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BMDO RDT&E BUDGET ITEM JUSTIFICATION (R-2 Exhibit)	DATE June 2001
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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction	PE NUMBER AND TITLE 0603882C Midcourse Defense Segment
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COST <i>(In Thousands)</i>	FY 2000 Actual	FY 2001 Estimate	FY 2002 Estimate	FY 2003 Estimate	FY 2004 Estimate	FY 2005 Estimate	FY 2006 Estimate	FY 2007 Estimate	Cost to Complete	Total Cost
Total Program Element (PE) Cost	0	0	3940534	0	0	0	0	0	Continuing	Continuing
3010 Ground-based Midcourse	0	0	3230725	0	0	0	0	0	Continuing	Continuing
3020 Sea-based Midcourse	0	0	596000	0	0	0	0	0	Continuing	Continuing
3050 Systems Engineering and Integration	0	0	44000	0	0	0	0	0	Continuing	Continuing
3090 Program Operations	0	0	69809	0	0	0	0	0	Continuing	Continuing

A. Mission Description and Budget Item Justification

The Midcourse Defense Segment (MDS) develops increasingly robust capabilities for countering ballistic missiles in the midcourse stage of flight. Using a capability block approach, the MDS will develop and test multiple technologies to provide credible capabilities against the threat. This segment is divided into multiple projects including Ground-based Midcourse Projects, and Sea-Based Midcourse Projects, the successors to the National Missile Defense and Navy Theater Wide programs, and segment Systems Engineering and Integration.

A major focus of the MDS is to enhance our testing ability via the construction of a missile defense test bed. This test bed provides a realistic environment to test different missile defense capabilities under varying and stressing conditions. It demonstrates the viability of a layered missile defense concept; provides an actual operational environment to verify system element hardware and software integration; allows evaluation in a geographically dispersed operational environment and testing of multiple simultaneous engagements. This approach provides a near-term option to employ the test facilities – radars, command and control, and interceptor missiles at Fort Greely and Kodiak Island – in an operational mode. Its use in this mode could provide an interim capability to meet an emergent threat. The interim capability could subsequently be upgraded through technical improvements; replaced by deployment of production quality radars, command and control, and interceptors; or supplemented with a sea-based midcourse component.

Additionally, the test bed approach verifies construction, transportation and certification procedures. Logistics support concepts and system data will also be validated. This validation includes maintenance procedures; loading and unloading operations; supply activities and databases; technical manuals; and reliability, availability, and maintainability data. Finally, although its initial development occurs within the Ground-based Midcourse project, over time this test bed will expand to enhance overall test infrastructure and project maturation to include the Boost and Terminal Defense Segments.

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The Ground-based Midcourse project will develop an integrated system capable of countering known and expected threats and further demonstrate a “hit-to-kill” capability. Consistent with the capability block approach, this project will prepare for future block upgrades, and each successive block will develop capability against increasing threat complexity.

The Sea-based Midcourse project continues the work of the Navy Theater Wide and Aegis Light-weight ExoAtmospheric Projectile (LEAP) Intercept programs and could potentially provide protection against short and medium range threats. This capability builds upon the existing Aegis Weapons System and the STANDARD Missile infrastructure. The Sea-based Midcourse project also initiates concept definition for ascent phase intercept capability, to include engagements against longer range threat missiles.

This Program Element is divided into four projects: Ground-based Midcourse, Sea-based Midcourse, Systems Engineering and Integration, and Program Operations. Within each of the projects in any given budget year, work will proceed to support at least one Capability Block. The MDS project provides a realistic test bed to mature Block upgrade capabilities and allow an early emergency defense capability, both Ground- and Sea-based, if needed.

The MDS will incorporate recommendations from the Welch Review Panel and from the DoD, Director of Operational Testing and Evaluation. These include: Countermeasures Mitigation, a Combined Test Force to resolve differences between BMDO and the Operational Testing Community on the level of testing required, expanded engagement conditions, new target and interceptor launch sites, multiple engagement scenarios, expanded test range/engagement areas, and improved test bed infrastructure. The resulting improvements in the MDS developmental effort will be enhanced realism in test scenarios, multiple engagement test flight scenarios, intercept possibilities over a larger area, higher speed Exoatmospheric Kill Vehicle (EKV) engagements, improved test communications / data handling, all coupled with increased testing.

<u>B. Program Change Summary</u>	<u>FY 2000</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>
Previous President’s Budget (<u>FY 2001</u> PB)				
Appropriated Value				
Adjustments to Appropriated Value				
a. Congressional General Reductions				
b. SBIR / STTR				
c. Omnibus or Other Above Threshold Reductions				
d. Below Threshold Reprogramming				
e. Rescissions				
Adjustments to Budget Years Since <u>FY 2001</u> PB				
Current Budget Submit (<u>FY 2002</u> PB)			3940534	

Change Summary Explanation:

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<p>This PE has been restructured. FY 2000/2001 funding for the Midcourse Defense Segment exists and is provided under Project 2400, Program Element 0603871C, and Project 1266, Program Element 0603868C.</p>		

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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction	PE NUMBER AND TITLE 0603882C Midcourse Defense Segment	PROJECT 3010
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COST (<i>In Thousands</i>)	FY 2000 Actual	FY 2001 Estimate	FY 2002 Estimate	FY 2003 Estimate	FY 2004 Estimate	FY 2005 Estimate	FY 2006 Estimate	FY 2007 Estimate	Cost to Complete	Total Cost
3010 Ground-based Midcourse	0	0	3230725	0	0	0	0	0	Continuing	Continuing

A. Mission Description and Budget Item Justification

The Ground-based Midcourse project is designed to intercept ballistic missile threats to the U.S. during the descent phase of midcourse flight. The Ground-based Midcourse project has three objectives: 1) to develop and demonstrate an integrated system that has the capability to counter known and expected threats; 2) to complete project development and provide an RDT&E test bed that provides operational realism for further project development and, if necessary, limited protection; and 3) to assess the technical feasibility, schedule, and cost associated with maintaining a project development path which allows evolutionary upgrading of project capabilities to counter more complex threats. During the initial phase, the program develops and integrates the projects into a system and demonstrates “hit-to-kill” capability in a robust, operationally realistic RDT&E Test Bed and prepares for subsequent blocks.

The Ground-based Midcourse project provides for the Prime Contractor to develop and integrate the individual ground based projects into a cohesive system. The Prime Contractor will integrate system hardware and software to demonstrate the ability of the project to meet performance requirements and to provide the flexibility and robustness for growth in capability to counter known and future threats.

