STATEMENT OF

THE HONORABLE JOHN J. YOUNG, JR.
ASSISTANT SECRETARY OF THE NAVY
(RESEARCH, DEVELOPMENT, AND ACQUISITION)

AND

VADM JOSEPH A. SESTAK, JR.
DEPUTY CHIEF OF NAVAL OPERATIONS
WARFARE REQUIREMENTS AND PROGRAMS

AND

BGEN MARTIN POST
ASSISTANT DEPUTY COMMANDANT FOR AVIATION

BEFORE THE

AIRLAND SUBCOMMITTEE

OF THE

SENATE ARMED SERVICES COMMITTEE

ON

FY 2006 NAVY & MARINE CORPS TACTICAL AVIATION PROGRAMS

APRIL 6, 2005
Mr. Chairman, distinguished members of the Subcommittee, thank you for this opportunity to appear before you to discuss the Department of the Navy’s Fiscal Year 2006 Acquisition and RDT&E programs.

In multiple theaters in the Global War on Terror (GWOT) today, your Navy and Marine Corps Team is involved in a range of operations, from combat ashore to Extended Maritime Interdiction Operations (EMIO) at sea. EMIO serves as a key maritime component of GWOT, and its purpose is to deter, delay and disrupt the movement of terrorists and terrorist-related materials at sea. Your Team has conducted over 2,200 boardings in this last year alone, even as it has flown more than 3,000 sorties while dropping more than 100,000 pounds of ordnance from sea-based tactical aircraft in Iraq; and providing nearly 5,000 hours of dedicated surveillance in and around Iraq to coalition forces.

At the same time, our Nation took advantage of the immediate global access provided by Naval forces to bring time-critical assistance to tsunami victims in South Asia. By seabasing our relief efforts in Operation UNIFIED ASSISTANCE, the ABRAHAM LINCOLN Carrier Strike Group (CSG) and the BONHOMME RICHARD Expeditionary Strike Group (ESG) -- with Marines from the 15th Marine Expeditionary Unit -- delivered more than 6,000,000 pounds of relief supplies and equipment quickly, and with more political acceptance than may have been possible if a larger footprint ashore might have been required.

The Fiscal Year 2006 Budget request maximizes our Nation’s return on its investment by positioning us to meet today’s challenges -- from peacekeeping/stability operations to GWOT operations and small-scale contingencies -- and by transforming the force for future challenges.

**Your Future Navy and Marine Corps Team**

We developed the Sea Power 21 vision in support of our National Military Strategy. The objective of Sea Power 21 is to ensure this nation possesses credible combat capability on scene to promote regional stability, to deter aggression throughout the world, to assure access of Joint forces and to fight and win should deterrence fail. Sea Power 21 guides the Navy’s transformation from a threat– based platform centric structure to a capabilities-based, fully integrated force. The pillars of Sea Power 21 -- Sea Strike, Sea Shield, and Sea Base -- are integrated by FORCEnet, the means by which the power of sensors, networks, weapons, warriors and platforms are harnessed in a networked combat force. This networked force will provide the strategic agility and persistence necessary to prevail in the continuing GWOT, as well as the speed and overwhelming power to seize the initiative and swiftly defeat any regional peer competitor in Major Combat Operations (MCO).

The Navy and Marine Corps Team of the future must be capabilities-based and threat-oriented. Through agility and persistence, our Navy and Marine Corps Team needs to be poised for the "close-in knife fight" that is the GWOT, able to act immediately to a fleeting target. The challenge is to simultaneously “set the conditions” for a MCO while continuing to fight the GWOT, with the understanding that the capabilities required for the GWOT cannot necessarily be assumed to be a lesser-included case of an MCO. Our force must be the right mix of capabilities that balances persistence and agility with power and speed in order to fight the GWOT while prepared to win a MCO. To do so, it must be properly postured in terms of greater
operational availability from platforms that are much more capable as a distributed, networked
force. While the fabric of our fighting force will still be the power and speed needed to seize the
initiative and swiftly defeat any regional threat, FORCEnet’s pervasive awareness (C4ISR) will
be more important than mass. And, because of its access from the sea, the Navy and Marine
Corps are focusing significant effort and analysis in support of joint combat power projection by
leveraging the maneuver space of the oceans through Seabasing. Seabasing is a national
capability that will project and sustain naval power and joint forces, assuring joint access by
leveraging the operational maneuver of sovereign, distributed and fully networked forces
operating globally from the sea, while accelerating expeditionary deployment and employment
timelines. The Seabased Navy will be distributed, netted, immediately employable and rapidly
deployable, greatly increasing its operational availability through innovative concepts such as,
for example, Sea Swap and the Fleet Response Plan. At the same time, innovative
transformational platforms under development such as MPF(F), LHA(R) and High-Speed
Connectors, will be instrumental to the Sea Base.

