

UNCLASSIFIED

PE NUMBER: 0207410F

PE TITLE: Air and Space Operations Center - Weapon System (AOC-WS)

Exhibit R-2, RDT&E Budget Item Justification	DATE February 2007
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BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)
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Cost (\$ in Millions)	FY 2006 Actual	FY 2007 Estimate	FY 2008 Estimate	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	Cost to Complete	Total
Total Program Element (PE) Cost	51.796	76.849	111.557	133.469	131.676	125.974	131.309	133.933	Continuing	TBD
4372 Space C2 Operations	0.000	0.000	19.105	24.628	6.599	15.712	18.099	18.476	Continuing	TBD
5117 Integration Development	51.796	76.849	72.517	87.989	102.990	87.373	89.062	90.872	Continuing	TBD
5218 Applications Development	0.000	0.000	7.712	8.292	9.705	10.284	11.509	11.714	Continuing	TBD
5220 Unit Level	0.000	0.000	6.643	6.834	7.610	7.679	7.826	7.964	Continuing	TBD
5242 JADOCS NC	0.000	0.000	5.580	5.726	4.772	4.926	4.813	4.907	Continuing	TBD

Space Command and Control (C2) continues work started in the NCMC - TW/AA System, PE 0305906F. Starting in FY08, Space C2 funds were transferred to the 674372 project line in the AOC PE to consolidate and unify Air Force air and space C2 development and integration.

Starting in FY08 Project 674790 in PE 0207438F (Theater Battle Management Core Systems) was transferred to PE 0207410F (AOC WS) and placed into Projects 675218 (Applications Development) and 675220 (Unit Level).

C2 Execution Manager (C2EM, formerly Joint Automated Deep Operations Command System-Net-Centric (JADOCS-NC)) , Project 675242, is a continuation of the work started under the Family of Interoperable Programs (FIOP) Program Element for Web Enabled Execution Management Capability (WEEMC). WEEMC received funding in the FIOP PE in FY03 - \$3.482M, FY04 - \$4.580M, and FY05- \$10.500M. With the cancellation of the FIOP PE, JADOCS-NC received funding from Joint Forces Command (JFCOM) in FY06, while the Joint Staff supported WEEMC development and sought alternative sources of funds for FY06 and FY07. The Air Force normalized the funding line for C2EM in FY08 and programmed dollars throughout the Future Years Defense Program (FYDP) for this important effort.

(U) A. Mission Description and Budget Item Justification

The Air and Space Operations Center Weapon System (AOC WS) program element provides development of Command and Control (C2) capabilities across the entire spectrum of air and space operations from the strategic to the tactical level. There are five projects within the AOC WS program element.

Space C2 provides integrated space information and command and control of space forces for the Joint Functional Component Command for Space (JFCC-Space) and CDR USSTRATCOM.

Integration Development supports the Air and Space Operations Center Weapon System (AOC WS), AN/USQ-163 Falconer, the senior element of the Theater Air Control System (TACS). AOC WS is the weapon system the Commander, Air Force Forces (COMAFFOR) provides the Coalition/Joint Force Air Component Commander (C/JFACC) for planning, executing and assessing theater-wide air and space operations.

Application Development supports the Theater Battle Management Core Systems program which develops force-level command, control and intelligence applications and infrastructure providing core air battle planning, management and execution capabilities.

Exhibit R-2, RDT&E Budget Item Justification

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)
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Unit Level (UL) supports two primary mission areas: UL Operations software systems provide both the scheduling and mission preparation activities at the wing and squadron level and the capabilities to report and track the success of each mission and influence decisions on future Air Battle Planning to refine future missions. UL Intel capabilities ensure detailed threat, target and imagery information are made available to mission commanders and aircrews planning current flight operations.

C2 Execution Manager (C2EM) [formerly Joint Automated Deep Operations Command System (JADOCS) - Net Centric (NC)] continues to develop Web Enabled Execution Management Capability (WEEMC) and the existing Army ACTD JADOCS to provide new web based joint mission execution management tools for the warfighter.

This program is Budget Activity 7 - Operation System Development because it provides funding for the modernization of a currently existing and operating system.

(U) B. Program Change Summary (\$ in Millions)

	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) Previous President's Budget	67.029	87.483	89.994	93.948
(U) Current PBR/President's Budget	51.796	76.849	111.557	133.469
(U) Total Adjustments	-15.233			
(U) Congressional Program Reductions		-10.342		
Congressional Rescissions		-0.292		
Congressional Increases				
Reprogrammings	-13.368			
SBIR/STTR Transfer	-1.865			

(U) Significant Program Changes:

In FY06, \$13.368M was reprogrammed from Program Element 0207410F, Project 675117 for higher Air Force priorities.

In FY08 and out, funding for 675218 Applications Development, 675220 Unit Level, 675242 JADOCS-NC, and 675372 Space C2 was moved to PE 0207410F.

Exhibit R-2a, RDT&E Project Justification

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development				PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)				PROJECT NUMBER AND TITLE 4372 Space C2 Operations		
Cost (\$ in Millions)	FY 2006 Actual	FY 2007 Estimate	FY 2008 Estimate	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	Cost to Complete	Total
4372 Space C2 Operations	0.000	0.000	19.105	24.628	6.599	15.712	18.099	18.476	Continuing	TBD
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0		

Space Command and Control (C2) continues work started in the NCMC - TW/AA System, PE 0305906F. Starting in FY08, Space C2 funds were transferred to the 674372 project line in the AOC PE to consolidate and unify Air Force air and space C2 development and integration.

(U) **A. Mission Description and Budget Item Justification**

Space Command and Control (C2) system provides integrated space information and C2 of space forces for the Joint Functional Component Command for Space (JFCC-Space). Space C2 System builds on the operationally accepted pathfinder Single Integrated Space Picture (SISP) system. The Space C2 system will provide a net-centric, service oriented, technical implementation architecture that meets JFCC-Space top priority requirements. This program develops an integrated C2 solution that consumes and integrates space information to provide JFCC-Space and CDR USSTRATCOM with situational awareness of space assets (e.g., location and status of forces provided by Space Situational Awareness (SSA) systems), notification and assessment of space events, course of action development, and ability to command space forces. Space C2 system will improve the ability of JFCC-Space to fulfill assigned responsibilities of warning support/assessment of space attack, global coordination and conduct of space campaign planning, provide continuous situational awareness of assigned assets, coordinate on space intelligence requirements and intelligence campaign plans, provide operational support for space capabilities to Standing Joint Force Headquarters, conduct planning, tasking, integration, command, control and operational execution for global space operations as directed by CDRUSSTRATCOM for support to combatant commanders and other JFCCs and JTFs.