The 2004 RDT&E Test bed provides a development structure consisting of an upgraded COBRA DANE radar in Alaska as a surrogate for eventual UEWRs, an accelerated version of the In-Flight Interceptor Communications System (IFICS) and Battle Management Command Control and Communications (BMC3) capability, five silos, Command Launch Equipment (CLE), and software upgrades. Five ground-based interceptors using the Payload Launch Vehicle Plus (PLV+) booster, comprising the current test configuration booster plus a Minuteman (MM) II first stage, will be installed and ground tested as part of project test and project check-out, and could expeditiously be put on alert to provide a contingency defense if needed in the FY 2004 timeframe. The 2006 capability (Block 2006) will continue a robust test program incorporating data from three to four test flights in FY 2002. Research and development efforts for this block and subsequent blocks will support the further development of more-capable interceptors, sensors, and targets. The Prime Contractor validates project performance and performs the necessary project level trade studies to appropriately allocate requirements. The Prime Contractor will also operate and maintain models and simulations to include Integrated System Test Capability (ISTC), system Hardware in the Loop (HWIL), and Prime Contractor Integrated Development Systems (PCIDS). Until booster development is complete, EKV flight tests will be flown on a Payload Launch Vehicle (PLV), which is a booster comprised of MM II second and third stages. The Prime Contractor will initiate an alternate booster program, and will begin a complementary EKV program. BMC3 incremental prototypes will be integrated and demonstrated in a distributed fashion at multiple locations, and assessed with user participation to refine and focus BMC3 and project development.

2004 RDT&E Test bed –Development of prototype ground support projects to support the RDT&E test capability will be started in FY 2002. This includes the interceptor based upon the PLV+ booster, the current test configuration of the EKV, the “common” silo, launch complex, support requirements, and command and control (C2) nodes and communication links. In addition, the RDT&E capability will include enhancing the COBRA DANE radar to provide a surrogate for planned

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<p>UEWR capability. Prototype C2 nodes and communication terminals will be constructed in initial quantities to support the RDT&E Test bed. The Ground-based Midcourse project incorporates efforts to mitigate community impacts at Fort Greely in areas of schools, municipal services, social services, and public safety. The project also incorporates funding to demilitarize and dismantle a number of older ABM silos no longer required.</p> <p><u>Midcourse Test Support</u> – This effort provides funding to support upgrades to range assets at the Kwajalein Missile Range (KMR) which includes the extension of range safety and mobile telemetry, test communications upgrades for improvements to existing test communications facilities and architecture within KMR and from KMR to Hawaii, and transportations costs for transporting assets, material and people within the KMR area.</p> <p><u>Block 2006</u> – In FY 2002, Boeing, the Ground-based Midcourse Prime Contractor, will conduct the Critical Design Review (CDR) for all prototype Ground-based Midcourse projects and components. In addition, Boeing will conduct three and potentially four integrated flight tests and a number of ground tests based on modeling and simulation and HWIL. In FY 2002, Boeing will also conduct studies, perform engineering evaluations of alternate boost vehicles, select an alternate boost vehicle approach and design a common silo to accommodate any of the potential choices, whether cannisterized or not. The alternate booster provides greater capability and expands the battlespace for the Ground-based Midcourse project. UEWR software builds 3 through 6 will be developed. The effect of the disturbed ionosphere on the UEWR will be characterized and corresponding algorithms will be developed. The Interceptor Rate Production Facility will be initiated in FY 2002 to support a wide range of interceptor needs for the increased rate of flight testing. When directed, we will prepare a procurement plan for deployment of up to 30-50 interceptors at a complex, sensors, BMC3 nodes, and XBR.</p> <p>FY 2000 Accomplishments:</p> <ul style="list-style-type: none"> • A portion of the FY 2000 Funding for the Midcourse Defense Segment exists and is provided under Project 2400, Program Element 0603871C, and Project 1266, Program Element 0603868C. <p>Total</p> <p>FY 2001 Planned Program:</p> <ul style="list-style-type: none"> • A portion of the FY 2001 Funding for the Midcourse Defense Segment exists and is provided under Project 2400, Program Element 0603871C, and Project 1266, Program Element 0603868C. <p>Total</p>		
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<p>FY 2002 Planned Program:</p> <ul style="list-style-type: none"> • 481964 2004 RDT&E Test bed <u>Prime Contractor Development</u>: Initiate efforts for the FY 2004 RDT&E Test bed with five PLV+ boosters and EKV's, silos and CLE. Accelerate IFICS and BMC3 development. Initiate COBRA DANE radar hardware and software upgrades. <u>Government Operations and Oversight</u>: Initiate upgrade of the KMR range assets to enhance launch capabilities and range safety. This will add intercept areas, reduce artificiality in testing and add realism to test scenarios. Enhance ground test capability by adding Long Haul Communications Fiber Network to provide data assurance and speed up the data collection and reduction effort. Upgrades will allow for flight test scenarios featuring multiple engagements. • 273121 RDT&E Test bed Facility Construction Provides funding for design and construction efforts in support of the 2004 RDT&E Test bed. The DD Form 1391, which details these efforts, is included in the construction section of the BMDO FY 2002 budget submission. • 9700 Block 2004 Community Impacts Provides funding for mitigating community impacts. These efforts include an additional fire station, off post landfill, school assistance, and a communications/TV tower. • 21700 Kodiak Test Site Initiate efforts for the Kodiak Test Site in support of 2004 RDT&E Test bed. The attached DD Form 1391 identifies \$2.8M of this amount for construction at the Kodiak Test Site and is included in the construction section of the BMDO FY 2002 budget submission. The remainder is for equipment installation, design and environmental documentation. • 2444240 Block 2006 <u>Prime Contractor Development</u>: Conduct Project CDR. Continue booster development and investigate booster alternatives as part of risk mitigation. Conduct Booster Verification (BV) tests. Design common silo. Continue EKV development, including algorithm upgrades. Continue booster development. Develop GBI support projects, including Command Launch Equipment. Support T&E engineering, simulations, ground tests and conduct IFTs-7 through 9. Continue EKV algorithm upgrade. Begin GBI Rate Production Facility. Deliver basic XBR software. Develop and release BMC2 BI-2. Initiate northern tier SATCOM and fiber optic communications links to provide reliable communications to BMC2 nodes. Continue development of high fidelity simulations. Begin planning for simultaneous engagements to assess the project operational performance. Complete UEWR software builds 3 and 4. Conduct software/algorithm V&V, logistic/configuration support, and installation planning. Continue development of project deployment and sustainment strategy planning to include maintenance and supply support. Continue project RAM and supportability/testability data and issue analysis reports. Prepare MPT. Continue development and testing of incremental XBR & UEWR Software 		
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Government Operations and Oversight: Continue program management, technical and testing oversight of the GBI, XBR, UEWR and BMC3 projects. Support IFTs-7 through 9. Provide targets and target launches. Conduct post test data reduction activities. Initiate efforts for the Kodiak Test Site in support of 2004 RDT&E Test bed. Continue requirement refinement for SRD. Support major program milestones, project requirements and design reviews, internal and external interface development/implementation cost assessment support, elevation of deployment readiness, and project deployment. Update Project CARD against technical requirements. Develop/update detailed threat “design-to” and “analyze-to” parameters and scenarios. Conduct C2Sim exercise and tabletops. Continue integration with the SBIRS Program Office to ensure the satisfaction of project requirements. Perform nuclear environment calculations/requirements verification. Conduct data fusion/project discrimination development. Coordinate project Verification, Validation and Accreditation (VV&A) and maintain Independent Verification and Validation (IV&V) capability to perform project VV&A. Continue development of Project sustainment program planning. Conduct facilities designs. Continue project Reliability, Availability and Maintainability (RAM) and supportability/testability data and issue analysis reports. Develop plan for employing the Test, Training and Exercise Capability (TTEC). Review Manpower, Personnel and Training (MPT) issues and ensure MPT is on track to provide trained personnel for Block capabilities. Develop and issue Project Producibility and Manufacturing (P&M) Plans. Continue Environmental, Safety, and Health (ESH) documentation, including associated siting and NEPA analysis and ESH compliance documentation required for continued project development and deployment. Continue Programmatic Environmental Safety and Health Evaluation (PESHE).