To this end, the technological innovations and human-systems integration advances in future
warships are critical. Our future warships will sustain operations in forward areas longer, be
able to respond more quickly to emerging contingencies, and generate more sorties and
simultaneous attacks against greater numbers of multiple aimpoints and targets with greater
effect than our current fleet. The future is about the capabilities posture of the fleet. Our
analyses is unveiling the type and mix of capabilities of the future fleet and has moved us away
from point solutions towards a range of 260 - 325 ships that meet all warfighting requirements
and hedges against the uncertainty of alternate futures.

Developing Transformational Joint Seabasing Capabilities

The Naval Power 21 vision defines the capabilities that the 21st Century Navy and Marine Corps
Team will deliver. Our overarching transformational operating concept is Sea Basing; a national
capability, for projecting and sustaining naval power and joint forces that assures joint access by
leveraging the operational maneuver of sovereign, distributed, and networked forces operating
globally from the sea. Seabasing unifies our capabilities for projecting offensive power,
defensive power, command and control, mobility and sustainment around the world. It will
enable commanders to generate high tempo operational maneuver by making use of the sea as a
means of gaining and maintaining advantage.

**Sea Shield** is the projection of layered defensive power. It seeks maritime superiority to assure
access, and to project defense overland.

**Sea Strike** is the projection of precise and persistent offensive power. It leverages persistence,
precision, stealth, and new force packaging concepts to increase operational tempo and reach. It
includes strikes by air, missiles, and maneuver by Marine Air Ground Task Forces (MAGTF)
supported by sea based air and long-range gunfires.

**Sea Base** is the projection of operational independence. It provides the Joint Force Commander
the ability to exploit EMW, and the capability to retain command and control and logistics at
mobile, secure locations at sea.
**FORCEnet** is the operational construct and architectural framework for naval warfare in the joint, information age. It integrates warriors, sensors, networks, command and control, platforms and weapons into a networked, distributed combat system.

**Sea Trial** is the Navy’s recently created process for formulating and testing innovative operational concepts, most of which harness advanced technologies and are often combined with new organizational configurations, in pursuit of dramatic improvements in warfighting effectiveness. Sea Trial concept development and experimentation (CD&E) is being conducted in close coordination with, the Marine Corps combat/force development process and reflects a sustained commitment to innovation. These efforts tie warfare innovation to the core operational challenges facing the future joint force.

As a means of accelerating our investment in Naval Power 21, we employ the Naval Capability Development Process (NCDP) and Expeditionary Force Development System (EFDS). The NCDP and EFDS take a concepts-to-capabilities approach to direct investment to achieve future warfighting wholeness. The NCDP takes a sea-based, offensive approach that provides power projection and access with distributed and networked forces featuring unmanned and off-board nodes with penetrating surveillance via pervasive sensing and displaying that rapidly deliver precision effects. The EFDS assesses, analyzes and integrates MAGTF warfighting concepts, and requirements in a Naval and joint context to support the overarching operational concept of Joint Seabasing. Both processes are designed to incorporate innovative products of Service and Joint CD&E and Science and Technology (S&T) efforts.

The Fiscal Year 2006 Budget request reflects the investments that will most improve our warfighting capability by developing and investing in future sea based and expeditionary capabilities for the Navy and Marine Corps. We will briefly summarize our programs, and address transformation of our capability pillars by describing some of the key aviation enablers.