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

	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) Space C2 Technology Risk Reduction: Demonstrations, Operational Pilots, evaluation of 3rd party-developed space services, and initial Joint Space Operations Center (JSpOC) Integration baseline. Develops prototypes and demonstrates higher-risk, new capabilities for technical and operational evaluation. Also develops the first technical baseline for an integrated Space and Theater C2 architecture and establishes the process for space data registry.			8.592	4.065
(U) Space C2 System: develop, test, and deliver space C2 services that will integrate Space Situational Awareness (SSA) data to provide an integrated space information environment for the JSpOC C2 node and improved deliberate assessment, planning, tasking and course of action (COA) development capability. Specifically, this system will provide Blue Operations Capability (OPSCAP), Systems Capability (SYSCAP), Blue Space Order of Battle (OOB), Red/Gray Space OOB (as available from intelligence sources), Status Reporting, monitoring of space events and operations, and theater situational awareness. Continues to develop an integrated Space/Theater C2 operational environment and service oriented architecture.			10.513	20.563
(U) Total Cost	0.000	0.000	19.105	24.628

Exhibit R-2a, RDT&E Project Justification

DATE

February 2007

BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 4372 Space C2 Operations
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(U) **C. Other Program Funding Summary (\$ in Millions)**

	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>	<u>FY 2010</u>	<u>FY 2011</u>	<u>FY 2012</u>	<u>FY 2013</u>	<u>Cost to Complete</u>	<u>Total Cost</u>
	<u>Actual</u>	<u>Estimate</u>								
(U) Operations & Maintenance, PE 0305906F	0.000	0.000	2.000	2.000	0.000	0.000	0.000	0.000	0.000	4.000

(U) **D. Acquisition Strategy**

Continuation of Integrated Space Command and Control (ISC2) contract awarded with full and open competition. Uses rapid development acquisition strategy based on spiral/incremental development with emphasis on risk reduction technology demonstrations and operational pilots. Additionally, multiple demonstrations and pilots each year will prove out development processes prior to the Milestone B decision.

UNCLASSIFIED

Exhibit R-3, RDT&E Project Cost Analysis

DATE
February 2007

BUDGET ACTIVITY			PE NUMBER AND TITLE								PROJECT NUMBER AND TITLE			
07 Operational System Development			0207410F Air and Space Operations Center - Weapon System (AOC-WS)								4372 Space C2 Operations			
(U) Cost Categories (Tailor to WBS, or System/Item Requirements) (\$ in Millions)	<u>Contract Method & Type</u>	<u>Performing Activity & Location</u>	<u>Total Prior to FY 2006 Cost</u>	<u>FY 2006 Cost</u>	<u>FY 2006 Award Date</u>	<u>FY 2007 Cost</u>	<u>FY 2007 Award Date</u>	<u>FY 2008 Cost</u>	<u>FY 2008 Award Date</u>	<u>FY 2009 Cost</u>	<u>FY 2009 Award Date</u>	<u>Cost to Complete</u>	<u>Total Cost</u>	<u>Target Value of Contract</u>
(U) <u>Product Development</u> Space C2 Risk Reduction and Space C2 System Development	CP/AF	Lockheed Martin, Colorado Springs, CO				0.000		14.415	Dec-07	19.169	Nov-08	0.000	33.584	TBD
Subtotal Product Development			0.000	0.000		0.000		14.415		19.169		0.000	33.584	TBD
Remarks:														
(U) <u>Support</u> Systems Engineering	CP/FF	MITRE, Colorado Springs, CO						2.525	Nov-07	2.626	Nov-08	0.000	5.151	TBD
A&AS	CP/FF	ITSP, Colorado Springs, CO						1.766	Nov-07	2.379	Nov-08		4.145	
Program Support		Colorado Springs, CO						0.399	Nov-07	0.454	Nov-08	0.000	0.853	TBD
Subtotal Support			0.000	0.000		0.000		4.690		5.459		0.000	10.149	TBD
Remarks:														
(U) Total Cost			0.000	0.000		0.000		19.105		24.628		0.000	43.733	TBD

Exhibit R-4, RDT&E Schedule Profile

DATE
February 2007

BUDGET ACTIVITY
07 Operational System Development

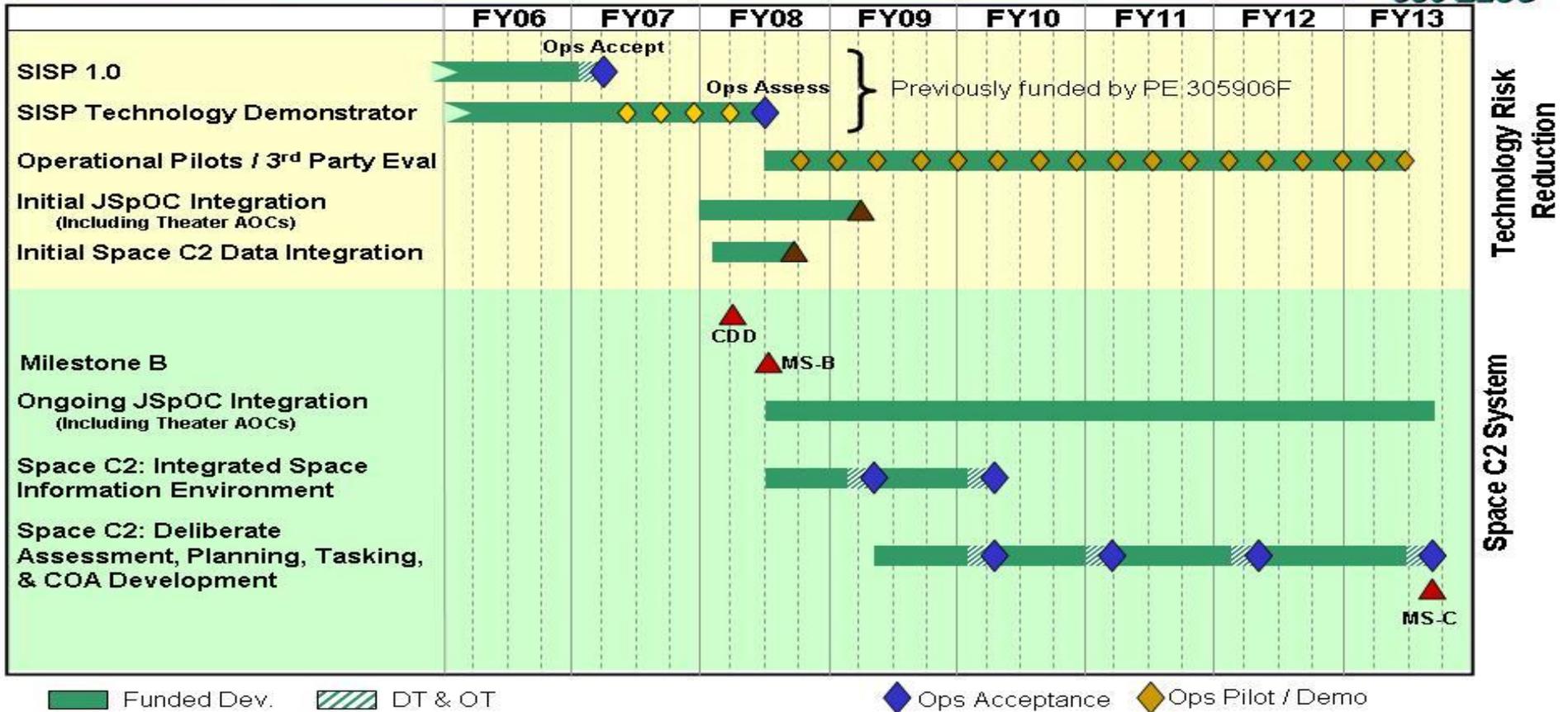
PE NUMBER AND TITLE
0207410F Air and Space Operations
Center - Weapon System (AOC-WS)