Total 3230725 Ground-based Midcourse

B. Other Program Funding Summary	<u>FY 2000</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>	<u>To Compl</u>	<u>Total Cost</u>
PE 0603871C, NMD-PDRR	944922	1853877								
PE 0208871C, NMD-Proc		73845								
PE 0603868C, NTW-PDRR	368769	456372								

C. Acquisition Strategy: The Department has restructured the missile defense acquisition strategy into a multi-path approach to assure that the most effective missile defense is available at the earliest possible time. The Ground-based Midcourse project has adopted an acquisition approach that supports evolutionary projects development under the overall technical management of Boeing as the Prime Contractor. The strategy is to deliver capability blocks as early as practical, and adopt a spiral development methodology in recognition of the rapidly changing technology environment and the need to satisfy requirements that are defined in general terms within an evolving technology base. This process will (1) allow early implementation of a capability while supporting an evolving requirement/threat definition process, (2) minimize the risks of obsolescence posed by the rapid pace of technology development, (3) provide opportunities to update a project to a changing set of standards, and (4) allow informed trades between cost, schedule, and performance while exploring operational possibilities. The development approach has been enhanced to address issues raised prior and subsequent to the FY 2000 DRR. These include (1) initiating a countermeasures mitigation program and developing capabilities to resolve issues with likely countermeasures, (2) adding test infrastructure and improving test management to allow more operationally challenging representative flight tests and providing for increased testing against more challenging targets, and (3) increasing the fidelity of the project simulations.

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BUDGET ACTIVITY
4 - Program Definition and Risk Reduction

PE NUMBER AND TITLE
0603882C Midcourse Defense Segment

PROJECT
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D. Schedule Profile	<u>FY 2000</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>
C2Sim 02			2Q					
S/CDR			2Q					
XBR CDR			1Q					
IFT-7			1Q					
IFT-8			2Q					
IFT-9			4Q					
IGT-7			1Q					
BV-3			1Q					

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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction	PE NUMBER AND TITLE 0603882C Midcourse Defense Segment	PROJECT 3010
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I. Product Development	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 2001 Cost	FY 2001 Award Date	FY 2002 Cost	FY 2002 Award Date	FY 2003 Cost	FY 2003 Award Date	Cost To Complete	Total Cost	Target Value of Contract
PRIME CONTRACTOR												
	CPAF	Boeing				2532047	N/A			CONT	CONT	CONT
GBI												
Kodiak Test Site	TBD	TBD				21700	N/A			CONT	CONT	CONT
	CPFF	Boeing				247	N/A			CONT	CONT	CONT
	TM	NRC				8519	N/A			CONT	CONT	CONT
	CPFF	Sparta				2452	N/A			CONT	CONT	CONT
	TM	Mevatec				8786	N/A			CONT	CONT	CONT
	CPFF	SY TECH				523	N/A			CONT	CONT	CONT
	TM	TBE				4067	N/A			CONT	CONT	CONT
	CPFF	Stone Engineer				2128	N/A			CONT	CONT	CONT
	CPFF	Colsa				6	N/A			CONT	CONT	CONT
	MITRE	Eng/Tech Spt				300	N/A			CONT	CONT	CONT
	MIPR	OGAs				2300	N/A			CONT	CONT	CONT
	N/A	GBI IOB				7844	N/A			CONT	CONT	CONT
	N/A	Misc Contracts				428	N/A			CONT	CONT	CONT
BMC3												
	N/A	NWSC				2236	N/A			CONT	CONT	CONT
	CPAF	TRW				4814	N/A			CONT	CONT	CONT
	FFRDC	MITRE Corp.				1895	N/A			CONT	CONT	CONT
	BPA (ITSP)	Sencom (ITSP)				626	N/A			CONT	CONT	CONT
	CPFF	Sparta				4521	N/A			CONT	CONT	CONT
	CPAF	NRC				2001	N/A			CONT	CONT	CONT
	CPFF	CST				612	N/A			CONT	CONT	CONT
	MIPR	QRI				1132	N/A			CONT	CONT	CONT
	CPAF	CSC				1158	N/A			CONT	CONT	CONT
	MIPR	USACE-GFE				2119	N/A			CONT	CONT	CONT
	MIPR	AMCOM				447	N/A			CONT	CONT	CONT

