage: this service provides the necessary storage to deliver the necessary content and information to the users. Warfighter, Business, and Intelligence communities are developing and maintaining enough information that will push today's storage limitations beyond their current capabilities. Hence, NCES provides enough storage capacity to support current and future needs. NCES provides a storage architecture, storage operations, capacity management, and storage policies and procedures;
- (7) Application: this service will provide a protected hosting environment consisting of common hardware platforms and operating systems. This is the infrastructure where all NCES services and applications will reside within a Defense Enterprise Computing Center. Users will be able to access NCES services no matter where they are, thereby supporting mobile decision making;
- (8) Messaging: this service provides secure machine to machine communications on behalf of the user, provide various notifications and alerts, and interoperable global communications support. In summary, all the mechanisms for delivering content efficiently and reliably across the enterprise; and
- (9) User Assistant: this service provides users with help desk services, automated helper assistants, and enables the user the ability to customize the way they want to interact with NCES.

These nine (9) Core Enterprise Services are grouped and implemented as four (4) product lines: Service Oriented Architecture (SOA) Foundation, Content Discovery and Delivery (CD&D), DoD Enterprise Collaboration, and Defense Knowledge Online (DKO) Portal. The SOA Foundation provides the ESM, Mediation, Messaging, Information Assurance/Security, finding services provided by DoD programs (Service Discovery), and finding people or devices (People and Device Discovery). The CD&D provides the GoogleTM like functionality of finding web content, storage, and delivering that content to the users. The DKO Portal represents a way for users to get access to the services provided by NCES and provides all the tools associated with the User Assistant core enterprise service. The DoD Enterprise Collaboration will provide users with a range of capabilities, such as chat, web conferencing, application sharing, white boarding including annotations, and application broadcasting that meets DoD security and operational requirements. These four (4) product lines will be provided and supported throughout the full life cycle by managed service provides who will offer their services from a qualified Global Information Grid Computing Node.

Exhibit R-2, RDT&E Budget Item Justification	ı		DA:	TE: Decembe	r 2006			
APPROPRIATION/BUDGET ACTIVITY			R-3	L ITEM NOMEN	CLATURE			
RDT&E, Defense-Wide/07			Net	t-Centric En	terprise Se	rvices (NCES	S)/PE 03033	170K
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Net-Centric Enterprise Services (NCES)/T57	74.511	28.522	43.424	9.490	9.758	9.950	9.950	9.950

NCES also supports the following five (5) Defense Information Systems Agency Strategic Goals as stated in the Corporate Strategy Scorecard (V.14):

- 1. Strategic Goal 1: "Transition to a net-centric environment to transform the way DoD shares information by making data continuously available in a trusted environment"
- 2. Strategic Goal 2: "Build and sustain a Global Information Grid (GIG) transport infrastructure that eliminates bandwidth constraints and rapidly surges to meet demands, wherever needed."
- 3. Strategic Goal 3: "Operate, manage, and defend the GIG to enhance critical warfighting and business capabilities in a net-centric environment."
- 4. Strategic Goal 4: "Transition to DoD enterprise-wide capabilities for communities of interest, e.g., warfighting, business, and intelligence, that exploit the GIG for improved decision-making"
- 5. Strategic Goal 5: "Deliver capabilities, based on established requirements, more effectively, economically and efficiently than we do today"

Net-Centric Enterprise Services (NCES) supports DISA's Strategic Goals one (1), three (3), and four (4) by enabling Community of Interests (COI's) applications and users the ability to exchange information across the enterprise. NCES supports DISA's Strategic goal two (2) by allowing authorized users access to the Global Information Grid (GIG) superhighway. NCES supports DISA's Strategic goal five (5) by providing periodic program reviews to allow feedback from its users and stakeholders to understand any issues with NCES in providing its services. This feedback enables NCES to correct any deficiencies and improve its services. This program element is under Budget Activity 7 because it supports operational systems development.

Accomplishments/Planned Program:

SOA Foundation	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	$\overline{17.71}$ 9	2.909	4.156	0.000

SOA Foundation - The SOA Foundation offers interoperable net-centric services that enable programs across the Department of Defense (DoD) to share services-based applications and information across the GIG, which results in a reduction in cost and development effort. The core services for the SOA Foundation include information assurance/service security, service discovery, enterprise service management, machine-to-machine messaging, mediation, metadata discovery, and people and device discovery. Because Milestone B will not occur until late FY2007, acquisition

Exhibit R-2, RDT&E Budget Item Justification	DA:	DATE: December 2006					
APPROPRIATION/BUDGET ACTIVITY R-1 ITEM NOMENCLATURE							
RDT&E, Defense-Wide/07	Net	Net-Centric Enterprise Services (NCES)/PE 0303170K					
COST (in Millions)	FY08	FY09	FY10	FY11	FY12	FY13	
Net-Centric Enterprise Services (NCES)/T57	43.424	9.490	9.758	9.950	9.950	9.950	

of the SOA Foundation will occur in FY2007. Therefore, funding allocated to SOA Foundation in FY2006 will be executed for the managed service provider contract award late FY2007 and to support testing of SOAF capabilities. In FY2007, funds will be used to deliver enterprise SOA Foundation services. This will be done by both commercial and government Managed Service Providers (MSPs). The commercial MSPs will acquire Commercial-off-the-Shelf (COTS) software solutions and interface them into a group of services that will satisfy NCES standards and specifications. FY2007 funds will also be used to ramp up the commercial SOA Foundation services up to the initial set of anticipated service usage by late FY2007. This ramp up consists of acquiring additional software licenses and support personnel. FY2008 funds will be used to deliver enterprise SOA Foundation services from both the commercial and government MSPs, to support the program for an upcoming Milestone C decision and an Initial Operational Test & Evaluation (IOT&E) starting late FY2008. FY2009 funds will support SOAF services until transition to complete FOC. Since Milestone B will not occur until late FY2007, contractual dollars will not be awarded until late FY2007 for the managed service provider (MSP).

Content Discovery and Delivery	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	10.72	0.000	2.541	0.000

Content Discovery and Delivery (CD&D) - The CD&D services are essential in the DoD infrastructure to provide common specifications to expose, search, retrieve, and deliver information across the enterprise. CD&D provides the methodology, specifications, user interfaces, and services to support discovery, and efficient delivery of information. CD&D services provide the capability to perform federated search, enterprise catalog, data source integration, and enterprise delivery of content. Similar to the core enterprise service SOAF, MS B will be awarded late FY2007, resulting in FY2006 funds being carried over for the acquisition of CD&D managed services, which will occur in FY2007. In FY2007, funds will be used to deliver a set of integrated enterprise CD&D services. This will be done by both commercial and government Managed Service Providers (MSPs). The commercial MSPs will acquire Commercial-off-the-Shelf (COTS) software solutions and interface them into a group of services that will satisfy NCES requirements. The government MSPs will modify their existing solutions to ensure that they satisfy NCES requirements. FY2007 funds will also be used to ramp up the commercially managed enterprise CD&D services. This ramp up consists of acquiring additional software licenses and support personnel. FY2008 funds will be used to deliver enterprise CD&D services to support the program for an upcoming Milestone C decision and Initial Operational Test & Evaluation (IOT&E) in FY2008.