**AVIATION PROGRAMS**

The Fiscal Year 2006 President’s Budget request balances continued recapitalization in obtaining new capabilities and reducing operating costs while simultaneously sustaining the legacy fleet aircraft that are performing magnificently in current operations. Taking advantage of multi-year procurement (MYP) to achieve significant savings in procurement accounts, the Navy has entered numerous MYP contracts that will define the future of weapons systems and further investment. The Department’s Fiscal Year 2006 Budget request continues MYP arrangements for the F/A-18E/F (both airframe and engine), the KC-130J, the MH-60S, the MH-60S/R Common Cockpit, and the E-2C to maximize the return on our investment. Our proposed plan will procure 44 tactical, fixed wing aircraft (38 F/A-18E/F aircraft, 4 EA-18G System Development and Demonstration assets, and two E-2C aircraft), as well as 26 MH-60S, 12 MH-60R, 9 MV-22, and 10 upgraded UH-1Y/AH-1Z helicopters. This plan also continues the development of the F-35, the E-2C Advanced Hawkeye, the EA-18G, the Multi-mission Maritime Aircraft (MMA), the Aerial Common Sensor (ACS), and the Presidential Helicopter Replacement Aircraft (VXX), and initiates development of the Heavy Lift Replacement (HLR, CH-53X) aircraft.
Multi-mission Maritime Aircraft (MMA)/P-3C

The future for the Navy's maritime patrol force includes plans for sustainment, modernization, and re-capitalization of the force. Results of the P-3 Service Life Assessment Program (SLAP) have revealed the need for an aggressive approach to P-3 airframe sustainment. Key elements of the sustainment plan are strict management of requirements and flight hour use, special structural inspections to keep the aircraft safely flying, and increased use of simulators to satisfy training requirements. The Fiscal Year 2006 Budget request reflects $74.5M for Special Structural Inspections (SSI) and Special Structural Inspections - Kits (SSI-K), which will allow for sustainment and continued operation of approximately 166 aircraft. As the sustainment plan progresses, the inventory may be further reduced to a number approaching 130 aircraft. The Fiscal Year 2006 Budget request also reflects a modernization budget of $51.3M for continued procurement and installation of the USQ-78B acoustic processor and for completion of final installations of Anti-Surface Warfare Improvement Program (AIP) kits. We are working on plans for further mission system modernization to allow us to continue meeting COCOM requirements. To recapitalize these critical aircraft, the Navy is procuring a MMA. The MMA program entered System Development and Demonstration (SDD) phase in May 2004 and awarded a contract to the Boeing Corporation for a 737 commercial derivative aircraft. The Fiscal Year 2006 Budget requests $964.1M for continuation of MMA SDD. Our comprehensive and balanced approach has allowed for re-capitalization of these critical assets.

MH-60R and MH-60S

The Fiscal Year 2006 Budget requests $655.5M in procurement and $48.1M in RDT&E for the replacement of the Light Airborne Multi-Purpose System (LAMPS) MK III SH-60B and carrier-based SH-60F helicopters with the new configuration designated as MH-60R. The procurement quantity was reduced to provide an orderly production ramp. A Full Rate Production decision is scheduled during the second quarter of Fiscal Year 2006.

The Fiscal Year 2006 Budget requests $608.7M in procurement and $78.6M in RDT&E funds for the MH-60S, which is the Navy’s primary combat support helicopter designed to support Carrier and Expeditionary Strike Groups. It will replace four legacy platforms with a newly manufactured H-60 airframe. The MH-60S is currently in the full rate five-year MYP contract with the Army. The Army and Navy intend to execute another platform MYP contract commencing in Fiscal Year 2007. Navy’s total procurement requirement was increased from 237 to 271 to provide a force structure that supports the Navy-approved Helicopter concept of operations.

AIM-9X

The Fiscal Year 2006 Budget requests $37.8M for 165 missiles. AIM-9X continues deployment to operational sites after a successful Full Rate Production decision last year.
SEA STRIKE

F/A-18 E/F

The F/A-18E/F continues to transition into the fleet, improving the survivability and strike capability of the carrier air wing. The Super Hornet provides a 40 percent increase in combat radius, 50 percent increase in endurance, and 25 percent increase in weapons payload over our older Hornets. Over 300 F/A-18E/Fs have been procured through Fiscal Year 2005, on track to complete procurement of the program of record 462 aircraft in 2011. The Fiscal Year 2006 Budget requests $2.82B for 38 F/A-18 E/F aircraft for the second year of the five-year MYP contract (Fiscal Year 2005 to 2009). The Super Hornet has used a spiral development approach to incorporate new technologies, such as the Joint Helmet Mounted Cueing System, Advanced Targeting FLIR, Shared Reconnaissance Pod System and Multifunctional Information Distribution System data link. The first Low Rate Initial Production Advanced Electronically Scanned Antenna Radar system has been delivered to Boeing for installation into an F/A-18 and will undergo operational testing in 2006.