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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction					PE NUMBER AND TITLE 0603882C Midcourse Defense Segment					PROJECT 3010		
II. Support Costs	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 2001 Cost	FY 2001 Award Date	FY 2002 Cost	FY 2002 Award Date	FY 2003 Cost	FY 2003 Award Date	Cost To Complete	Total Cost	Target Value of Contract
SYSTEM ENGINEERING												
	CPFF	BMD/CSC				19807	N/A			CONT	CONT	CONT
	N/A	JNTF				1418	N/A			CONT	CONT	CONT
	N/A	DTRA				1942	N/A			CONT	CONT	CONT
	N/A	USAF/SMC/SBIRS				6133	N/A			CONT	CONT	CONT
	N/A	NSWC				3578	N/A			CONT	CONT	CONT
	MIPR	MIT/Lincoln Lab				3833	N/A			CONT	CONT	CONT
	MIPR	Misc/POET				89	N/A			CONT	CONT	CONT
DEPLOYMENT & SUSTAINMENT PLANNING (R&D)												
	CPFF	CSC				13930	N/A			CONT	CONT	CONT
	CPFF	Nichols				5185	N/A			CONT	CONT	CONT
	CPFF	Colsa				21	N/A			CONT	CONT	CONT
	CPFF	Mevatec				1376	N/A			CONT	CONT	CONT
	MIPR	SMDC				2453	N/A			CONT	CONT	CONT
	MIPR	AMCOM				4657	N/A			CONT	CONT	CONT
	MIPR	USACE				10143	N/A			CONT	CONT	CONT
	MIPR	USA War College				1454	N/A			CONT	CONT	CONT
	MIPR	Schreiver AFB				525	N/A			CONT	CONT	CONT
	MIPR	HQ AFCEE				1115	N/A			CONT	CONT	CONT
	MIPR	DOD Joint Spectrum Ctr				433	N/A			CONT	CONT	CONT
	MIPR	Hill AFB				210	N/A			CONT	CONT	CONT
	MIPR	NSA				420	N/A			CONT	CONT	CONT
	MIPR	USACECOM				53	N/A			CONT	CONT	CONT
	MIPR	ARSPACE				822	N/A			CONT	CONT	CONT
	MIPR	Alaskan Air Command				477	N/A			CONT	CONT	CONT
	MIPR	611 th ASG/FMA				4726	N/A			CONT	CONT	CONT
RDT&E Test bed Facility Construction	TBD	TBD				273121	N/A			CONT	CONT	CONT
Block 2004 Community Impacts	TBD	TBD				9700	N/A			CONT	CONT	CONT

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MANAGEMENT AND OPERATIONAL SUPPORT												
	N/A	GOVT PERS				22175	N/A			CONT	CONT	CONT
	N/A	SETA Support				70639	N/A			CONT	CONT	CONT
Subtotal Support Costs:						460435					CONT	

Remark:

III. Test and Evaluation	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 2001 Cost	FY 2001 Award Date	FY 2002 Cost	FY 2002 Award Date	FY 2003 Cost	FY 2003 Award Date	Cost To Complete	Total Cost	Target Value of Contract
TEST AND EVALUATION												
	CPFF	Colsa				4920	N/A			CONT	CONT	CONT
	CPFF	Boeing				687	N/A			CONT	CONT	CONT
	CPAF	Nichols				1598	N/A			CONT	CONT	CONT
	MIPR	USAKA				8535	N/A			CONT	CONT	CONT
	FFRDC/MIPR	Sandia				39	N/A			CONT	CONT	CONT
	OGA/MIPR	USASMDC				687	N/A			CONT	CONT	CONT
	OGA/MIPR	JNTF				252	N/A			CONT	CONT	CONT
	MIPR	VAFB				642	N/A			CONT	CONT	CONT
	TM	Mevatec				3585	N/A			CONT	CONT	CONT
	CPFF	CAS				1111	N/A			CONT	CONT	CONT
	CPFF	SY TECH				229	N/A			CONT	CONT	CONT
	OGA/MIPR	SBIRS SPO				165	N/A			CONT	CONT	CONT
	MIPR	AMCOM				680	N/A			CONT	CONT	CONT
	MIPR	USARSPACE				344	N/A			CONT	CONT	CONT
	MIPR	Eglin AFB				993	N/A			CONT	CONT	CONT
	N/A	SATCOM				329	N/A			CONT	CONT	CONT
	OGA/MIPR	OGAs				15	N/A			CONT	CONT	CONT
	N/A	RTTC				350	N/A			CONT	CONT	CONT
	N/A	DYNETC				397	N/A			CONT	CONT	CONT
	N/A	VRC				1704	N/A			CONT	CONT	CONT
	N/A	EAC				268	N/A			CONT	CONT	CONT
	N/A	TEXCOM				298	N/A			CONT	CONT	CONT
	N/A	HRED				275	N/A			CONT	CONT	CONT
	N/A	SLAD				183	N/A			CONT	CONT	CONT
	N/A	CEI				1385	N/A			CONT	CONT	CONT

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	CPFF	Colsa				199	N/A			CONT	CONT	CONT
	CPFF	TRW				1383	N/A			CONT	CONT	CONT
	N/A	Various OGAs				161	N/A			CONT	CONT	CONT
	CPFF	SAIC				613	N/A			CONT	CONT	CONT
	MIPR	MIT LLNL				1864	N/A			CONT	CONT	CONT
	CPFF	ITT				714	N/A			CONT	CONT	CONT
	OGA/MIPR	AEDC				424	N/A			CONT	CONT	CONT
	N/A	Sandia				2372	N/A			CONT	CONT	CONT
	N/A	Mevatec				57	N/A			CONT	CONT	CONT
	N/A	TBE				719	N/A			CONT	CONT	CONT
	N/A	SMDC				71	N/A			CONT	CONT	CONT
TARGETS												
	FFRDC/MIPR	Sandia				43433	N/A			CONT	CONT	CONT
	OGA/MIPR	SMDC				5347	N/A			CONT	CONT	CONT
	MIPR	SMDC				5689	N/A			CONT	CONT	CONT
	N/A	Various OGAs				15946	N/A			CONT	CONT	CONT
	MIPR	LLNL				2493	N/A			CONT	CONT	CONT
	CPFF	SY TECH				2287	N/A			CONT	CONT	CONT
Range Assets Upgrades	TBD	TBD				3000	N/A			CONT	CONT	CONT
Test Communications Upgrades	TBD	TBD				3000	N/A			CONT	CONT	CONT
Subtotal Test and Evaluation:						119443				CONT		

Remark:

IV. Management Services	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 2001 Cost	FY 2001 Award Date	FY 2002 Cost	FY 2002 Award Date	FY 2003 Cost	FY 2003 Award Date	Cost To Complete	Total Cost	Target Value of Contract
	N/A											
Subtotal Management Services:												