Exhibit R-2, RDT&E Budget Item Justification					DATE	: December	2006			
APPROPRIATION/BUDGET ACTIVITY					R-1	ITEM NOMENO	CLATURE			
RDT&E, Defense-Wide/07				1	Net-	-Centric Ent	erprise Ser	rvices (NCES	S)/PE 03033	L70K
COST (in Millions)	FY06 FY07 F						FY10	FY11	FY12	FY13
Net-Centric Enterprise Services (NCI	ES)/T57	74.511	28.522	43.42	24	9.490	9.758	9.950	9.950	9.950
Collaboration	FY 06 FY 0						FY 08		FY 09	
Subtotal Cost	4 150		-	4 075			8 954		0 000	

Collaboration - The DoD Enterprise Collaboration service provides collaboration and messaging capabilities such as white board and conferencing sessions, messaging and a variety of collaboration tools, i.e., session management, presence and awareness, audio, video, text, annotation, application sharing and broadcasting, and virtual spaces. An enclave solution for the Collaboration service is also provided separately to coalition partners since they operate on separate secure networks and are not connected to the SIPRNet or NIPRNet. In FY2006, collaboration efforts utilized two service providers. With the first collaboration effort awarded, the second collaboration effort will be awarded late FY2007. Funds will also be used to provide initial and final incremental enhancements to the service to support the program for an upcoming Milestone C decision. FY2007 funds will be used to purchase additional user licenses to support user ramp up to the anticipated NCES user load. Funds in FY2007 will also provide incremental enhancements to the enterprise collaboration service. FY2008 funds will be used to acquire additional user licenses to support an increase in the number of collaboration users. FY2008 funds also provide enhancements to collaboration services for an upcoming Milestone C decision and Initial Operational Test & Evaluation (IOT&E) in FY2008.

Portal	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	6.900	2.792	4.736	0.000

Defense Knowledge Online (DKO) Portal - The DKO Portal provides a personalized, user-defined, web-based presentation that allows for secure access to various enterprise services, including retrieval and posting of information, collaboration tools, instant messaging, and workgroups. The DKO Portal also integrates with security services for increased security and administration. The DKO Portal provides end user access to NCES services as well as providing a platform to launch NCES services directly from customer owned portals. The DKO Portal has several fundamental features, including a single sign on access point, Find, and Metadata Discovery. FY2006 funds were used to begin the transition to the DKO portal. This transition requires modification to the current AKO portal so that it satisfies NCES's portal requirements. FY2007 funds also used to support the continuing transitioning of the DKO portal, while continuing to support the ramp up of enterprise services from FY2006. Incremental enhancements to the portal capabilities will also be supported by FY2007 funds. In FY2008, funds will be used to support any enterprise enhancements needed to complete the transitioning of the Army Knowledge Online and Defense Online Portal to the DKO portal. These enhancements will ensure that the DKO portal satisfies NCES's enterprise portal requirements. Enhancements also support NCES services for the Milestone C decision in FY2008 and an Initial Operational Test & Evaluation (IOT&E) in FY2008.

Exhibit R-2, RDT&E Budget Item Justification		DATE: December 2006						
APPROPRIATION/BUDGET ACTIVITY				ITEM NOMEN				
RDT&E, Defense-Wide/07					terprise Sei			
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Net-Centric Enterprise Services (NCES)/T57	74.511	28.522	43.424	9.490	9.758	9.950	9.950	9.950
Early Capabilities Baseline FY 06 Subtotal Cost 14.52		I	<u>FY 07</u>		<u>FY 08</u> 8.876		FY 09 0.000	
Subtotal Cost 14.52	2	(5.649		8.876		0.000	
Early Capabilities Baseline (ECB) - DISA wil	ll field	an initi	al set o	f capabilit	ies, the Ea	rly Capabil:	ities Base	line
(ECB), based on the capabilities demonstrate	ed in Hor	rizontal	Fusion a	nd Net Cent	ric Capabil:	ities Pilot	(NCCP)	
demonstrations, until the transition to mana	aged serv	vice prov	iders. E	CB services	generate fa	amiliarity,	evaluation	n,
experimentation, and demonstration of NCES s			_					
interest. In FY2006 funding was used to field		_						
funds will be used to transition from the EC	CB pilot	capabili	ties to	those provi	ded by manag	ged service	providers	•
Test and Evaluation $FY 06$ Subtotal Cost 6.130		<u>I</u>	<u>5.584</u>		FY 08 5.549	:	FY 09 3.478	
Subtotal Cost 6.130		Ĩ	5.584		5.549		3.478	
Test and Evaluation - Test and Evaluation in contractor demonstrations prior to contract of testing; and a series of early user tests individual services and products, or groups user defined capabilities. Test and Evaluation interoperability and security. An independent products to the Enterprise to support the Full combine personnel from DISA and the Seme efficiencies across each test opportunity. Tests, and Operational Tests to verify the exapabilities described in the Capability Devarequire for proposals, development of user example development of the Test and Evaluation Master testing, developmental and interoperability and Environment (IOT&E) will occur. FY2009	award; of service operative of service operative velopment evaluation testing,	developme that inte ces and includes tional Te pyment De trational and FY2 eness and Documen on criter FY2007 and val	nt of a grate de products indepen st will cision R Test Ag 007, fun suitabit (CDD). ia for s funds suidation	stable and velopmental that meet dent certified conducte eview (FDDR encies (OTA ds are used lity of the FY2006 fun ource selec pport secur of MSP serv	robust user and operations for cations for the NCES s) to maximute support managed settion demonstry certificities. In Figure 2 of the content of the cation	group to suional events specificat: r required: full release Integrated ize expertis Early User rvices to put to support tration and cation, accurated	upport all s to confi- ions and en items, such e of service Test Team se and Tests (EU rovide the t review on to support reditation al Operation	levels rm nable n as ces and (ITT) I), Beta f MSPs t the
PMO Acquisition FY 06		<u>I</u>	<u>FY 07</u> 2.674		FY 08		FY 09	
Subtotal Cost 8.790		2	2.674		2.740		0.000	

Exhibit R-2, RDT&E Budget Item Justification	DA	DATE: December 2006					
APPROPRIATION/BUDGET ACTIVITY R-1 ITEM NOMENCLATURE							
RDT&E, Defense-Wide/07	Ne	Net-Centric Enterprise Services (NCES)/PE 0303170K					
COST (in Millions)	FY08	FY09	FY10	FY11	FY12	FY13	
Net-Centric Enterprise Services (NCES)/T57	43.424	9.490	9.758	9.950	9.950	9.950	

PMO Acquisition - This task area includes all management oversight, fiscal control, contract management, budgeting, program support, and strategic operations to include planning and communications, program reporting, and program documentation to include the Economic Analysis (EA), Cost Analysis Requirements Description (CARD), System Engineering Plan (SEP), Program Protection Plan (PPP), Information Assurance Strategy (IAS), Acquisition Program Baseline (APB), Acquisition Strategy (AS), Information Support Plan (ISP), Capability Development Document (CDD), and the Concepts of Operations (CONOPS). In FY2006, funds were used to complete Milestone B documentation in preparation of achieving Milestone B for Portal and Collaboration in FY2006. FY2007, funding will be used to complete Milestone B documentation for SOAF and CD&D enterprise services and to provide updates to Milestone B documentation to satisfy exit criteria and transition to Milestone C by compiling and completing all Milestone C documentation. FY2008 funds will be used to support the functionary reporting of program documentation for milestone review, market research to support technical solutions for NCES services, program branding efforts for external communications, program control activities to ensure consistent and updated document control, and the initiation of all of the statutory and regulatory documentation.