PROJECT NUMBER AND TITLE
4372 Space C2 Operations



Space C2 Schedule

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Exhibit R-4a, RDT&E Schedule Detail

DATE

February 2007

BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 4372 Space C2 Operations
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(U) <u>Schedule Profile</u>	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) Space C2 Risk Reduction Demonstrations, Pilots			3-4Q	1-4Q
(U) Initial JSpOC Integration			1-4Q	1Q
(U) Space C2 System: Integrated Space Information Environment (Initial SECRET level integrated space C2 operational environment)			1-3Q	
(U) Space C2 MS B			3Q	
(U) Development of Integrated Space Information Environment			3-4Q	1-4Q
(U) Development of Deliberate Assessment, Planning, Tasking, and COA Development				2-4Q

Exhibit R-2a, RDT&E Project Justification

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development					PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)			PROJECT NUMBER AND TITLE 5117 Integration Development		
Cost (\$ in Millions)	FY 2006 Actual	FY 2007 Estimate	FY 2008 Estimate	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	Cost to Complete	Total
5117 Integration Development	51.796	76.849	72.517	87.989	102.990	87.373	89.062	90.872	Continuing	TBD
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0		

(U) A. Mission Description and Budget Item Justification

The Air and Space Operations Center Weapon System (AOC WS), AN/USQ-163 Falconer, the senior element of the Theater Air Control System (TACS), is the weapon system the Commander, Air Force Forces (COMAFFOR) provides the Coalition/Joint Force Air Component Commander (C/JFACC) for planning, executing and assessing theater-wide air and space operations. The C/JFACC provides air and space support to the Coalition/Joint Forces Commander (C/JFC) by coordinating, deconflicting and assessing the progress of various weapon systems to advance the C/JFC's campaign. The C/JFACC employs the weapon system to plan, execute and assess theater-wide air and space operations. The AOC-WS develops operations strategy and planning documents. The weapon system also disseminates tasking orders, executes day-to-day peacetime and combat air and space operations, and provides rapid reaction to immediate situations by exercising positive control of friendly forces.

The AOC WS Integration Development project integrates system hardware and software to make the AOC WS a viable weapons system. The program consists of Falconer AOCs, Tailored Falconer AOCs, Functional AOCs, and Support AOCs that are configured according to mission need. The project will develop and integrate

C2 and ISR capabilities through software and hardware improvements to the AOC WS baseline. To keep the future AOC Weapon System evolving to meet warfighter needs, the AOC WS program plans to spirally develop the AOC with capability increments. The AOC WS uses the Weapon System Integrator (WSI) to ensure system of systems perspective and systems engineering rigor, to move AOC Modernization to Network Centric Operations (NCO) through spirally developed increments, to make recommendations on transitions to the "to be" architecture, and to conduct other weapon system standardization activities as defined in AOC WS requirements documents. The AOC WS Integration Development program provides a structure to transition and act as the focal point for systems integration, technical transition, and process refinement for rapidly evolving C2 programs, processes and concepts.

The program is in Budget Activity 7 - Operation System Development because it provides funding for the modernization of a currently existing and operating system.

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

	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) Continue AOC development of items to include, but not limited to, multi-level security, visualization, coalition interoperability, airspace management and deconfliction, strategy and assessment, information management, and predictive battlespace awareness for air and space operations.		32.940	42.396	18.779
(U) Integration to include, but not limited to, legacy systems, multi-level security, visualization, coalition interoperability, airspace management and deconfliction, strategy and assessment, information management, and predictive battlespace awareness for air and space operations.	15.221	19.710	5.700	20.295
(U) Modernization & Integration Systems Engineering Program Management and Data	5.756	4.100	4.321	13.256
(U) Integration Training (Type 1, Part Task Trainer, Distributed Mission Operations)	1.219	0.600	0.600	9.881

Exhibit R-2a, RDT&E Project Justification

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 5117 Integration Development
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(U) <u>B. Accomplishments/Planned Program (\$ in Millions)</u>	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) Modernization Integration Test and Evaluation	4.513	0.700	0.700	7.096
(U) Government Support to include, but not limited to, Government Systems Engineering, Government Test	14.448	14.902	14.800	14.562
(U) Program Management Support	10.639	3.897	4.000	4.120
(U) Total Cost	51.796	76.849	72.517	87.989

(U) <u>C. Other Program Funding Summary (\$ in Millions)</u>	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>	<u>FY 2010</u>	<u>FY 2011</u>	<u>FY 2012</u>	<u>FY 2013</u>	<u>Cost to Complete</u>	<u>Total Cost</u>
	<u>Actual</u>	<u>Estimate</u>								
(U) Other Procurement, AF PEC: 0207410F; BPAC: 83453A	19.910	23.009	43.151	34.805	52.935	28.637	22.137	31.451	Continuing	TBD

(U) **D. Acquisition Strategy**

The Air and Space Operations Center Weapon System selected a Weapon System Integrator (WSI) through full and open competition, to ensure system of systems perspective and systems engineering rigor and to move AOC Modernization to Network Centric Operations (NCO) through spirally developed increments. The acquisition strategy builds on existing capabilities, using evolutionary acquisition and spiral development, to standardize, modernize and sustain AOC WSs.