F-35 Joint Strike Fighter (JSF)

Our recapitalization plan includes the JSF, a stealthy, multi-role fighter aircraft designed jointly to be an enabler for Naval Power 21. The Fiscal Year 2006 Budget request contains $2.4B for continuation of System Development and Demonstration on the JSF. The JSF will enhance the DON’s precision strike capability with unprecedented stealth, range, sensor fusion, improved radar performance, combat identification and electronic attack capabilities compared to legacy platforms. The carrier variant (CV) JSF complements the F/A-18E/F and EA-18G in providing long-range strike capability and much improved persistence over the battlefield. The short takeoff and vertical landing (STOVL) JSF combines the multi-role versatility of the F/A-18 and the basing flexibility of the AV-8B. The commonality designed into the JSF program will reduce acquisition and operating costs of Navy and Marine Corps tactical aircraft and allow enhanced interoperability with our Allies and sister Services.

The JSF has completed the third year of its development program, and the program continues working to translate concept designs to three producible variants. Manufacture/assembly of the first flight test aircraft conventional takeoff and landing (CTOL) is underway and roughly 40% complete, with assembly times much less than planned. Two thousand engine test hours have been completed through mid-January 2005. Detailed design work continues for the CTOL and STOVL variants. First flight is scheduled for 2006. The JSF program has aggressively addressed the performance issues associated with weight and airframe design. The STOVL variant weight has been reduced by 2500 lbs. through design optimization. Installed thrust improvements and aerodynamic drag reduction as well as requirements tailoring are being incorporated to further improve aerodynamic performance. All three variants are projected to meet Key Performance Parameter requirements.

The JSF program is completing a replan effort that began approximately a year ago. The software block plan and test plan are being reviewed consistent with the revised schedule and Service needs. The Fiscal Year 2006 Budget reflects the revised System Development and Demonstration production schedule.
The MV-22 remains the Marine Corps’ number one aviation acquisition priority. The Osprey’s increased range, speed, payload, and survivability will generate transformational tactical and operational capabilities. Ospreys will replace the aging Marine fleets of CH-46E and CH-53D helicopters beginning in Fiscal Year 2005, which will provide both strategic and tactical flexibility to meet emerging threats in the GWOT. Utilization far above peacetime rates, and the physical demands of continuous operations in the harsh conditions of Iraq and Afghanistan, are accelerating the deterioration and increasing operating costs of the legacy aircraft that the MV-22 will replace. These factors make a timely fielding of the MV-22 critical.

The Fiscal Year 2006 Budget request includes $1.3B for nine MV-22s, trainer modifications and retrofits and $206.4M for continued development, testing and evaluation. The V-22 Osprey resumed flight-testing in May 2002, and it has flown in excess of 4900 hours. The Commander Operational Test and Evaluation Force (COTF) Letter of Observation was completed in February 2005 to support Section 123 Certification to Congress to allow the program to increase production above minimum sustaining rate of 11 aircraft. Operational Evaluation began on March 28, 2005, and should lead to Full Rate Production in early Fiscal Year 2006.

Heavy Lift Replacement Program (HLR, CH-53X)

The Fiscal Year 2006 Budget requests $272M RDT&E to begin the SDD phase of the HLR program that will replace the aging fleet of CH-53E platforms. The Marine Corps’ CH-53E continues to demonstrate its value as an expeditionary heavy-lift platform, with significant assault support contributions in Afghanistan, the Horn of Africa and Iraq. Vertical heavy lift will be critical to successful operations in anti-access, area-denial environments globally, enabling force application and focused logistics envisioned within the joint operating concepts. The CH-53E requires significant design enhancements to meet future interoperability requirements, improve survivability, expand range and payload performance, improve cargo handling and turn-around capabilities, and reduce operations and support costs. An Analysis of Alternatives determined that a “new build” helicopter would be the most cost-effective solution. The Operational Requirements Document defining HLR capabilities was approved in December 2004. The HLR will fill the vertical heavy lift requirement not resident in any other platform that is necessary for force application and focused logistics envisioned in Sea Basing and joint operating concepts. With the ability to transport 27,000 pounds to distances of 110 nautical miles under most environmental conditions, commanders will have the option to insert a force equipped with armored combat vehicles or two armored High Mobility Multi Wheeled Vehicles (HMMWVs) per sortie. To sustain the force, the HLR will be able to transport three independent loads tailored to individual receiving unit requirements and provide the critical logistics air connector to facilitate sea-based operations. This reliable, cost-effective heavy lift capability will address critical challenges in maintainability, reliability, and affordability found in present-day operations supporting the GWOT.