PMO Engineering	FY 06	FY 07	FY 08	FY 09
Subtotal Cost	5.580	3.840	5.872	6.012

PMO Engineering - PMO Engineering consists of support for engineering analysis, user outreach, and management support (including technical specifications, performance requirements, interface definitions, PWS, MOAs, SLAs, services framework, requirements management, baseline configuration management (CM), technology trend analysis, operations performance monitoring, services consumer modeling). FY2006 through FY2008 funds are used for writing Performance Work Statements (PWS)/Service Level Agreements. FY2009 funds will be used for the incremental enhancement of NCES capabilities.

Exhibit R-2, RDT&E Budget Item Justification	DA	DATE: December 2006						
APPROPRIATION/BUDGET ACTIVITY	R-	R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/07	Ne	Net-Centric Enterprise Services (NCES)/PE 0303170K						
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Net-Centric Enterprise Services (NCES)/T57	43.424	9.490	9.758	9.950	9.950	9.950		

B. Program Change Summary:

	FY 06	FY 07	FY 08	FY 09
Previous President's Budget	77.037	28.630	30.042	25.790
Current Submission	74.511	28.522	43.424	9.490
Total Adjustments	-2.526	-0.108	13.382	-16.300

Change Summary Explanation:

The Net-Centric Enterprise Services (NCES) program built the Presidents Budget FY2007 (PB07) with the intention of developing four (4) product lines to provide capabilities to the warfighter, business, and intelligence mission areas. The four (4) product lines consist of the following:

- 1. Service Oriented Architecture (SOA) Foundation
- 2. Content Discovery & Delivery (CD&D)
- 3. Enterprise Collaboration
- 4. DoD Enterprise Portal

Since the PB2007 submission, the NCES program had a change in acquisition strategy which was to provide the best capabilities to the Communities of Interests (CoIs) as well as all DoD users. This strategy supports the adopt, buy and build concept where adoption of government proven capabilities is primary choice, and buying of commercial service is the secondary option while building is the last option where the government develops and sustains the capabilities. For the PB2007 submission, the program relied heavily on Research, Development, Testing and Evaluation (RDT&E) and Procurement funding to the build strategy. With the current acquisition strategy, the program will acquire government or commercial providers for required enterprise services. The funding profile to support this acquisition strategy shifts from RDT&E to Operations and Maintenance (O&M) after FY2008. The program funding profile for FY2006-2008 requires the RDT&E and Procurement to aid government and commercial service providers with initial ramp-up of infrastructure to support the anticipate user growth, scheduled to occur at various time instances. These funds support refresh of hardware, licenses, and software for each product line. The increase of RDT&E in FY2008 is required to support the Initial Operational Test and Evaluation and Milestone C requirements in FY2008. At Initial Operational Capability (late FY2008), the funding will require O&M to sustain the services.

Exhibit R-2, RDT&E Budget Item Justification	DA	DATE: December 2006						
APPROPRIATION/BUDGET ACTIVITY	R-	R-1 ITEM NOMENCLATURE						
RDT&E, Defense-Wide/07	Ne	t-Centric En	terprise Se	rvices (NCES	S)/PE 03033	170K		
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Net-Centric Enterprise Services (NCES)/T57	43.424	9.490	9.758	9.950	9.950	9.950		

C. Other Program Funding Summary:

	FY 06	FY 07	FY 08	FY 09	<u>FY 10</u>	FY 11	FY 12	FY 13	To Complete	Total Cost
Procurement, DW	0.000	24.852	10.836	20.657	0.000	0.000	0.000	0.000	58.345	58.345
O&M, DW	23.079	28.013	28.969	86.867	113.852	117.207	116.546	116.459	Contg	Contg

D. Acquisition Strategy:

NCES Program's acquisition approach is to adopt proven specifications, best practices, standards, and interface definitions to acquire new managed service providers (MSP) through a variety of acquisition mechanisms. NCES will use performance-based services and acquisition practices and incorporate commercial standards, performance specifications, and interface definitions to acquire NCES capabilities from selected commercial and government managed service providers. The NCES services will be network-based services or applications delivered, hosted by a managed service provider in accordance with Performance Work Statements(PWS)/Service Level Agreements (SLA) established between DISA and the managed service providers. The NCES PWSs/SLAs are agreements that will describe the particular service in terms of an agreed-upon quality for a specific quantity and duration. The PWSs/SLAs will also constrain the demands users may place upon the service to those limits defined by the contract. PWSs/SLAs are derived from the Capabilities Development Document (CDD) specified user requirements. As a key part of the managed service provider contracts, PWSs/SLAs contain more detail, describe incentives for meeting thresholds, and specify incentives for meeting performance and Quality of Service requirements. Quality Assurance Plan (QAP)/Quality Assurance Surveillance Plan(QASP) will be captured as part of the PWSs/SLAs. The acquisition approach also enables rapid fielding of low to moderate risk capabilities to meet operational need and provide value to the end-user. To achieve rapid deployment of the NCES portfolio, the NCES acquisition approach is based on the following principles:

- NCES will acquire managed services
 - o Acquiring services as a commercially/government managed service with appropriate PWS/SLA
 - o Requiring commercial standards, specifications, and interface definitions for services as appropriate
 - o Employing continuous user feedback to refine PWSs/SLAs when practical (i.e., renewing an option year) to ensure operational effectiveness and suitability

Exhibit R-2, RDT&E Budget Item Justification	DA'	DATE: December 2006						
APPROPRIATION/BUDGET ACTIVITY R-1 ITEM NOMENCLATURE								
RDT&E, Defense-Wide/07 Net-Centric Enterprise Services (NCES)/PE 0303170K							170K	
COST (in Millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Net-Centric Enterprise Services (NCES)/T57	43.424	9.490	9.758	9.950	9.950	9.950		

- Service Providers are responsible for full life cycle support
 - O Resourcing service infrastructure
 - o Providing operational support (e.g., Managed Service Help Desk, training, and maintenance)
 - o Providing technology refresh
- Defense Information Systems Agency (DISA) will field an initial set of capabilities, the Early Capabilities Baseline (ECB), based on the capabilities demonstrated in Horizontal Fusion and Net Centric Capabilities Pilot (NCCP) demonstrations, until the transition to managed services. The NCES Program will be responsible for the following ECB activities:
 - o Sustain ECB capabilities during transition to managed service providers
 - o Developing a transition plan identifying when ECB service versions will be discontinued
- O Providing guidance and support that will enable ECB consumers to migrate to managed service providers The benefits of the NCES acquisition approach include:
 - Providing immediate operational availability of existing capabilities at Milestone B
 - Delivering full operational Increment 1 capabilities faster than the traditional acquisition approach
 - Shifting investment risk to service providers in an evolving technology market
 - Enabling accountability and service delivery through the use of SLAs and performance-based services acquisition procedures
 - Enabling agility in selecting service capabilities

E. Performance Metrics:

The NCES Capability Development Document (CDD) defines the NCES Capabilities and their Performance attributes. These Performance attributes form the Performance Baseline for NCES. The NCES Modeling and Simulation effort will utilize among other sources, performance data collected from test and evaluation activities in the pilot and test environments to demonstrate that the NCES capabilities can achieve the NCES Performance Goals.