UNCLASSIFIED

Exhibit R-3, RDT&E Project Cost Analysis

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 5117 Integration Development
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(U) <u>Cost Categories</u> (Tailor to WBS, or System/Item Requirements) (\$ in Millions)	<u>Contract Method & Type</u>	<u>Performing Activity & Location</u>	<u>Total Prior to FY 2006 Cost</u>	<u>FY 2006 Cost</u>	<u>FY 2006 Award Date</u>	<u>FY 2007 Cost</u>	<u>FY 2007 Award Date</u>	<u>FY 2008 Cost</u>	<u>FY 2008 Award Date</u>	<u>FY 2009 Cost</u>	<u>FY 2009 Award Date</u>	<u>Cost to Complete</u>	<u>Total Cost</u>	<u>Target Value of Contract</u>
(U) <u>Product Development</u> AOC Software Integration	CPAF	LMMS, Colorado Springs, CO	9.400	0.000		13.400	Jan-07	0.000		0.000		0.000	22.800	TBD
Modernization & Integration	CPAF	ITSP & LMMS, Hanscom AFB, MA, Other	2.206	8.117	Mar-06	0.000	Jan-07	14.200	Nov-07	54.347	Nov-08	Continuing	TBD	TBD
Integration & Version Upgrades 10.1.1, 10.2	CPAF	LMMS, Hanscom AFB, MA		15.223	Feb-06	25.850	Jan-07	2.517	Nov-07	2.860	Nov-08	Continuing	TBD	TBD
Training	MIPR	AFMC/ESC, Hanscom AFB, MA	13.925	2.800	Nov-05	0.367	Nov-06	0.800	Dec-07	0.462	Dec-08	Continuing	TBD	TBD
Other Contracts (GSA, ETC) Increment Development	MIPR CPAF	Various LMMS, Colorado Springs, CO	28.723	9.139	Nov-05	3.770	Nov-06	0.000	Dec-07	0.000	Dec-08	Continuing	TBD	TBD
			9.363	2.000	Feb-06	18.800	Jan-07	37.000	Jan-08	12.100	Jan-09	Continuing	TBD	TBD
Subtotal Product Development			63.617	37.279		62.187		54.517		69.769		Continuing	TBD	TBD
Remarks:														
(U) <u>Support</u> Systems Engineering	CPFF	MITRE, Bedford, MA	9.883	7.432	Oct-05	7.177	Oct-06	10.700	Oct-07	11.000	Oct-08	Continuing	TBD	TBD
Program Support	FFP	A&AS AFMC/ESC, Hanscom AFB, MA	13.086	3.400	Dec-05	2.780	Dec-06	2.464	Dec-07	2.538	Dec-08	Continuing	TBD	TBD
Program Office Support	Various	AFMC/ESC, Hanscom AFB, MA	2.956	1.300	Oct-05	1.492	Oct-06	1.536	Oct-07	1.582	Oct-08	Continuing	TBD	TBD
Subtotal Support			25.925	12.132		11.449		14.700		15.120		Continuing	TBD	TBD
Remarks:														
(U) <u>Test & Evaluation</u> 46TS	MIPR	Eglin AFB, FL	3.424	2.385	Nov-05	3.213	Nov-06	3.300	Nov-07	3.100	Nov-08	Continuing	TBD	TBD
Subtotal Test & Evaluation			3.424	2.385		3.213		3.300		3.100		Continuing	TBD	TBD
Remarks:														

R-1 Line Item No. 145

Page-10 of 27

Project 5117

Exhibit R-3 (PE 0207410F)

Exhibit R-3, RDT&E Project Cost Analysis

DATE

February 2007

BUDGET ACTIVITY

07 Operational System Development

PE NUMBER AND TITLE

**0207410F Air and Space Operations
Center - Weapon System (AOC-WS)**

PROJECT NUMBER AND TITLE

5117 Integration Development

(U) Total Cost	92.966	51.796	76.849	72.517	87.989	Continuing	TBD	TBD
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Exhibit R-4, RDT&E Schedule Profile

DATE
February 2007

BUDGET ACTIVITY
07 Operational System Development

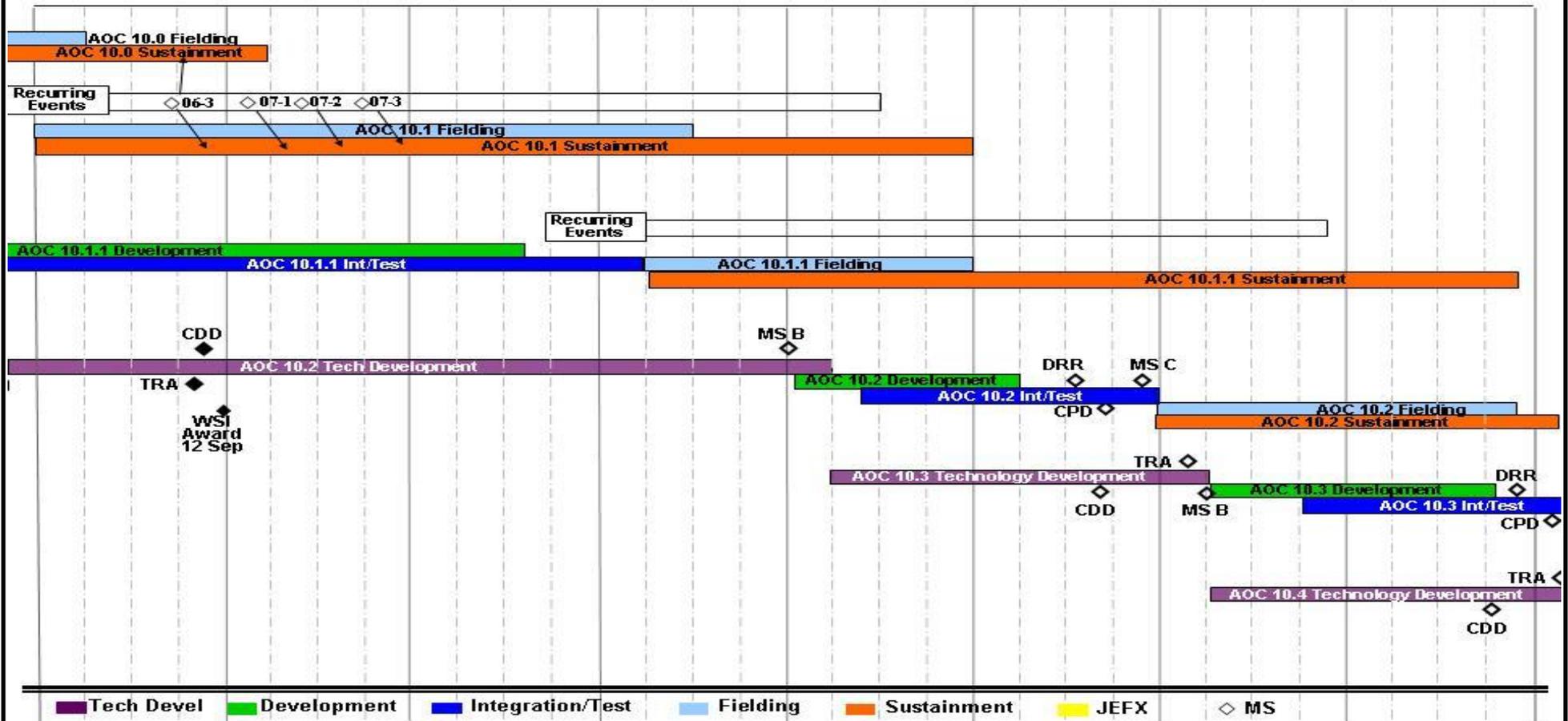
PE NUMBER AND TITLE
0207410F Air and Space Operations
Center - Weapon System (AOC-WS)