F/A-18 A/B/C/D

The Fiscal Year 2006 Budget request contains $422.4M for the continuation of the systems upgrade programs for F/A-18 platform. As the F/A-18 program transitions to the F/A-18E/F, the
existing inventory of over 900 F/A-18A/B/C/Ds will continue to comprise half of the Carrier Strike Group until 2012. Included in this request is the continued procurement of recently fielded systems such as Joint Helmet Mounted Cueing System, Advanced Targeting FLIR, Multi-Function Information Distribution System, and Digital Communications System. The Marine Corps continues to upgrade 76 Lot 7-11 F/A-18A and C to Lot 17 F/A-18C aircraft capability with digital communications and tactical data link. The Marine Corps anticipates programmed upgrades to enhance the current capabilities of the F/A-18C/D with digital communications, tactical data link and tactical reconnaissance systems. This upgrade ensures that our F/A-18s remain viable and relevant in support of Tactical Air Integration and Expeditionary Maneuver Warfare. The Marines expect the F/A-18A+ to remain in the active inventory until 2015. The Marines are also employing the LITENING targeting pod on the F/A-18A+ and D aircraft in OIF. When combined with data link hardware, the LITENING pod provides real time video to ground forces engaged with the enemy. The capabilities of the LITENING pod with data link are highly effective for Marine Corps expeditionary F/A-18 operations. The Fiscal Year 2006 Budget request also includes procurement of Center Barrel Replacements to extend service life of F/A-18A/C/Ds seven years to meet fleet inventory requirements until 2022.

Integrated Defensive Electronic Countermeasures (IDECM)

The Fiscal Year 2006 Budget reflects $7.6M in RDT&E to continue the development of the IDECM Block III (ALQ-214 w/ the ALE-55 (fiber optic towed decoy)) that will undergo Operational Test and Evaluation (OPEVAL) in Fiscal Year 2006. Additionally, $86.5M in Aircraft Procurement funding is included for the procurement of 55 ALQ-214 systems.

EA-18G

The E/A-18G continues development as the Navy’s replacement for the EA-6B Airborne Electronic Attack (AEA) aircraft. The Navy is using the F/A-18E/F multi-year contract to buy four Systems Design and Development aircraft in Fiscal Year 2006 to install and integrate Northrop Grumman’s in-production Improved Capabilities (ICAP)-III AEA system. These aircraft will support EA-18G operational testing and allow the department to deliver the next generation (AEA) capability at reduced cost and in the shortest possible timeframe. The Marine Corps initiated studies to examine options for replacing their electronic attack aircraft.

The Fiscal Year 2006 Budget request reflects $409M for Systems Design and Development. The Systems Design and Development continues on schedule with construction underway of the two development aircraft. First flight is scheduled for the fourth quarter of Fiscal Year 2006. A total quantity of 30 systems will be procured in LRIP with a planned Fiscal Year 2009 IOC and Fiscal Year 2012 FOC. The EA-18G will replace carrier-based Navy EA-6B aircraft by 2012.

AH-1Z / UH-1Y

The H-1 Upgrades Program will remanufacture 180 AH-1W and 100 UH-1N helicopters into state-of-the-art AH-1Z and UH-1Y models. The Fiscal Year 2006 Budget requests $307.5M APN funds to procure 10 UH-1Y/AH-1Z aircraft and $42.0M RDT&E funds to complete the H-1 Upgrades Engineering and Manufacturing Development phase. The development program is
over 90 percent complete with five aircraft being readied for OPEVAL, which will begin this summer. Work on the first LRIP lot, awarded to Bell Helicopter in December 2003, is progressing well and the second LRIP lot will be awarded by the end of March 2005. The program is seeking opportunities to reduce unit cost and minimize the negative impact the remanufacture strategy could have on ongoing military operations. Regarding the latter point, we anticipate that some number of airframes will be newly fabricated instead of remanufactured in order to reduce the amount of time aircraft would otherwise be out of service. The optimum mix of remanufactured and newly fabricated aircraft is being evaluated with the results to be reflected in future budget requests.