For each capability there are three (3) general performance categories of metrics: Availability, Response Time, and Maximum Load. Availability is the amount of time that the service is available to provide services. Response Time is a capability-specific measure of service responsiveness or latency. Maximum Load is a composite measure of how many users, throughput, or data that a service can handle and still be effective to each capability that is used to describe

Exhibit R-2, RDT&E Budget Item Justification				DATE: December 2006						
APPROPRIATION/BUDGET ACTIVITY R-1 ITEM NOMENCLATURE										
RDT&E, Defense-Wide/07 Net-Centric Enterprise Services (NCES)/PE 0303170					170K					
COST (in Millions) FY06 FY07 FY08 FY09 FY10 FY11 FY12 FY1						FY13				
Net-Centric Enterprise Services (NCES)/T57	74.511	28.522	43.424	9.490	9.758	9.950	9.950	9.950		

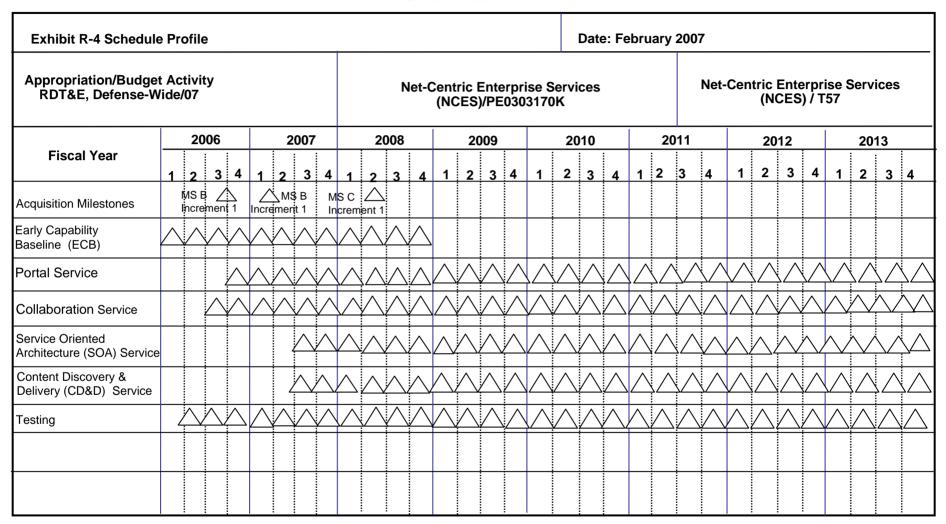
the predicted loading for Increment I.

To improve mission performance, NCES has developed five (5) key performance management metrics as part of its mission to improved performance levels. These metrics are program performance metrics designed to rapidly identify and fix problems associated with NCES PMO activities, thereby providing maximum support to the warfighter. The NCES program performance metrics are independent and provide the NCES Program Management Office with the insight needed to transform the program as necessary. The NCES Program Performance Metrics are:

- 1. Customer Perspective-measures how NCES Services provide capabilities to the customer. The major factors of performance related to customer satisfaction include: service delivery and availability, and customer assistance/help desk services. Customers will evaluate overall usefulness, responsiveness, supportability, and derived benefits.
- 2. Financial Perspective-measures how well NCES is managing program investments. This metric evaluates the NCES Program, Planning, Budgeting and Execution (PPBE); and economic measures such as Internal Rate of Return (IRR), Payback Period, Net Present Value (NPV), and Return on Investment (ROI) in accordance with the Clinger-Cohen Act of 1996.
- 3. Requirements Satisfaction-provides an assessment of how the program is meeting requirements listed in the NCES Capabilities Development Document (CDD). The NCES PMO will assess scaling of required capabilities, identify baselines and lay the foundation for the integration of requirements as part of an acquisition plan through the NCES life cycle.
- 4. Contractor Performance-measures how effectively NCES service providers are meeting service level agreements. The NCES PMO will require recurring performance reporting by the managed service providers, and will designate an Enterprise Service Management (ESM) service provider to provide independent verification and validation of service performance. Where practical, NCES program management support and managed service contracts will use Earned Value Management (EVM) or tailored Earned Value Management-like (EVM-like) methods. These methods will monitor relevant cost, schedule, and performance aspects of contracted services and include periodic In-Process Reviews (IPRs).
- 5. Internal Process Perspective measures the effectiveness of the PMO in performing its program control and execution functions. This metric will focus on program management, ensuring NCES will meet its mission objectives in a timely and effective fashion. This will be accomplished by utilizing the continuous improvement process which incorporates results from strategic goals such as the Balanced Scorecard.

Exhibit R-3 Cost Ana	lysis				DA'	DATE: December 2006						
APPROPRIATION/BUDGET RDT&E, Defense-Wide/		N∈	R OGRAM EL et-Centrio ICES)/ PE	c Enterp		vices		PROJECT NAME AND NUMBER Net-Centric Enterprise Services (NCES)/T5)/T57
Cost Category	Contract Method & Type	Performing Activity (Location	-	CY 07	CY 07 Award Date	FY 08 Cost	FY 08 Award <u>Date</u>	FY 09 Cost	FY 09 Award <u>Date</u>	Cost to Complete	Total Cost	Target Value of Contract
Service Oriented Architecture Foundation Service	C/FFP MIPR	TBD CSD	9.444	2.236	Jan-07	2.263	Jan-08			Cont.	Cont.	17.759 6.669
	C/CPFF MIPR	Various JEDS	1.681 1.850	0.673		1.893	Jun-08			Cont.	Cont.	3.710 3.760
	MIPR C/FFO	TBD SOLERS	1.500 1.360							Cont.	Cont.	1.500 1.360
Remarks	C/CPFF Because Mi	BAH lestone B w	1.884 vill not occ	ur until	late FY2007	', \$17.719M E	FY2006 fund	ds must l	oe carrie	Cont. d over and e	Cont. xecuted in	1.884 FY2007.
Content Discovery and Delivery Service	MIPR MIPR	GCCS-AF Intelink	2.000			2.000	Mar-08			Cont.	Cont.	7.496 6.496
	MIPR C/FFP	CSD Various	2.740			.541				Cont.	Cont.	2.501 1.503
Remarks	C/CPFF Because Mi	TBD	2.000	ur until :	late FY2007	7, \$10.72M FY	Y2006 fund:	s must be	e carried	Cont.	Cont.	.231 FY2007.
Collaboration Service	C/CPFF C/FFO	Various IBM	4.150	1.983 1.160	Various Jul-07	.928 2.792	Various Jul-08			Cont.	Cont.	7.132 3.952
Remarks Portal Service	C/FFO Second But C/CPFF	TBD ton capabil SRA	ity will be	.932 awarded	Jun-07 FY2007. \$1	5.234 903M Collab	Jun-08 coration F	72006 fur	nds must	Cont. be carried or Cont.	Cont. ver to FY2 Cont.	5.452 007. 4.239
	C/FFO MIPR MIPR	TASC Army CSD	2.845	1.613 1.179	Jan-07 Oct-06	3.557 1.179	Jan-08 Oct-07			Cont. Cont. Cont.	Cont. Cont.	7.608 2.247 3.329
Remarks												
Early Capabilities	C/FFO	Merlin	1.503	1.335	Jan-07	1.335	Jan-08			Cont.	Cont.	4.706