Remark:

Project Total Cost:						3230725					CONT	
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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction	PE NUMBER AND TITLE 0603882C Midcourse Defense Segment	PROJECT 3020
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COST (<i>In Thousands</i>)	FY 2000 Actual	FY 2001 Estimate	FY 2002 Estimate	FY 2003 Estimate	FY 2004 Estimate	FY 2005 Estimate	FY 2006 Estimate	FY 2007 Estimate	Cost to Complete	Total Cost
3020 Sea-based Midcourse	0	0	596000	0	0	0	0	0	Continuing	Continuing

A. Mission Description and Budget Item Justification

The Sea-based Midcourse project is designed to provide the capability for U.S. Navy Surface Combatants to actively defeat Mid-Range Ballistic Missiles and Inter-Continental Ballistic Missiles in the midcourse ascent phase of the exoatmospheric battlespace while forward deployed or on Fleet Missile Defense Patrol in defense of the nation, deployed U.S. forces, friends, and allies. This capability builds upon the existing Aegis Weapons System (AWS) and the STANDARD Missile (SM) infrastructure. The AWS will be evolved to support midcourse ballistic missile engagements. The Sea-based Midcourse project has three primary objectives: 1) to continue testing and complete the Navy Aegis Light-weight ExoAtmospheric Projectile (LEAP) Intercept Flight Demonstration Project (FDP) in order to demonstrate that LEAP technologies can be successfully integrated with the Navy's Standard Missile Block IV and the Aegis Weapon System; 2) to complete system design and development for a contingency sea-based ascent and midcourse ballistic missile intercept capability based on ALI and associated technologies, and to be prepared to expeditiously deploy such a project by FY 2005 in order to provide a limited capability to protect deployed U.S. and allied forces from Medium Range Ballistic Missile class threats; and 3) initiate in FY 2002 an effort which will provide a sea-based missile defense project designed to provide an ascent midcourse phase hit-to-kill capability in the FY2008-2010 timeframe against Intermediate Range Ballistic Missiles (IRBM's) and ICBM's.

Project development and testing will be conducted with an eye towards the possibility of a contingency sea-based missile defense deployment decision. Each advance will be evaluated for possible incorporation into such a project on a continuous basis. The overall program execution strategy will be to rely on the government and industry team while concurrently selecting combat system engineering agents for the FY2005 and FY2008-2010 capabilities.

2004 RDT&E Test bed – The ALI FDP currently consists of a series of near-term flight tests with the primary objective of demonstrating that LEAP technologies can be integrated with a modified SM-2 Block IV missile (called SM-3) and the AWS to successfully intercept a ballistic missile in the exoatmosphere. ALI successfully executed Flight Test Round (FTR) -1A in Jan 2001, and is scheduled to conduct an additional flight test, Flight Mission (FM)-2, in 4Q FY 2001. FM-2 is scheduled to be a Kinetic Warhead (KW) characterization flight and will include an operational Solid Divert Attitude Control System (SDACS). An additional 5 ALI flight tests, FMs 3-7, are scheduled for FY 2002. They are all intercept attempts. ALI will conclude in FY 2002.

Concept Definition – This effort provides for concept definition of the Sea-based Midcourse ascent phase intercept capability. In FY 2002, the Concept Definition phase will define system specifications and the program will award concept definition contracts encouraging the best use of known, deployed technologies, and technologies expected to be available in the 2010 timeframe. In FY 2002, risk reduction activities will be conducted to increase the technology readiness levels (TRLs) of key technologies. The program concept definition effort will investigate allocation of system specifications among ground-based and sea-based projects to achieve the best integrated segment performance at the lowest overall cost.

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BMDO RDT&E BUDGET ITEM JUSTIFICATION (R-2A Exhibit)	DATE June 2001
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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction	PE NUMBER AND TITLE 0603882C Midcourse Defense Segment	PROJECT 3020
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FY 2000 Accomplishments:

- A portion of the FY 2000 Funding for the Midcourse Defense Segment exists and is provided under Project 2400, Program Element 0603871C, and Project 1266, Program Element 0603868C.

Total

FY 2001 Planned Program:

- A portion of the FY 2001 Funding for the Midcourse Defense Segment exists and is provided under Project 2400, Program Element 0603871C, and Project 1266, Program Element 0603868C.

Total

FY 2002 Planned Program:

- **260000 RDT&E 2004 (ALI Contingency)**
Continue planning and execution of the ALI FDP, FM-3, FM-4, FM-5, FM-6, and FM-7 test events. Perform data reduction and analysis. Perform SM-3 SDACS qualification activities. Complete the development and manufacturing of ALI FTRs and associated ground hardware and test equipment. Complete AWS development engineering to support the ALI program. Begin engineering development of the Block 2004 Sea-based Midcourse expanding test infrastructure. Initiate procurement of test rounds and targets for threat representative testing.
- **336000 Concept Definition**
Initiate concept definition studies for the Sea-based Midcourse capability against intermediate and long range threats. Monitor and support contractor studies by government teams. Perform key technology risk reduction activities in the areas of ship integration, weapons control, radar suite, missile/launcher and BMC2/communications.

Total 596000 Sea-based Midcourse

B. Other Program Funding Summary	<u>FY 2000</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>	To <u>Compl</u>	Total <u>Cost</u>
PE 0603871C, NMD-PDRR	944922	1853877								
PE 0208871C, NMD-Proc		73845								
PE 0603868C, NTW-PDRR	368769	456372								

C. Acquisition Strategy: The Department has restructured the missile defense acquisition strategy into a multi-path approach to assure that the most effective missile defense is available at the earliest possible time. The best approach (competitive or selected source) will be determined after considering all the technical and management

BMDO RDT&E BUDGET ITEM JUSTIFICATION (R-2A Exhibit) DATE **June 2001**

BUDGET ACTIVITY
4 - Program Definition and Risk Reduction

PE NUMBER AND TITLE PROJECT
0603882C Midcourse Defense Segment **3020**

aspects of the program. Current development activities supporting the Aegis (Light-weight ExoAtmospheric Projectile (LEAP) Intercept could be used in order to provide a limited capability to protect deployed U.S. and allied forces.