The H-1 Upgrade Program is a key modernization effort designed to resolve existing safety deficiencies, enhance operational effectiveness of both the AH-1W and the UH-1N, and extend the service life of both aircraft. The program will provide 100 UH-1Ys and 180 AH-1Zs with 10,000 hour airframes. Additionally, the commonality gained between the AH-1Z and UH-1Y (84 percent) will significantly reduce life-cycle costs and logistical footprint, while increasing the maintainability and deployability of both aircraft.

**AV-8B**

The Fiscal Year 2006 Budget requests $15.5M RDT&E funds to support development of the Engine Life Management Plan (ELMP)/Accelerated Simulated Mission Endurance Testing, Tactical Moving Map Display, and Aircraft Handling initiatives. The Fiscal Year 2006 Budget also requests $36.6M procurement funding for Production Line Transition efforts, procurement of Open Systems Core Avionics Requirement, ELMP upgrades, and the Readiness Management Plan which addresses aircraft obsolescence and deficiency issues associated with sustaining the AV-8B until JSF transition.

**EA-6B**

The Fiscal Year 2006 Budget request of $120.6M reflects the total budget for wing center section modifications and procurement of three Improved Capability (ICAP) III systems. The aging EA-6B has been in ever-increasing demand as DoD’s only tactical radar jamming aircraft that also engages in communications jamming and information operations. EA-6B operational tempo has continued at extremely high levels during the past year. Safety considerations, due to wing center section and outer wing panel fatigue, have reduced aircraft available to the fleet from 95 to 85. Aircraft inventory is projected to return to above 95 by the end of Fiscal Year 2005. Program priorities are current readiness and successful fleet introduction of the ICAP III selective reactive jamming system.

**Precision Guided Munitions (PGM)**

The U.S Navy weapons programs of the 21st Century are evolving to address the challenges of a dynamic and unpredictable enemy. New weapon systems are planned or have been developed and delivered to the Combatant Commanders to provide new options to engage enemy forces in support of the GWOT. The Navy’s Fiscal Year 2006 Budget supports PGM programs that continue to allow domination of the maritime environment, support in-land operational forces,
and enhance the overall department strategy to deter and dissuade potential adversaries while supporting our allies and friends.

Joint Direct Attack Munitions (JDAM)

JDAM has been the Department’s weapon of choice for OEF/OIF. In October 2004, the U.S. Navy provided an Early Operational Capability and accelerated deliveries for a 500 lb JDAM variant (GBU-38) for Navy F/A-18 A+/C/D platforms. After approving production of this variant, we immediately deployed it in order to meet an urgent warfighter need to employ precision munitions with limited collateral effects in the congested urban environments of Iraq. The Fiscal Year 2006 Budget request of $82.6M procures 3,400 DON JDAM tail kits for all variants, thus supporting all current and projected warfighter requirements. The Fiscal Year 2006 Budget reduces procurements to 1,500 kits per year starting in Fiscal Year 2008; however, the Department will closely monitor all JDAM variant requirements and combat expenditures in order to make any necessary adjustments.

Joint Standoff Weapon (JSOW)

A new variant of the JSOW called JSOW-C was approved for Full Rate Production in December 2004. Similar to the new 500 lb JDAM program, this capability is in demand by the warfighter to provide new options for precision attack against point targets vulnerable to blast fragmentation effects and hardened targets. The new JSOW-C variant employs an augmenting charge with a follow-through penetrator bomb for hard targets that can also be set to explode both payloads simultaneously. This lethal package is coupled with an Imaging Infrared Seeker and GPS/INS to provide the standoff precision attack capability in demand by the warfighter. The Fiscal Year 2006 Budget fully funds JSOW-C production and support. It also shifts funding from production of a submunition variant of JSOW to all JSOW-C’s until there is resolution of unexploded battlefield ordnance issues that are of concern to the Department and our allies. The Navy/contractor JSOW Team is dedicated to reducing acquisition costs. Specifically, we are expecting to achieve a unit cost reduction of more than 25% by 2006 due to the implementation of lean initiatives, innovative processes, and engineering changes.