Exhibit R-3 Cost Anal	lysis				DA	DATE: December 2006						
APPROPRIATION/BUDGET RDT&E, Defense-Wide/0		Ne	ROGRAM ELE et-Centric ICES)/ PE	: Enterp		vices		PROJECT NAME AND NUMBER Net-Centric Enterprise Services (NCES)/T57				
Cost Category	Contract Method & <u>Type</u>	Performing Activity & Location	-	CY 07	CY 07 Award Date	FY 08 Cost	FY 08 Award Date	FY 09 Cost	FY 09 Award Date	Cost to Complete	Total Cost	Target Value of Contract
Baseline										Cont.	Cont.	
	C/FFO C/CPFF	SOLERS BAH	4.853 2.316							Cont.	Cont.	15.314 7.842
	C/FFO	SAIC	2.212							Cont.	Cont.	6.451
	MIPR	CSD	3.638	3.823	Oct-06	3.824	Oct-07			Cont.	Cont.	44.713
Remarks	C/CPFF \$1.449M Mi	Various ssion effor	t FY2006 fu	1.490 nds must k	Various be carried	3.717 over to FY20	Various)07 to meet	future	program n	Cont. eeds.	Cont.	14.706
Test and Evaluation PMO Acquisition	C/FFO MIPR	Various DISA-JITC	3.422 2.708	2.841 2.743	Various Oct-06	2.791 2.758	Various Oct-07	.695 2.783	Various Oct-08	Cont.	Cont.	10.769 74.631
PMO Engineering	C/FFO C/CPFF C/FFO	Various DSA Various	3.576 5.214 1.530	2.674	Various Various	2.740	Various Various	2.384	Various	Cont. Cont. Cont.	Cont. Cont. Cont.	3.914 15.832 1.778
Total	C/FFO	MITRE	4.050 74.511	3.628 28.522	Oct-06	3.628 43.424	Oct-07	3.628 9.490	Oct-08			92.354



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Exhibit R-4a Schedule Detail			DATE: September 2006							
APPROPRIATION/BUDGET ACTIVITY	PROGRAM		·			PROJECT NAM				
RDT&E, Defense-Wide/07			rise Servio	ces (NCES)/		Net-Centric	Enterprise	Services		
	PE 03031					(NCES)/T57				
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013		
Milestone B Decision (Increment 1) Portal and Collaboration Product Line	3Q									
Milestone B Decision (Increment 1) SOAF and CD&D Product Line Milestone C Decision (Increment 1)		2Q	2Q							
Early Capability Baseline (ECB) Limited Availability for Early Adopters	1-3Q									
Transition to Managed Services	4Q	1-4Q	1-4Q							
Portal Service Portal Day Defense Online Capability Transition to Defense Knowledge Online (DKO) Incrementally Enhance	1Q 2-4Q	1-40	1-4Q							
Collaboration Service Industry Day Release RFQ 1 st Service Award Contract 1 st Service Limited Operational Availability Incrementally Enhance Release RFQ 2 nd Button Award Contract 2 nd Button	1Q 1Q 4Q 4Q	1-4Q 1Q 3-4Q	1-40	1-4Q						

Exhibit R-4a Schedule Detail			DATE:	DATE: September 2006						
APPROPRIATION/BUDGET ACTIVITY	PROGRAM	ELEMENT	•	_		PROJECT NAM	E AND NUMBE	iR.		
RDT&E, Defense-Wide/07	Net-Cent	tric Enterp	rise Servi	ces (NCES)/		Net-Centric	Enterprise	Services		
	PE 03033	170K				(NCES)/T57	_			
	·									
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013		
Service Oriented Architecture										
(SOA) Service										
Industry Day	2Q									
Release Request for Proposal	-2	2Q								
(RFP)		- &								
Award Contracts		4Q								
Limited Operational Availability		40	1-40	10						
		~	~	~						
Content Discovery & Delivery										
(CD&D) Service										
Industry Day	2Q									
Release RFP		1Q								
Award Contracts		2Q								
Limited Operational Availability		2-4Q	1-4Q							
Testing										
Early User Test(EUT) 1	1-4Q	1Q								
EUT 2		1-2Q								
EUT 3		2-3Q								
EUT 4		3-4Q	1-2Q							
Operational Test Readiness Review (OTRR)		1-4Q	1-4Q							
Operational Test (OT)			3-4Q							
Modeling and Simulation Testing	1-40	1-4Q	1-4Q	1-4Q	1-40	1-4Q	1-40	1-4Q		
J	~	~	~	~	~	~	~	~		
I										

Defense Information Systems Agency FY 2006/FY 2007 Program and Budget Review R-5 Exhibit

Termination Liability Funding For Major Defense Acquisition Programs RDT&E Funding (\$000)

Program FY 2006 FY 2007 FY 2008 FY 2009 FY 2010 FY 2011 FY 2012

Net-Centric Enterprise Services (NCES) PE0303170K

- 1. The government may terminate a contract based on convenience by providing the contractor with a written notice within a specified number of days. The preliminary notice will include an issue to stop future work on the current contract. The government follows FMR guidance as determined by specified contract.
- 2. If the government exercises this option, the termination measure will be in concordance with those measures as set forth by GSA Schedules and IDIQ contracts.
- 3. The total termination contract value will be determined by a mutual agreement between the contractor and the government.

Exhibit R-2, RDT&E Budget Item Justification				DATE: February 2007					
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07				R-1 ITEM NOMENCLATURE Teleport Program / PE 0303610K					
COST (in millions)	FY06	FY07	FY08	8	FY09	FY10	FY11	FY12	FY13
Teleport Program /NS01	7.078	14.370	5.79	8	2.073	2.167	2.231	2.310	2.309

A. Mission Description and Budget Item Justification:

The Teleport investment is driven by requirements validated by the Joint Chiefs of Staff and is linked with the Defense Information Systems Agency (DISA's) core strategic goal to transition to a net-centric environment to transform the way Department of Defense (DoD) shares information by making data continuously available in a trusted environment. The Teleport system and its capabilities support the Agency's transformational initiatives/goals and the President's Management Agenda by enabling effective communications for the warfighter by early implementation of net-centric capability; enhancing the capability and survivability of space systems and supporting infrastructure; and continuing to develop a joint interoperable Networks and Information (NII) architecture. Teleport will provide seamless access to the Defense Information System Network (DISN) and Global Information Grid (GIG), which supports the Department of Defense (DoD), Joint Staff, and DISA goals associated with Command, Control, Communications, Computers and Intelligence (C4I) for the Warrior, and Joint Vision 2020, by providing a global, secured interoperable information transport infrastructure. The RDT&E funding in this Program Element (PE) provides for system design and engineering, program management, and testing for development of the Teleport System to accomplish Critical Design Reviews (CDRs) to conduct Development Test and Evaluation and Follow-On Operational Test and Evaluation. This PE is under Budget Activity 07 because it supports operational systems development.

The DoD Teleport is a Satellite Communications (SATCOM) gateway that links the deployed warfighter to the sustaining base. It provides high-throughput, multi-band, and multi-media telecommunications services for deployed forces of all Services, whether operating independently or as part of a Combined Task Force (CTF) or Joint Task Force (JTF), during operations and exercises. The DoD Teleport provides centralized integration capabilities, contingency capacity, and the necessary interfaces to access the DISN in a seamless, interoperable, and economical manner. DoD Teleport is an upgrade of satellite telecommunication capabilities at selected Standardized Tactical Entry Point (STEP) sites. This upgrade represents a ten-fold increase to the throughput and functional capabilities of those sites. The Teleport system will provide deployed forces with interfaces for multi-band and multimedia connectivity from deployed locations to online DISN Service Delivery Nodes (SDN) and GIG information sources and support. The system will greatly improve the interoperability between multiple SATCOM systems and deployed warfighters.