D. Schedule Profile	<u>FY 2000</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>
Flight Mission 3			1Q					
Flight Mission 4			2Q					
Flight Mission 5			3Q					
Flight Mission 6			4Q					
Flight Mission 7			4Q					

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BMDO RDT&E COST ANALYSIS (R-3)	DATE June 2001
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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction	PE NUMBER AND TITLE 0603882C Midcourse Defense Segment	PROJECT 3020
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I. Product Development	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 2001 Cost	FY 2001 Award Date	FY 2002 Cost	FY 2002 Award Date	FY 2003 Cost	FY 2003 Award Date	Cost To Complete	Total Cost	Target Value of Contract
ALI												
AWS/VLS Development	CPAF	Lockheed Martin				15000	N/A			CONT	CONT	CONT
Missile Development	CPIF/AF	Raytheon				68000	N/A			CONT	CONT	CONT
VLS Development	CPAF	United Defense				1000	N/A			CONT	CONT	CONT
AWS Development	WR	Pearl Harbor NSY				500	N/A			CONT	CONT	CONT
AWS Development	RC	SUPSHIP				800	N/A			CONT	CONT	CONT
Sea-based Midcourse Contingency												
Missile Development	CPIF/AF	Raytheon				100000	N/A			CONT	CONT	CONT
Concept Definition												
Concept Definition-BAA	TBD	Competitive				60000	N/A			CONT	CONT	CONT
Risk Reduction Activity	CPAF	Lockheed Martin				67000	N/A			CONT	CONT	CONT
Risk Reduction Activity	CPAF	Raytheon				110150	N/A			CONT	CONT	CONT
Risk Reduction Activity	CPFF	JHU/APL				7640	N/A			CONT	CONT	CONT
Risk Reduction Activity	WR	NSWC/DD				12700	N/A			CONT	CONT	CONT
Risk Reduction Activity	WR	NAWC/CL				5085	N/A			CONT	CONT	CONT
Risk Reduction Activity	MIPR	MIT/LL				15255	N/A			CONT	CONT	CONT
Risk Reduction Activity	WR	NSWC/CD				10170	N/A			CONT	CONT	CONT
Subtotal Product Development:						473300					CONT	

Remark:

II. Support Costs	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 2001 Cost	FY 2001 Award Date	FY 2002 Cost	FY 2002 Award Date	FY 2003 Cost	FY 2003 Award Date	Cost To Complete	Total Cost	Target Value of Contract
System Engineering												
	CPFF	JHU/APL				16550	N/A			CONT	CONT	CONT
	MIPR	MIT/LL				7500	N/A			CONT	CONT	CONT
	WR	NSWC/DD				11800	N/A			CONT	CONT	CONT
	WR	NSWC/CD				2550	N/A			CONT	CONT	CONT
	WR	NSWC/IH				1250	N/A			CONT	CONT	CONT

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BMDO RDT&E COST ANALYSIS (R-3)										DATE June 2001		
BUDGET ACTIVITY 4 - Program Definition and Risk Reduction					PE NUMBER AND TITLE 0603882C Midcourse Defense Segment					PROJECT 3020		
	WR	NSWC/PHD				6250	N/A			CONT	CONT	CONT
	WR	NAWC/CL				4150	N/A			CONT	CONT	CONT
	WR	NWAS				950	N/A			CONT	CONT	CONT
	MIPR	BMPCOE				1200	N/A			CONT	CONT	CONT
	TBD	BMDO				16000						
Subtotal Support Costs:						68200					CONT	
Remark:												
III. Test and Evaluation	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 2001 Cost	FY 2001 Award Date	FY 2002 Cost	FY 2002 Award Date	FY 2003 Cost	FY 2003 Award Date	Cost To Complete	Total Cost	Target Value of Contract
DT&E	WR	PMRF				8528	N/A			CONT	CONT	CONT
DT&E	WR	NAWC/PM				3462	N/A			CONT	CONT	CONT
DT&E	WR	NSWC/DD				2346	N/A			CONT	CONT	CONT
DT&E	WR	NSWC/PHD				2346	N/A			CONT	CONT	CONT
DT&E	WR	NWAS				815	N/A			CONT	CONT	CONT
DT&E	MIPR	NAIC				1173	N/A			CONT	CONT	CONT
DT&E	MIPR	National Assess Gp				865	N/A			CONT	CONT	CONT
DT&E	CPFF	JHU/APL				2346	N/A			CONT	CONT	CONT
DT&E	MIPR	SMDC				6000	N/A			CONT	CONT	CONT
DT&E	MIPR	TETRATECH				246	N/A			CONT	CONT	CONT
DT&E	WR	AIRPAC				250	N/A			CONT	CONT	CONT
DT&E	WR	COMOPTEVFOR				223	N/A			CONT	CONT	CONT
Subtotal Test and Evaluation:						28600					CONT	
Remark:												
IV. Management Services	Contract Method & Type	Performing Activity & Location	Total PYs Cost	FY 2001 Cost	FY 2001 Award Date	FY 2002 Cost	FY 2002 Award Date	FY 2003 Cost	FY 2003 Award Date	Cost To Complete	Total Cost	Target Value of Contract
Program Management	MIPR	Anteon				16550	N/A			CONT	CONT	CONT
Program Management	CPFF	Paradigm				4150	N/A			CONT	CONT	CONT
Internal Operating		Govt Salary				4500	N/A			CONT	CONT	CONT
Internal Operating		Operating Funds				700	N/A			CONT	CONT	CONT
Subtotal Management Services:						25900				CONT	CONT	CONT
Remark:												
Project Total Cost:						596000					CONT	
Remark:												

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BMDO RDT&E BUDGET ITEM JUSTIFICATION (R-2A Exhibit)	DATE June 2001
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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction	PE NUMBER AND TITLE 0603882C Midcourse Defense Segment	PROJECT 3050
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COST (<i>In Thousands</i>)	FY 2000 Actual	FY 2001 Estimate	FY 2002 Estimate	FY 2003 Estimate	FY 2004 Estimate	FY 2005 Estimate	FY 2006 Estimate	FY 2007 Estimate	Cost to Complete	Total Cost
3050 Systems Engineering and Integration	0	0	44000	0	0	0	0	0	Continuing	Continuing

A. Mission Description and Budget Item Justification

This project funds risk reduction and the countermeasures mitigations initially addressing a few reentry vehicles with simple capabilities and expanding to complex countermeasures mitigation with several reentry vehicles.

Risk Reduction – In FY 2002, a complementary EKV program will begin. The complementary EKV is an effort to develop a kill vehicle utilizing latest technology to provide total risk mitigation. This will allow for potential common EKV for Ground and Sea-based Midcourse Defense. Development will be based on insertion of new technology and lessons learned from existing EKV developments. The program is planned to include design, testing and project insertion, where appropriate, into the block development approach.