PROJECT NUMBER AND TITLE
5117 Integration Development

13 Dec 06 (v5.5)

AOC WS Integrated Master Schedule

FY06 FY07 FY08 FY09 FY10 FY11 FY12 FY13



UNCLASSIFIED

Exhibit R-4a, RDT&E Schedule Detail	DATE February 2007
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BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 5117 Integration Development
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(U) <u>Schedule Profile</u>	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) Increment 10.1 Fielding	1-4Q	1-4Q	1-4Q	1-2Q
(U) Contract Award	4Q			
(U) Increment 10.1.1 Development	1-4Q	1-4Q	1-3Q	
(U) Increment 10.1.1 Fielding				2-4Q
(U) Increment 10.2 Technology Development	1-4Q	1-4Q	1-4Q	1-4Q
(U) Increment 10.2 MS B				4Q

Exhibit R-2a, RDT&E Project Justification

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development					PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)			PROJECT NUMBER AND TITLE 5218 Applications Development		
Cost (\$ in Millions)	FY 2006 Actual	FY 2007 Estimate	FY 2008 Estimate	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	Cost to Complete	Total
5218 Applications Development	0.000	0.000	7.712	8.292	9.705	10.284	11.509	11.714	Continuing	TBD
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0		

Starting in FY08, Project 674790 (Theater Battle Management Core Systems) in PE 0207438F was transferred to PE 0207410F (AOC WS), Projects 675218 (Applications Development) and 675220 (Unit Level).

(U) A. Mission Description and Budget Item Justification

The Theater Battle Management Core Systems (TBMCS)-Force Level program, will develop force-level command, control and intelligence applications and infrastructure providing core air battle planning, management and execution capabilities. This development effort focuses on, but is not limited to support of the Joint Forces Air Component Commander, the Air and Space Operations Center (AOC) and the wing and unit levels to include: planning and replanning of the Air Battle Plan; generation and dissemination of the Air Tasking Order; air and space defensive planning and execution; targeting; weaponeering; and numerous other applications supporting air operations command and control. It also evaluates future air and space command and control concepts identified through real world operations, exercises and demonstrations and incorporates new capability via evolutionary acquisition. The follow-on to TBMCS will continue to develop and deliver these capabilities.

Starting in FY08, some TBMCS RDT&E funds were reprogrammed to O&M to ensure adequate sustainment support for dual software baselines required for continued Joint Service interoperability.

The program is in Budget Activity 7 - Operation System Development because it provides funding for the modernization of a currently existing and operating system.

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

	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) TBMCS/Follow-on Spiral Development	0.000	0.000	5.376	5.956
(U) TBMCS/Follow-on Training Development	0.000	0.000	1.686	1.686
(U) Test Support	0.000	0.000	0.650	0.650
(U) Total Cost	0.000	0.000	7.712	8.292

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

	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>	<u>FY 2010</u>	<u>FY 2011</u>	<u>FY 2012</u>	<u>FY 2013</u>	<u>Cost to</u>	<u>Total Cost</u>
	<u>Actual</u>	<u>Estimate</u>	<u>Complete</u>							
(U) Other Procurement, AF, PE 0207410F, WSC 834520, PROG BG1000	0.000	0.000	11.944	12.075	16.265	15.216	15.567	15.928	Continuing	TBD
(U) O&M, PE 0207410F, PROG BG1000			17.295	17.188	18.601	17.756	16.965	16.914	Continuing	TBD

Exhibit R-2a, RDT&E Project Justification

DATE

February 2007

BUDGET ACTIVITY

07 Operational System Development

PE NUMBER AND TITLE

0207410F Air and Space Operations
Center - Weapon System (AOC-WS)

PROJECT NUMBER AND TITLE

5218 Applications Development

(U) D. Acquisition Strategy

Projects will be awarded following full and open competition and will use an evolutionary acquisition strategy based on spiral development.

UNCLASSIFIED

Exhibit R-3, RDT&E Project Cost Analysis

DATE
February 2007

BUDGET ACTIVITY				PE NUMBER AND TITLE						PROJECT NUMBER AND TITLE				
07 Operational System Development				0207410F Air and Space Operations Center - Weapon System (AOC-WS)						5218 Applications Development				
(U) Cost Categories (Tailor to WBS, or System/Item Requirements) (\$ in Millions)	<u>Contract Method & Type</u>	<u>Performing Activity & Location</u>	<u>Total Prior to FY 2006 Cost</u>	<u>FY 2006 Cost</u>	<u>FY 2006 Award Date</u>	<u>FY 2007 Cost</u>	<u>FY 2007 Award Date</u>	<u>FY 2008 Cost</u>	<u>FY 2008 Award Date</u>	<u>FY 2009 Cost</u>	<u>FY 2009 Award Date</u>	<u>Cost to Complete</u>	<u>Total Cost</u>	<u>Target Value of Contract</u>
(U) <u>Product Development</u>														
Increment/Spiral Development	TBD	TBD	0.000	0.000		0.000		5.912	Oct-08	6.492	Oct-09	Continuing	TBD	TBD
Subtotal Product Development			0.000	0.000		0.000		5.912		6.492		Continuing	TBD	TBD
Remarks:														
(U) <u>Support</u>														
Program Office Support	TBD	TBD	0.000	0.000		0.000		1.150	Oct-08	1.150	Oct-09	Continuing	TBD	TBD
Subtotal Support			0.000	0.000		0.000		1.150		1.150		Continuing	TBD	TBD
Remarks:														
(U) <u>Test & Evaluation</u>														
Test Support	MIPR	46TS, Eglin AFB, FL	0.000	0.000		0.000		0.650	Oct-08	0.650	Oct-09	Continuing	TBD	TBD
Subtotal Test & Evaluation			0.000	0.000		0.000		0.650		0.650		Continuing	TBD	TBD
Remarks:														
(U) <u>Management</u>														
Subtotal Management			0.000	0.000		0.000		0.000		0.000		Continuing	TBD	TBD
Remarks:														
(U) Total Cost			0.000	0.000		0.000		7.712		8.292		Continuing	TBD	TBD