Teleport is being deployed incrementally in a multi-Generational FY 2001 through FY 2012 program. Generation One will field capabilities for four Initial Operational Capabilities (IOC) events. IOC 1 implemented C, X, and Ku band Satellite Earth Terminals and associated baseband equipment at six sites to allow for a deployed warfighter anywhere between certain latitudes to be able to communicate with two Teleport sites. In November 2006, IOC 2 implemented Ultra

Exhibit R-2, RDT&E Budget Item Justification					DATE: February 2007				
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE					
RDT&E, Defense-Wide/07				Teleport Program / PE 0303610K					
COST (in millions) FY06 FY07 FY0				FY09	FY10	FY11	FY12	FY13	
Teleport Program /NS01	7.078	14.370	5.79	8 2.073	2.167	2.231	2.310	2.309	

High Frequency (UHF) Satellite Earth Terminals and associated baseband equipment at four sites. IOC 3 will implement additional C, Ku, UHF, and protected communications (Extremely High Frequency (EHF)) Satellite Earth Terminals and associated baseband equipment at six sites. This will allow the deployed warfighter access to three Teleports from any location between certain latitudes. IOC 4 will complete the Generation One build-out by integrating military Ka SATCOM capabilities into five Teleport locations. Generation One, IOC 1 reached completion in March 2004. IOC 2 reached completion in November 2006. IOC 3 will be completed early FY 07. IOC 4 will be completed in FY08.

Generation Two will add additional military Ka band capacity and will introduce Internet Protocol (IP) net-centric communications to the sites. Net-Centric communications allow for the use of Internet Protocol (IP) for enhanced network interoperability and enable dynamic satellite bandwidth allocation to reduce satellite lease costs and increase overall performance. Generation Two will also provide Ka band capacity increases at six sites; it will provide IP capability at six sites; it will provide Ka band SATCOM terminals at six sites. Generation Three is envisioned to focus on advanced SATCOM systems to include the Future Wideband Systems, Advanced EHF, Mobile User Objective System (MUOS), and the Transformational Communications Architecture (TCA). Generation Three will also focus on increasing net-centric communications with technology refresh of the older communications equipment suites. Teleport Full Operational Capability (FOC) will be achieved with the final implementation scheduled for completion in FY 2012 which will allow for seamless capability, tying together the Transformational Satellite (TSAT) and the Global Information Grid-Bandwidth Expansion (GIG-BE) for global, net-centric capability.

The DoD Teleport Program is a Major Automated Information System (MAIS) ACAT-1AM program with the Assistant Secretary of Defense for Networks Information Integration (ASD (NII)) serving as the Milestone Decision Authority (MDA). ASD (NII) Designation Memorandum dated 05 May 2000 identifies the Defense Information Systems Agency (DISA) as the Executive Agent (EA) for the DoD Teleport Program. The system will satisfy Joint Requirements Oversight Council (JROC) validated operational requirements. The Teleport Program Office (TPO) received Milestone C Authority to start procurement on 15 April 2002 for Generation One. In March 2006, the TPO received Milestone B Authority to begin procurement for Generation Two.

Exhibit R-2, RDT&E Budget Item Justification					DATE: February 2007					
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-Wide/07				R-1 ITEM NOMENCLATURE Teleport Program / PE 0303610K						
COST (in millions) FY06 FY07 FY0					FY10	FY11	FY12	FY13		
Teleport Program /NS01 7.078 14.370 5.7				8 2.073	2.167	2.231	2.310	2.309		

Accomplishments/Planned Program:

	FY06	<u>FY07</u>	<u>FY08</u>	FY09
Subtotal Cost	6.310	12.570	5.048	2.073

Systems Engineering & Program Management (SEPM): In FY 2006 the SEPM included limited requirements analysis, system design, Critical Design Reviews (CDRs), site designs, systems integration issue identification, Acquisition Strategy, and Acquisition Program Baseline (APB) development for Generation Two. For Generation One, the SEPM in FY06 provided continued support for the Working-level Integrated Product Teams (WIPTs), technical analyses and reporting, and logistics planning and reporting to implement IOC 2 UHF and IOC 3 EHF capability. In FY 2006, FY 2007, and FY 2008, Generation Two funding provides SEPM for limited program control mechanisms, continued development and maintenance of program documents, support to the Working-level Integrated Product Teams (WIPTs), technical analyses and reporting, and logistics planning and reporting to implement Ka band Satellite Earth Terminals and associated baseband equipment along with Internet Protocol (IP) net-centric communications to six sites. The SEPM in FY 2009 funds Teleport technology refresh including upgrades to (1) the net-centric baseband Performance Enhancing Proxies (PEPs), (2) modem software and firmware, and (3) EHF baseband hardware and software.

	FY06	<u>FY07</u>	<u>FY08</u>	FY09
Subtotal Cost	.768	1.800	0.750	0.000

Testing: In FY 2006 Teleport completed the secondary UHF Follow-On Operational Test and Evaluation (FOT&E). This effort consisted of interoperability certification and technical component testing. In FY 2006 and FY 2007 funding will be used to conduct the EHF Development Test & Evaluation (DT&E) and FOT&E. Testing activities also include updating the Test and Evaluation Master Plan (TEMP) for significant events and performance of customer acceptance tests. Additionally, the FY 2006 funds will be used to engineer and test X band converters, upgraded modem technology, upgraded UHF DISN services, the Teleport Management and Control System (TMCS) net-centric enhancements, and Defense Information Systems Network equipment for Generation One. In FY 2007 funds will be used to complete modem and UHF DISN testing. In FY 2007 and FY 2008, funds will also be used to start Generation Two testing for system integration and interoperability.

Exhibit R-2, RDT&E Budget Item Justification					DATE: February 2007				
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOM	IENCLATURE				
RDT&E, Defense-Wide/07				Teleport Program / PE 0303610K					
COST (in millions) FY06 FY07 FY06				FY09	FY10	FY11	FY12	FY13	
Teleport Program /NS01	7.078	14.370	5.798	3 2.073	2.167	2.231	2.310	2.309	

B. Program Change Summary:

	FY 06	FY 07	FY 08	FY09
Previous President's Budget	7.078	14.424	6.094	2.174
Current Submission	7.078	14.370	5.798	2.073
Total Adjustments	0.000	-0.054	-0.296	-0.101

Change Summary Explanation:

Changes are due to revised fiscal quidance.

C. Other Program Funding Summary:

	FY06	<u>FY07</u>	<u>FY08</u>	<u>FY09</u>	<u>FY10</u>	<u>FY11</u>	<u>FY12</u>	<u>FY13</u>	Cost to Complete	Total Cost
Procurement, DW	99.686	50.078	39.082	15.182	16.195	16.554	17.091	17.091	Contg	Contg
O&M	15.982	7.068	8.986	8.137	8.271	8.251	8.236	8.277	Contg	Contq

D. Acquisition Summary:

The DISA contracting office provides direct contracting support. Required assistance from other Departments including Army, Navy, and Air Force will be acquired via Military Interdepartmental Purchase Request (MIPR) for both their organic and contracted support.