Counter/Countermeasures – The counter/countermeasures effort identifies, develops, and demonstrates solutions to improve the performance of missile defense projects against countermeasure suites. Solutions with potential to improve the capabilities against countermeasures will be incorporated into a block upgrade. Intelligence estimates indicate that the ballistic missile threat is rapidly changing, especially the ability of States of Concern to develop and deploy countermeasures in response to missile defense programs. This results in greater uncertainty in the threat-based requirements for the midcourse. To minimize the programmatic impacts resulting from this uncertainty, the program is transitioning from threat point-designs to a capability-based approach. This requires a process to identify and prioritize solutions to credible countermeasures for integration into the program, and requires increased robustness in the test program to incorporate testing against a broader range of credible threats.

FY 2000 Accomplishments:

- A portion of the FY 2000 Funding for the Midcourse Defense Segment exists and is provided under Project 2400, Program Element 0603871C, and Project 1266, Program Element 0603868C.

Total

FY 2001 Planned Program:

- A portion of the FY 2001 Funding for the Midcourse Defense Segment exists and is provided under Project 2400, Program Element 0603871C, and Project 1266, Program Element 0603868C.

Total

BMDO RDT&E BUDGET ITEM JUSTIFICATION (R-2A Exhibit)	DATE June 2001
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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction	PE NUMBER AND TITLE 0603882C Midcourse Defense Segment	PROJECT 3050
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FY 2002 Planned Program:

- **30000 Risk Reduction**
Government Operations and Oversight: Initiate complementary EKV effort to reduce susceptibility to countermeasures and protect the program from current potential threat technological advances.

- **14000 Counter/Countermeasures**
Government Operations and Oversight: Initiate counter/countermeasures effort. The program is responsible for determining the capability of the baseline projects against credible countermeasure suites; identifying candidate solutions to address performance shortfalls; conducting ground tests against digital models of countermeasure suites; planning the integration of successful improvements into program block upgrades; and identifying candidate ground and sea-based midcourse solutions to credible countermeasures.

Total 44000 Systems Engineering & Integration

B. <u>Other Program Funding Summary</u>	<u>FY 2000</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>	To <u>Compl</u>	Total <u>Cost</u>
PE 0603871C, NMD-PDRR	944922	1853877								
PE 0208871C, NMD-Proc		73845								
PE 0603868C, NTW-PDRR	368769	456372								

C. Acquisition Strategy: The System Engineering and Integration project will include risk reduction activities for Ground- and Sea-based Midcourse Defense projects and counter/countermeasures that are capability rather than threat based. MDS will participate in a BMDO countermeasures program that will focus on identifying threat countermeasures that may not yet be evident, but are physically plausible and technically feasible. The program will then identify and develop solutions to improve the capability of ballistic missile defense projects to defeat those countermeasures. Solutions that successfully demonstrate an improvement in MDS project performance will be integrated into the block development program. For the complementary EKV, multiple EKV design efforts will be initially funded with down select to the most promising design. A complementary EKV will allow the program to take advantage of the performance capability strengths of the multiple EKVs, and structure follow-on acquisition of EKVs to give the Ground-based Midcourse project the most effective missile defense capability.

D. <u>Schedule Profile</u>	<u>FY 2000</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>
Complementary EKV SRR			2Q					

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BMDO RDT&E COST ANALYSIS (R-3)										DATE June 2001		
BUDGET ACTIVITY 4 - Program Definition and Risk Reduction					PE NUMBER AND TITLE 0603882C Midcourse Defense Segment					PROJECT 3050		
I. Product Development	Contract Method & Type	Performing Activity & Location	Total PYs Cost	<u>FY 2001</u> Cost	<u>FY 2001</u> Award Date	<u>FY 2002</u> Cost	<u>FY 2002</u> Award Date	<u>FY 2003</u> Cost	<u>FY 2003</u> Award Date	Cost To Complete	Total Cost	Target Value of Contract
	N/A											
Subtotal Product Development:												
Remark:												
II. Support Costs	Contract Method & Type	Performing Activity & Location	Total PYs Cost	<u>FY 2001</u> Cost	<u>FY 2001</u> Award Date	<u>FY 2002</u> Cost	<u>FY 2002</u> Award Date	<u>FY 2003</u> Cost	<u>FY 2003</u> Award Date	Cost To Complete	Total Cost	Target Value of Contract
SYSTEM ENGINEERING												
Concept Definition	TBD	TBD				30000	N/A			CONT	CONT	CONT
Counter/Countermeasures	TBD	TBD				14000	N/A			CONT	CONT	CONT
Subtotal Support Costs:						44000					CONT	
Remark:												
III. Test and Evaluation	Contract Method & Type	Performing Activity & Location	Total PYs Cost	<u>FY 2001</u> Cost	<u>FY 2001</u> Award Date	<u>FY 2002</u> Cost	<u>FY 2002</u> Award Date	<u>FY 2003</u> Cost	<u>FY 2003</u> Award Date	Cost To Complete	Total Cost	Target Value of Contract
	N/A											
Subtotal Test and Evaluation:												
Remark:												
IV. Management Services	Contract Method & Type	Performing Activity & Location	Total PYs Cost	<u>FY 2001</u> Cost	<u>FY 2001</u> Award Date	<u>FY 2002</u> Cost	<u>FY 2002</u> Award Date	<u>FY 2003</u> Cost	<u>FY 2003</u> Award Date	Cost To Complete	Total Cost	Target Value of Contract
	N/A											
Subtotal Management Services:												
Remark:												
Project Total Cost:						44000				CONT		
Remark:												
Project 3050												