Exhibit R-4, RDT&E Schedule Profile

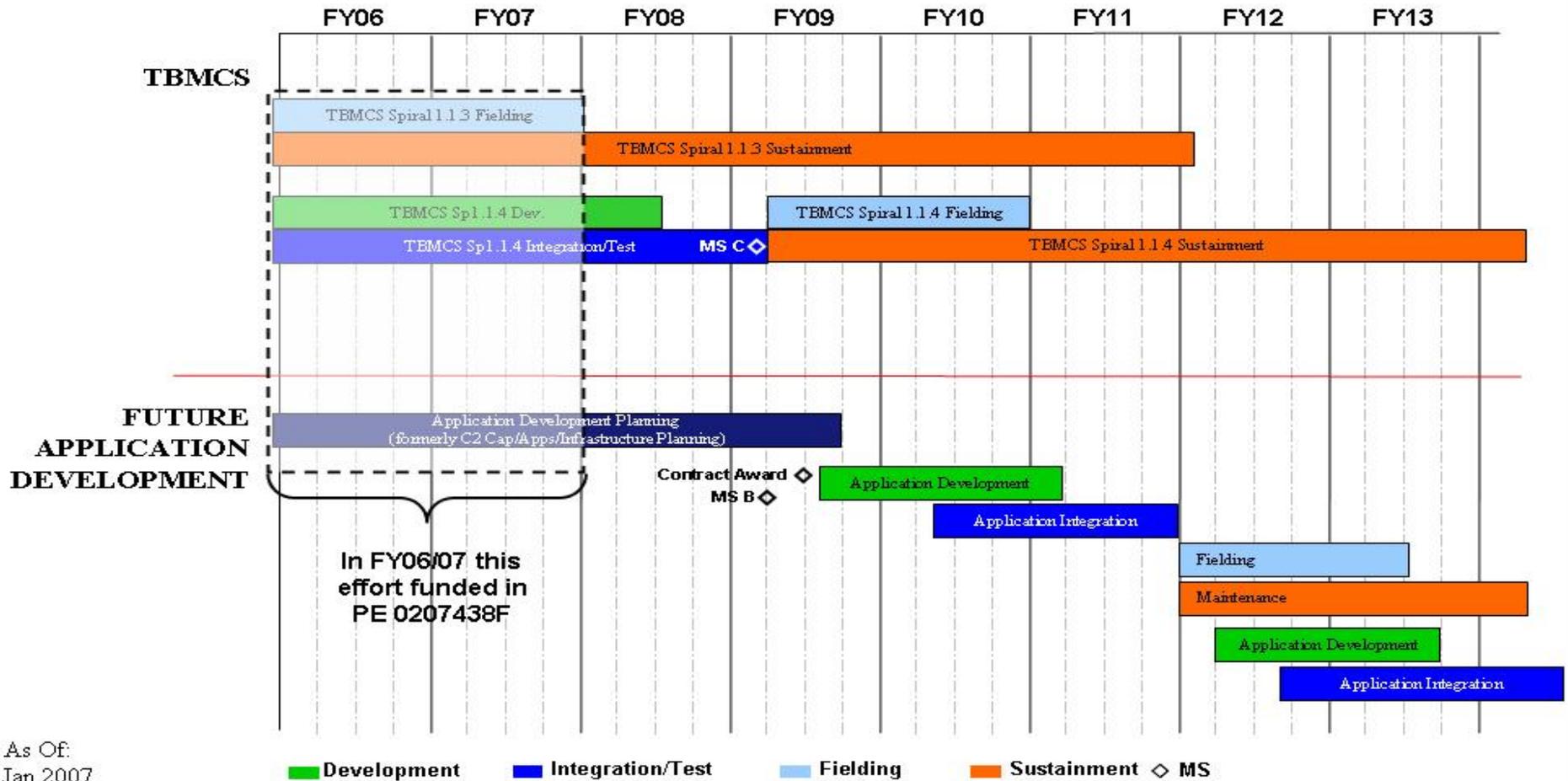
DATE
February 2007

BUDGET ACTIVITY
07 Operational System Development

PE NUMBER AND TITLE
0207410F Air and Space Operations
Center - Weapon System (AOC-WS)

PROJECT NUMBER AND TITLE
5218 Applications Development

Schedule



As Of:
5 Jan 2007

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Exhibit R-4a, RDT&E Schedule Detail		DATE February 2007
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BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 5218 Applications Development
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(U) <u>Schedule Profile</u>	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) TBMCS Spiral 1.1.4			1-4Q	1-4Q
(U) Follow-on Effort				2-4Q

Exhibit R-2a, RDT&E Project Justification

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development					PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)			PROJECT NUMBER AND TITLE 5220 Unit Level		
Cost (\$ in Millions)	FY 2006 Actual	FY 2007 Estimate	FY 2008 Estimate	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	Cost to Complete	Total
5220 Unit Level	0.000	0.000	6.643	6.834	7.610	7.679	7.826	7.964	Continuing	TBD
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0		

Starting in FY08 Project 674790 (Theater Battle Management Core Systems) in PE 0207438F was transferred to PE 0207410F (AOC WS), Projects 675218 (Applications Development) and 675220 (Unit Level).

(U) A. Mission Description and Budget Item Justification

The Unit Level (UL) program, as the follow on to Theater Battle Management Core Systems-Unit Level, develops, integrates, fields, and maintains an evolving sequence of increasing software capabilities that support the execution of the air battle plan and the air tasking order message received from the force level systems. Unit Level Operations software systems provide both the scheduling and mission preparation activities at the wing and squadron level and the capabilities to report and track the success of each mission and influence decisions on future Air Battle Planning to refine future missions. Unit Level Intel capabilities ensure detailed threat, target and imagery information are made available to mission commanders and aircrews planning current flight operations. UL is fielded to the Wing Operations Center (WOC), the Maintenance Operations Center (MOC), the Squadron Operations Center (SOC), and many other work-centers. The program is in Budget Activity 7 - Operation System Development because it provides funding for the modernization of a currently existing and operating system.

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

	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) Continue Unit Level Operations and Intel spiral software development/integration (formerly known as TBMCS-Unit Level)	0.000	0.000	5.701	5.852
(U) Test Support	0.000	0.000	0.360	0.380
(U) System Engineering	0.000	0.000	0.582	0.602
(U) Total Cost	0.000	0.000	6.643	6.834

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

	<u>FY 2006</u> <u>Actual</u>	<u>FY 2007</u> <u>Estimate</u>	<u>FY 2008</u> <u>Estimate</u>	<u>FY 2009</u> <u>Estimate</u>	<u>FY 2010</u> <u>Estimate</u>	<u>FY 2011</u> <u>Estimate</u>	<u>FY 2012</u> <u>Estimate</u>	<u>FY 2013</u> <u>Estimate</u>	<u>Cost to</u> <u>Complete</u>	<u>Total Cost</u>
(U) Other Procurement, AF, PE 0207410F, WSC 834520, PROG BG2000	0.000	0.000	10.758	10.602	12.967	12.042	12.278	12.338	Continuing	TBD
(U) O&M, PE 0207410F, PROG BG2000			3.000	2.182	2.201	1.091	1.110	1.715	Continuing	TBD

(U) D. Acquisition Strategy

Projects will be awarded following full and open competition and will use an evolutionary acquisition strategy based on spiral development.