E. Performance Metrics:

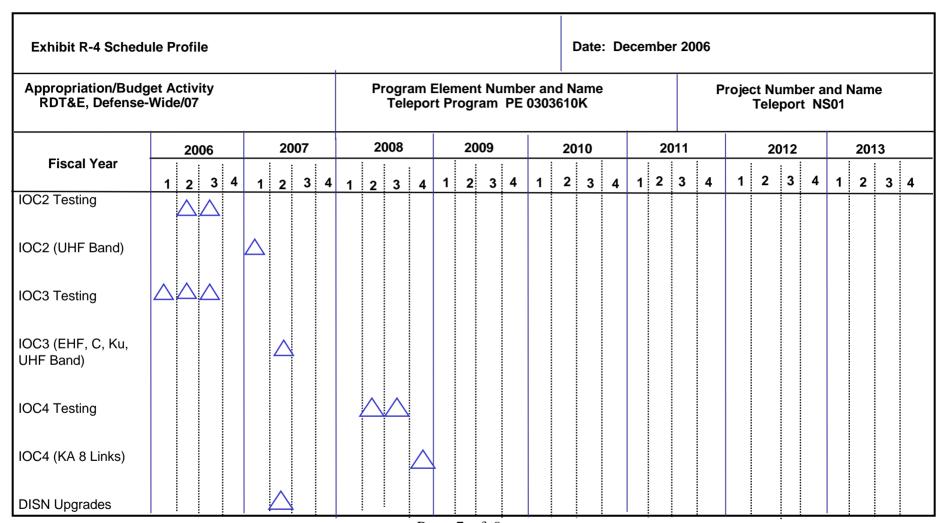
Teleport manages and tracks its cost, schedule, and performance parameters using an Earned Value Management-like approach, integrating the program plan, the program schedule and Work Breakdown Structure, and the financial data. Progress is monitored/documented monthly showing percentages complete of schedule and cost. Formal updates with changes to the schedule are documented against the program baseline.

Exhibit R-2, RDT&E Budget Item Justificat	ion			DATE: Febru	uary 2007			
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NO				
RDT&E, Defense-Wide/07				Teleport Pro	ogram / PE	0303610K		
COST (in millions)	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Teleport Program /NS01	7.078	14.370	5.79	8 2.073	2.167	2.231	2.310	2.309

Teleport delivered Generation One IOC 1 in March 2004, compared to a strategic goal delivery date of April 2004, i.e., ahead of schedule. IOC 1 was also delivered at the projected cost of \$110.7M, thus meeting the cost goal and it passed its Operational Test and Evaluation, meeting its performance objectives.

Teleport delivered the IOC 2 capabilities in November 2006 in accordance with the baseline. Teleport's schedule delivers IOC 3 capabilities on or before 31 March 2007 (threshold). Based on the Wideband Gapfiller Satellite launch schedule, IOC 4's revised baseline (threshold) is 31 March 2009.

Exhibit R-3 Cost	Analysis					DATE: F	ebruary'	2007				
APPROPRIATION/BUI	DGET ACTIVI	TY	PROGRAM	ELEMENT	•			PROJECT	' NAME AN	D NUMBER		
RDT&E, Defense-W:	ide/07		Teleport	Program	n / PE	0303610K		Telepor	t Progra	m / NS01		
Cost Category	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 07 Cost	FY 07 Award Date	FY 08 Cost	FY 08 Award Date	FY 09 Cost	FY 09 Award Date	Cost to Complete	Total Cost	Target Value of <u>Contract</u>
Technical Services Support Costs Contracted Systems Engineering and Program Management (SE/PM) Support	GSA Sched	Booz Allen & Hamilton Fairfax, VA	18.874	5.400	02/07	2.471	2/08	1.015	2/09	0	28.910	28.910
Contracted SE/PM Support	GSA Sched	Titan/L3	2.182	0.620	08/07	0.321	8/08	0.132	8/09	Contg	Contg	3.485
Contracted Systems Integration and Program Management Support	MIPR	STF-SPAWAR	1.000	1.004	07/07	0.566	7/08	0.232	1/09	0	3.298	3.298
Government Systems Engineering/Program Management Support	MIPR	US Army PM DCATS Fort Monmouth, NJ	7.398	3.426	Various	0.943	Various	0.387	Various	Contg	Contg	11.228
Government Systems Engineering/Program Management Support	MIPR	US Navy - SPAWAR San Diego, CA	6.796	2.120	Various	0.747	Various	0.307	Various	Contg	Contg	9.830
Test Support Government Test and Evaluation Support	MIPR	JITC, Ft. Huachuca	3.633	1.500	Various	0.650	Various	0.000		0	5.183	5.183
Other Government Test Support	MIPR	Various	.940	0.300	Various	0.100	Various	0.000		Contg	Contg	N/A
Total			40.823	14.370		5.798		2.073				



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Appropriation/Bud RDT&E, Defense	lget Ad e-Wide	ctiv e/07	ity							Pi	rogr Tel	am l epo	Eler rt P	nen rogi	t Nu ram	mbe PE	er ar 0303	nd Na 8610	ame K	!				P	roje	ct Nu Tele	ımb por	er a t NS	nd I S01	Nam	е	
		20	06			20	07			2	800			20	09			20 ⁻	10			20	11			20	12			20	13	
Fiscal Year	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	1	2	3	4
Generation Two Milestone B		Δ																														
Generation Two (Net-centric Capability) DT/OT&E Milestone C							Δ	\triangle			Δ																					
Generation Two (Ka & Net-centric Capability)												Δ																				
Tech Refresh Eng. & Test		Δ				Δ				Δ				Δ				Δ				\triangle										

Page 8 of 9 R-1 Line Item No. 199

Exhibit R-4a Schedule Detail		DATE	: Februar	y 2007				
APPROPRIATION/BUDGET ACTIVITY	PROGRAM ELEMENT				PR	OJECT NAM	E AND NUM	BER
RDT&E, Defense-Wide/07	Teleport Program /	PE 03036	510K		Te	leport /	NS01	
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
IOC2 Testing	2Q-3Q							
IOC2 (UHF Band)		1Q						
IOC3 Testing	1Q-3Q							
IOC3 (EHF, C, Ku, UHF Band)		2Q						
IOC4 Testing			2Q-3Q					
IOC4 (Ka 8 Links)			4Q					
DISN Upgrades		2Q						
Generation Two Milestone B	2Q							
Generation Two Milestone C(s)		3Q & 4Q						
Generation Two (Net-centric Capabilit Generation Two (Ka & Net-centric Capability) FOT&E	y DT/OT&E		3Q 4Q					
Tech Refresh Eng. and Test	20	2Q	2Q	2Q	2Q	2Q		

Exhibit R-2, RDT&E Budget Item Justification			Date	: February	2007			
APPROPRIATION/BUDGET ACTIVITY			R-1	ITEM NOMENO	LATURE			
RDT&E, Defense-Wide/07			Dist	ributed Com	mon Ground	/Surface Sy	ystems/PE (305208K
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Distributed Common Ground/Surface Systems (DCGS)/NF1	0.000	7.424	15.800	3.248	3.352	3.756	3.794	3.794

A. Mission Description and Budget Item Justification: The Joint Interoperability Test Command (JITC), as the sole joint interoperability certification agent, will establish and maintain a Distributed Development and Test Enterprise (DDTE) for the DoD Distributed Common Ground/Surface System (DCGS) Program. DCGS is an integral and critical component of the overall DoD Intelligence, Surveillance, and Reconnaissance (ISR) interoperability and data integration strategy. The DCGS provides world-wide ground/surface capabilities to receive, process, exploit, and disseminate data from airborne and national reconnaissance sensors/platforms and commercial sources. The ability for any user to discover, access, and understand the data are key tenets of network-centric operations which is the future of DCGS operations.