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BMDO RDT&E BUDGET ITEM JUSTIFICATION (R-2A Exhibit)								DATE June 2001		
BUDGET ACTIVITY 4 - Program Definition and Risk Reduction				PE NUMBER AND TITLE 0603882C Midcourse Defense Segment				PROJECT 3090		
<i>COST (In Thousands)</i>	FY 2000 Actual	FY 2001 Estimate	FY 2002 Estimate	FY 2003 Estimate	FY 2004 Estimate	FY 2005 Estimate	FY 2006 Estimate	FY 2007 Estimate	Cost to Complete	Total Cost
3090 Program Operations	0	0	69809	0	0	0	0	0	Continuing	Continuing
<p>A. <u>Mission Description and Budget Item Justification</u></p> <p>This project covers personnel and related facility support costs, statutory and fiscal requirements, support service contracts and the BMDO Data Centers Programs.</p> <p>Personnel covers government civilians performing program-wide oversight functions such as financial management, contracting, security, information systems support, and legal services at the Ballistic Missile Defense Organization located within the Washington D.C. area, as well as BMDO's Executing Agents within the US Army Space & Missile Defense Command, US Army PEO Air and Missile Defense, US Navy PEO for Theater Surface Combatants, US Air Force and the Joint National Test Facility. Related facility costs include rents, utilities, supplies, ADP equipment, and all the associated operation and maintenance activities.</p> <p>Fiscal Requirements include reimbursable services acquired through the Defense Working Capital Fund such as accounting services provided by the Defense Finance and Accounting Services (DFAS); reserves for special termination costs on designated contracts; and provisions for terminating other programs as required. BMDO has additional requirements to provide for foreign currency fluctuations on its limited number of foreign contracts. Statutory requirements include funding for charges to canceled appropriations in accordance with Public Law 101-510.</p> <p>Assistance required to support BMD program-wide management functions is also contained in this project. This assistance ranges from operational contracts to support functions such as ADP operations, Access control offices and graphics support, to efforts required to supplement BMDO and Executing Agent government personnel. Typical efforts include cost estimating, security management, information management, technology integration across BMDO projects and assessment of schedule, cost and performance, with attendant documentation of the many related programmatic issues. The requirements for this area are based on most economical and efficient utilization of contractors versus government personnel.</p> <p>This project also includes the BMDO Data Centers Programs. The BMDO Data Centers Information System Program Manager provides management, oversight, technical assistance, and expertise for the BMDO Data Centers Programs. The BMDO Data Centers Program archives, manages, and develops data products, distributes and provides remote access to all relevant BMD data. Operation and management of Data Center activities is accomplished at several sites, each site specializing in a particular discipline. Taskings include providing assessments for technical/programmatic issues and data center performance, coordinating segment customer program/data management requirements, and cooperative partnership requirements.</p> <p>FY 2000 Accomplishments:</p>										
Project 3090			<i>Page 22 of 24 Pages</i>				Exhibit R-2A (PE 0603882C)			

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BMDO RDT&E BUDGET ITEM JUSTIFICATION (R-2A Exhibit)	DATE June 2001
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BUDGET ACTIVITY 4 - Program Definition and Risk Reduction	PE NUMBER AND TITLE 0603882C Midcourse Defense Segment
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- A portion of the FY 2000 Funding for the Midcourse Defense Segment exists and is provided under Project 2400, Program Element 0603871C, and Project 1266, Program Element 0603868C.

Total

FY 2001 Planned Program:

- A portion of the FY 2001 Funding for the Midcourse Defense Segment exists and is provided under Project 2400, Program Element 0603871C, and Project 1266, Program Element 0603868C.

Total

FY 2002 Planned Program:

- **69809 Program Operations**
Provides management and support for overhead/indirect fixed costs such as civilian payroll, travel, rents & utilities, supplies and the data centers programs.

Total 69809 Program Operations

B. <u>Other Program Funding Summary</u>	<u>FY 2000</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>	<u>To Compl</u>	<u>Total Cost</u>
PE 0603871C, NMD-PDRR	944922	1853877								
PE 0208871C, NMD-Proc		73845								
PE 0603868C, NTW-PDRR	368769	456372								

C. Acquisition Strategy: The Department has restructured the missile defense acquisition strategy into a multi-path approach to assure that the most effective missile defense is available at the earliest possible time. This project will support technical and management aspects of the program as the program determines the best approaches to Midcourse Defense.

D. <u>Schedule Profile</u>	<u>FY 2000</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>
N/A								

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BMDO RDT&E COST ANALYSIS (R-3)										DATE June 2001		
BUDGET ACTIVITY 4 - Program Definition and Risk Reduction					PE NUMBER AND TITLE 0603882C Midcourse Defense Segment					PROJECT 3090		
I. Product Development	Contract Method & Type	Performing Activity & Location	Total PYs Cost	<u>FY 2001</u> Cost	<u>FY 2001</u> Award Date	<u>FY 2002</u> Cost	<u>FY 2002</u> Award Date	<u>FY 2003</u> Cost	<u>FY 2003</u> Award Date	Cost To Complete	Total Cost	Target Value of Contract
	N/A											
Subtotal Product Development:												
Remark:												
II. Support Costs	Contract Method & Type	Performing Activity & Location	Total PYs Cost	<u>FY 2001</u> Cost	<u>FY 2001</u> Award Date	<u>FY 2002</u> Cost	<u>FY 2002</u> Award Date	<u>FY 2003</u> Cost	<u>FY 2003</u> Award Date	Cost To Complete	Total Cost	Target Value of Contract
MANAGEMENT AND OPERATIONAL SUPPORT												
	CPAF/CPFF	CSC				20923	N/A			CONT	CONT	CONT
	N/A	SFAE-MD				2480	N/A			CONT	CONT	CONT
	N/A	GOVT PERS				3121	N/A			CONT	CONT	CONT
	N/A	USSPACECOM				6450	N/A			CONT	CONT	CONT
	N/A	Operational accounts				22474	N/A			CONT	CONT	CONT
	N/A	GOVT PERS (HSV)				11240	N/A			CONT	CONT	CONT
	N/A	C2 Radar				3121	N/A			CONT	CONT	CONT
Subtotal Support Costs:						69809					CONT	
Remark:												
III. Test and Evaluation	Contract Method & Type	Performing Activity & Location	Total PYs Cost	<u>FY 2001</u> Cost	<u>FY 2001</u> Award Date	<u>FY 2002</u> Cost	<u>FY 2002</u> Award Date	<u>FY 2003</u> Cost	<u>FY 2003</u> Award Date	Cost To Complete	Total Cost	Target Value of Contract
	N/A											
Subtotal Test and Evaluation:												
Remark:												
IV. Management Services	Contract Method & Type	Performing Activity & Location	Total PYs Cost	<u>FY 2001</u> Cost	<u>FY 2001</u> Award Date	<u>FY 2002</u> Cost	<u>FY 2002</u> Award Date	<u>FY 2003</u> Cost	<u>FY 2003</u> Award Date	Cost To Complete	Total Cost	Target Value of Contract
	N/A											
Subtotal Management Services:												
Remark:												
Project Total Cost:						69809					CONT	
Remark:												
Project 3090												