UNCLASSIFIED

Exhibit R-3, RDT&E Project Cost Analysis

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 5220 Unit Level
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<u>(U) Cost Categories</u> (Tailor to WBS, or System/Item Requirements) (\$ in Millions)	<u>Contract Method & Type</u>	<u>Performing Activity & Location</u>	<u>Total Prior to FY 2006 Cost</u>	<u>FY 2006 Cost</u>	<u>FY 2006 Award Date</u>	<u>FY 2007 Cost</u>	<u>FY 2007 Award Date</u>	<u>FY 2008 Cost</u>	<u>FY 2008 Award Date</u>	<u>FY 2009 Cost</u>	<u>FY 2009 Award Date</u>	<u>Cost to Complete</u>	<u>Total Cost</u>	<u>Target Value of Contract</u>
<u>(U) Product Development</u>														
Increment/Spiral Development	TBD	TBD	0.000	0.000		0.000		5.701	Oct-08	5.852	Oct-09	Continuing	TBD	TBD
Subtotal Product Development			0.000	0.000		0.000		5.701		5.852		Continuing	TBD	TBD
Remarks:														
<u>(U) Support</u>														
Program Office Support	TBD	TBD	0.000	0.000		0.000		0.582	Oct-08	0.602	Oct-09	Continuing	TBD	TBD
Subtotal Support			0.000	0.000		0.000		0.582		0.602		Continuing	TBD	TBD
Remarks:														
<u>(U) Test & Evaluation</u>														
Test Support	MIPR	46TS, Eglin AFB, FL	0.000	0.000		0.000		0.360	Oct-08	0.380	Oct-09	Continuing	TBD	TBD
Subtotal Test & Evaluation			0.000	0.000		0.000		0.360		0.380		Continuing	TBD	TBD
Remarks:														
<u>(U) Management</u>														
Subtotal Management			0.000	0.000		0.000		0.000		0.000		Continuing	TBD	TBD
Remarks:														
<u>(U) Total Cost</u>			0.000	0.000		0.000		6.643		6.834		Continuing	TBD	TBD

Exhibit R-4, RDT&E Schedule Profile

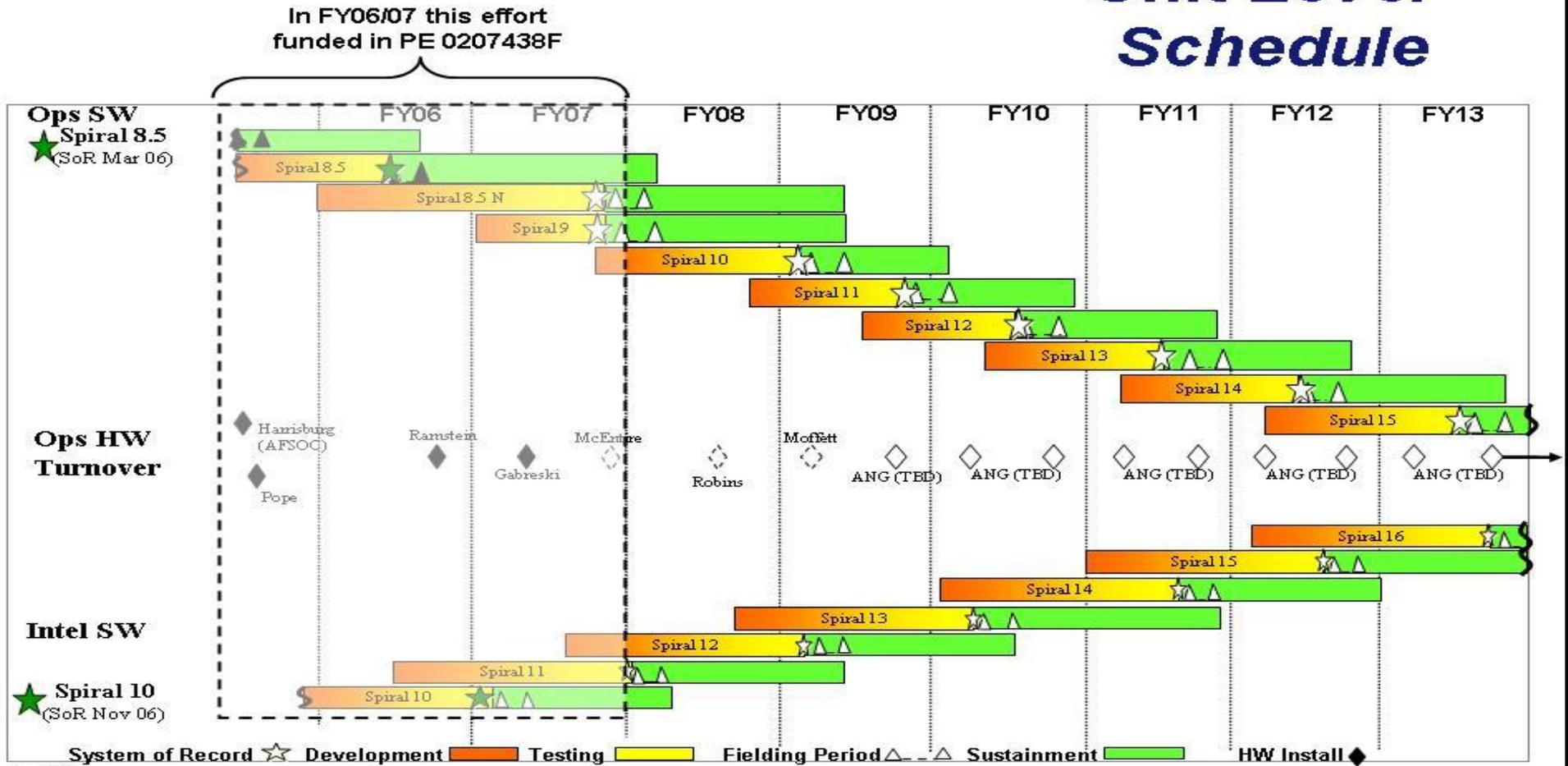
DATE
February 2007

BUDGET ACTIVITY
07 Operational System Development

PE NUMBER AND TITLE
0207410F Air and Space Operations
Center - Weapon System (AOC-WS)

PROJECT NUMBER AND TITLE
5220 Unit Level

Unit Level Schedule



As Of:
5 Jan 2007

Exhibit R-4a, RDT&E Schedule Detail	DATE February 2007
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BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 5220 Unit Level
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(U) <u>Schedule Profile</u>	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) Continue Unit Level Operations and Intel spirals			1-4Q	1-4Q

Exhibit R-2a, RDT&E Project Justification

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development					PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)			PROJECT NUMBER AND TITLE 5242 JADOCs NC		
Cost (\$ in Millions)	FY 2006 Actual	FY 2007 Estimate	FY 2008 Estimate	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	Cost to Complete	Total
5242 JADOCs NC	0.000	0.000	5.580	5.726	4.772	4.926	4.813	4.907	Continuing	TBD
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0		

C2 Execution Manager (C2EM formerly JADOCs-NC) is a continuation of the work started under the FIOP Program Element for Web Enabled Execution Management Capability (WEEMC). WEEMC received funding in the FIOP PE in FY03 - \$3.482M, FY04 - \$4.580M, and FY05- \$10.500M. With the cancellation of the FIOP PE, WEEMC received funding from JFCOM in FY06, while the Joint Staff supported WEEMC development and sought alternative sources of funds for FY06 and FY07. The Air Force normalized the funding line for C2 Execution Manager in FY08 and programmed dollars throughout the Future Years Defense Program (FYDP) for this important effort.