JITC will implement the DDTE providing DCGS an operationally relevant environment by establishing and maintaining connectivity between National Agency and Service facilities at unclassified, collateral, Sensitive Compartmented Information (SCI), and coalition levels. JITC will coordinate with the Services and Agencies on integrating modeling and simulation capabilities, and performing Joint/DCGS event coordination, configuration, and integration functions on the DDTE. This will enable improved systems engineering and test and evaluation throughout all phases of the DCGS life-cycle.

DCGS will use the DDTE to integrate architecture, standards, and capabilities for implementation of the DCGS Integration Backbone (DIB) and support the migration to net-centricity, including convergence with Net-Centric Enterprise Services (NCES), for the following DCGS programs: DCGS-Army (DCGS-A), DCGS-Navy (DCGS-N), Air Force DCGS (AF DCGS), and DCGS-Marine Corps (DCGS-MC). National Agency capabilities supporting DCGS including Imagery Intelligence (IMINT), Signals Intelligence (SIGINT), Measurement and Signature Intelligence (MASINT) and Human Intelligence (HUMINT) capabilities will also be integrated and tested in the DDTE. The DCGS programs will use the DDTE to improve / validate interoperability with the reconnaissance platforms and sensors, and integration into the Joint Command and Control environment.

JITC will develop a formal interoperability certification program and provide interoperability testing service to the DCGS program managers and the Office of the Under Secretary of Defense for Intelligence (OUSD(I)) to document interoperability test requirements, provide standards conformance and interoperability test capabilities, develop standards conformance and interoperability test planning documents, conduct standards conformance and interoperability test events, develop DCGS program reporting documents, and conduct joint interoperability certification. Standards addressed for DDTE will include those defined in coordination with DISA for Joint Command and Control (JC2) and NCES, as well as Common Data Link (CDL), Intelligence Broadcast System (IBS), National Imagery Text Format (NITF), LINK

Exhibit R-2, RDT&E Budget Item Justification			Date	: February	2007			
APPROPRIATION/BUDGET ACTIVITY			R-1	ITEM NOMENO	LATURE			
RDT&E, Defense-Wide/07			Dist	ributed Com	mon Ground	/Surface Sy	stems/PE 0	305208K
COST (in millions)	FY 06	FY07	FY08	FY09	FY10	FY11	FY12	FY13
Distributed Common Ground/Surface Systems (DCGS)/NF1	0.000	7.424	15.800	3.248	3.352	3.756	3.794	3.794

11/11B/16, United States Message Text Format (USMTF), Extensible Markup Language (XML), and Information Assurance (IA).

B. Program Change Summary:

	FY 06	FY 07	FY 08	FY 09
Previous President's Budget	0.000	7.451	15.960	3.281
Current President's Budget	0.000	7.424	15.800	3.248
Total Adjustments	0.000	-0.027	-0.160	-0.033

Change Summary Explanation:

FY 2007, FY 2008 and FY 2009 adjustments due to various pricing adjustments.

C. Other Program Funding.

									10	IULAI
	FY06	FY07	FY08	FY09	<u>FY10</u>	<u>FY11</u>	<u>FY12</u>	<u>FY13</u>	Complete	Cost
O&M, DW	0	1.197	2.388	.580	.585	.616	.593	.590	6.549	6.549

D. Acquisition Strategy. DCGS uses an evolutionary acquisition approach. JITC will support the effort by leveraging its existing three prime contracts, with multiple sub-contracts, to support this project. These competitively awarded, performance-based, non-personal-services contracts provide maximum flexibility for JITC supporting its' numerous customers for cost and technical effectiveness, and allows for expansion and contraction of staff years as workload expands and contracts. The current prime contractors that will support this effort are Northrop Grumman Mission Systems, Northrop Grumman Information Technology, and INTEROP Joint Venture.

E. Performance Metrics.

Number / Percentage of DDTE supported DCGS Systems/Capabilities

Number / Percentage of standard compliant DDTE supported DCGS System/Capabilities

Number / Percentage of Interoperability certified DDTE supported DCGS System/Capabilities

Number / Percentage of DDTE supported DCGS Systems/Capabilities achieved IOC

Exhibit R-3 Cost Anal	lysis				DATE	: Februa	ary 200	7				
APPROPRIATION/BUDGET	ACTIVITY	PROG	RAM ELEN	MENT			PROJ	ECT NAME	AND NU	MBER		
RDT&E, Defense-Wide/()7			Common 0305208K		urface	Dist	ributed	Common	Ground/Surf	ace Syst	ems/NF1
Test and Evaluation												
Cost Category	Contract Method & <u>Type</u>	Performing Activity & Location	Total PYs <u>Cost</u>	FY 07 Cost	FY 07 Award <u>Date</u>	FY 08 Cost	FY 08 Award <u>Date</u>	FY 09 Cost	FY 09 Award <u>Date</u>	Cost to Complete	Total <u>Cost</u>	Target Value of Contract
Engineering/Technical Services	FFP/LOE	Interop Ft. Hua, AZ	N/A	.493	10/06	5.029	10/07	1.083	TBD	Cont'g	Cont'g	Cont'g
	FFP/LOE	NGMS Ft. Hua, AZ	N/A	2.222	10/06	5.029	10/07	1.083	TBD	Cont'g	Cont'g	Cont'g
	FFP/LOE	NGIT Ft. Hua, AZ	N/A	.325	10/06	5.030	10/07	1.082	TBD	Cont'g	Cont'g	Cont'g
Subtotal Contracts				3.040		15.088						
In-House				4.384		.712		TBD				
Total Project				7.424		15.800		3.248				

Appropriation/Budg RDT&E, Defense-	et A Wid	ctiv e/07	ity ,						Dis	F strik	Prog	ram d C	omi	non	Gro	umb ounc 5208	er ai I/Sur K	nd N face	Name Sy	e sten	าร				Proje Dis ound	strib	ute	d Co	mm	on		<u> </u>
Fiscal Year		20	006			2	2007	7		2	800			20	009			20	010			20)11			20	12			20	013	
	1	2	3	4	1	2	3	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
DCGS T&E IPT						-		:				÷		÷						:				:		:	:	:				÷
Establishment of Infrastructure						<u> </u>	<u> </u>	<u> </u>																								
Connectivity to Other Testbeds & Test Event Conduct																																
O&M and Event													\vdash		<u>:</u>	•		<u>: </u>	<u>: </u>	:				<u> </u>		<u>: </u>	<u>:</u>	<u> </u>		<u> </u>	<u>: </u>	
Conduct																																

Exhibit R-4a Schedule I	Detail			DATE: Fe	bruary 20	07		
APPROPRIATION/BUDGET ACREMITED ACREM	CTIVITY	Distrib	ELEMENT uted Common (/PE 0305208K		ce Dis	JECT NAME AND 1 tributed Common tems/NF1		face
Schedule Profile	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	FY 2012	FY 2013
DCGS T&E IPT		1-4Q	1-40	1-4Q	1-4Q	1-4Q	1-4Q	1-4Q
Establishment of Infrastructure		1-4Q						
Connectivity to Other Testbeds & Test Event Conduct			1-4Q					
O&M and Event Conduct				1-4Q	1-4Q	1-4Q	1-40	1-4Q