(U) A. Mission Description and Budget Item Justification

C2 Execution Manager (C2EM) [formerly Joint Automated Deep Operations System (JADOCs)-Net Centric (NC)] combines the best capabilities of the Air Force produced Web Enabled Execution Management Capability (WEEMC) and the Army ACTD JADOCs to provide new web based tools for Operations Center Personnel that are used during battle execution. These tools are comprised of mission managers and task coordination managers, and they use the standard DoD Common Operational Environment (COE) set of mission applications and segments. These tools will provide greater horizontal and vertical integration of the Joint Forces Commander's decisions. The funding for this effort will develop Spiral 1 and Spiral 2 capabilities and start Spiral 3 development.

This project is in Budget Activity 7 - Operation System Development because it provides funding for the modernization of a currently existing and operating system.

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

	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) C2 Execution Manager Spiral 1- Will provide system upgrades in order to remain compatible with Global Command and Control System - Joint (GCCS-J) and Command and Control Personal Computer (C2PC) in areas that include, but are not limited to, security requirements.			3.457	
(U) C2 Execution Manager Spiral 2-Will provide high priority Combatant Command (COCOM) requirements to modernize the system.			1.842	1.707
(U) C2 Execution Manager Spiral 3 - Will provide new interfaces to other programs such as, but not limited to, Personnel Recovery Mission Software (PRMS).			0.281	3.289
(U) C2 Execution Manager Spiral 4-Will provide interfaces to enhanced program capabilities.				0.730
(U) Total Cost	0.000	0.000	5.580	5.726

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

	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>	<u>FY 2010</u>	<u>FY 2011</u>	<u>FY 2012</u>	<u>FY 2013</u>	<u>Cost to Complete</u>	<u>Total Cost</u>
	<u>Actual</u>	<u>Estimate</u>								
(U) Operations and Maintenance, PE 0207410F	0.000	0.000	1.470	1.180	1.210	1.240	1.270	1.300		TBD

Exhibit R-2a, RDT&E Project Justification

DATE

February 2007

BUDGET ACTIVITY

07 Operational System Development

PE NUMBER AND TITLE

0207410F Air and Space Operations
Center - Weapon System (AOC-WS)

PROJECT NUMBER AND TITLE

5242 JADOCs NC

(U) D. Acquisition Strategy

Planning for a single, new award, multi-year contract. Anticipate 2 Spirals per year, competitive or limited competitive Cost Plus Incentive Fee (CPIF) to be awarded Mar 08.

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Exhibit R-3, RDT&E Project Cost Analysis

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 5242 JADOCs NC
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(U) <u>Cost Categories</u> (Tailor to WBS, or System/Item Requirements) (\$ in Millions)	<u>Contract Method & Type</u>	<u>Performing Activity & Location</u>	<u>Total Prior to FY 2006 Cost</u>	<u>FY 2006 Cost</u>	<u>FY 2006 Award Date</u>	<u>FY 2007 Cost</u>	<u>FY 2007 Award Date</u>	<u>FY 2008 Cost</u>	<u>FY 2008 Award Date</u>	<u>FY 2009 Cost</u>	<u>FY 2009 Award Date</u>	<u>Cost to Complete</u>	<u>Total Cost</u>	<u>Target Value of Contract</u>
(U) <u>Product Development</u>														
Software development	TBD	TBD						3.449	Mar-08	3.537	Mar-09	Continuing	TBD	TBD
Engineering changes	TBD	TBD						0.152	Mar-08	0.157	Mar-09	Continuing	TBD	TBD
Training	TBD	TBD						0.040	Mar-08	0.041	Mar-09	Continuing	TBD	TBD
Subtotal Product Development			0.000	0.000		0.000		3.641		3.735		Continuing	TBD	TBD
Remarks:														
(U) <u>Support</u>														
Contractor support	TBD	TBD						1.882	Jan-08	1.932	Jan-09	Continuing	TBD	TBD
Subtotal Support			0.000	0.000		0.000		1.882		1.932		Continuing	TBD	TBD
Remarks:														
(U) <u>Test & Evaluation</u>														
Integration Testing	TBD	TBD						0.057	Mar-08	0.059	Mar-09	Continuing	TBD	TBD
Subtotal Test & Evaluation			0.000	0.000		0.000		0.057		0.059		Continuing	TBD	TBD
Remarks:														
(U) <u>Management</u>														
Subtotal Management			0.000	0.000		0.000		0.000		0.000		0.000	0.000	0.000
Remarks:														
(U) Total Cost			0.000	0.000		0.000		5.580		5.726		Continuing	TBD	TBD

Exhibit R-4, RDT&E Schedule Profile

DATE

February 2007

BUDGET ACTIVITY
07 Operational System Development

PE NUMBER AND TITLE
0207410F Air and Space Operations
Center - Weapon System (AOC-WS)

PROJECT NUMBER AND TITLE
5242 JADOCs NC

C2 Execution Manager Milestone Schedule

As of 21 Dec 06

	FY2006	FY2007	FY2008	FY2009	FY2010	FY2011	FY2012	FY2013
Contract Awd			▲					
Spiral 1			▲					
Spiral 2				▲				
Spiral 3				▲				
Spiral 4					▲			
Spiral 5					▲			
Spiral 6						▲		
Spiral 7						▲		
Spiral 8							▲	
Spiral 9							▲	
Spiral 10								▲
Spiral 11								▲

Exhibit R-4a, RDT&E Schedule Detail

DATE
February 2007

BUDGET ACTIVITY 07 Operational System Development	PE NUMBER AND TITLE 0207410F Air and Space Operations Center - Weapon System (AOC-WS)	PROJECT NUMBER AND TITLE 5242 JADOCs NC
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(U) Schedule Profile	<u>FY 2006</u>	<u>FY 2007</u>	<u>FY 2008</u>	<u>FY 2009</u>
(U) C2 Execution Manager contract award			2Q	
(U) C2 Execution Manager Spiral 1 delivery			3Q	
(U) C2 Execution Manager Spiral 2 delivery				1Q
(U) C2 Execution Manager Spiral 3 delivery				3Q

Note: Not every spiral of C2 Execution Manager may go directly to the field to provide additional capability to the warfighter. Some may be dedicated to support experiments or exercises to assess new technology or capabilities.