Advanced Anti-Radiation Guided Missile (AARGM)

The Fiscal Year 2006 Budget request continues the development of a next generation defense suppression weapon system, the AARGM. AARGM ensures continued air dominance and multi-mission flexibility to the F/A-18 and EA-18 aircraft across suppression and defeat of enemy air defenses, strike, and electronic warfare missions. The Department recently entered into international partnership negotiations with our NATO partner Italy, and we plan an Initial Operating Capability for F/A-18 C/D during Fiscal Year 2009.

The Navy is dedicated to developing new means by which the Joint warfighter can defeat time critical strike targets in anti-access scenarios, address counter-WMD missions, and improve our ability to fight the GWOT. Towards that end, we are working with the other Services, the Joint Chiefs of Staff, and the Combatant Commanders to begin studies that may afford opportunities for the possible development of the next generation of affordable weapons. We envision that
these weapons may allow us to employ long-range standoff weapons in direct attack roles via advanced high-speed propulsion and deployment of a variety of lethal packages.

**Tactical Tomahawk (TACTOM)**

The Fiscal Year 2006 Budget supports the Navy’s commitment to replenish our precision-guided munitions inventories utilizing the Navy’s first MYP contract for a weapon. TACTOM entered Full Rate Production in August 2004. We completed our second and final remanufacture program, converting all available older Tomahawk airframes to the latest Block III configuration. The Firm Fixed Price five year contract (Fiscal Years 2004 - 2008) for TACTOM will save the taxpayer ~12 % over annual procurements. TACTOM's advanced design and manufacturing processes have cut procurement cost to $729K or half the cost of a Block III missile and maintenance costs by half of the cost of its predecessor. TACTOM provides a more capable missile with a 15-year product warranty and a 15-year recertification interval. This approach mitigates price growth of follow-on procurements by providing incentive for the contractor to manage for obsolescence, which will control future price growth on follow procurements.

**SEA BASE**

**KC-130**

The Fiscal Year 2006 Budget requests $1,093M for 12 KC-130J aircraft. These aircraft will be procured under an existing Air Force multi-year contract. The Marine Corps has taken delivery of 16 KC-130J aircraft to date, with five more deliveries scheduled for Fiscal Year 2005. Twelve aircraft are planned for procurement in Fiscal Year 2006 to bring the total number of KC-130J aircraft to 33. The KC-130 fleet once again proved itself as a workhorse during operations in Iraq. The KC-130J provides major enhancements to the current fleet of KC-130s, extending its range, payload, and refueling capabilities. The first KC-130J squadron (12 aircraft) has achieved IOC and will immediately be deployed in support of the GWOT. Bold steps in simulator training and joint flight instruction place the KC-130J program on the leading edge of the transformation continuum. Additionally, we have continued to ensure the tactical capability of our existing KC-130F, R and T series aircraft by installing night vision kits and upgraded aircraft survivability equipment.

**C-40**

The Fiscal Year 2006 Budget requests $10.3M to support delivery of C-40 (Boeing 737-700C) aircraft previously funded. The C-40 replaces the aging C-9 aircraft providing intra-theater logistics support. To date, the Navy has taken delivery of eight C-40s with one more on contract. An additional six are planned for procurement in the FYDP.

**Command, Control and Net-Centric Capabilities**
Joint Tactical Radio System (JTRS)

We are working with the Air Force to successfully converge development of Navy and Air Force versions of JTRS (JTRS-AMF) to provide a common acquisition approach. Closely coupled with the JTRS Program and building on the initial Multi-functional Information Distribution System (MIDS), we have developed a promising joint effort with the Air Force that will significantly improve interoperability to the cockpit and maintain alignment with our tactical radio transition to the JTRS environment. This effort also has four international partners who are paying participants in the program.

E-2C and Advanced Hawkeye (AHE)

The E-2C AHE is a critical enabler of transformational intelligence, surveillance and reconnaissance, providing a robust overland capability against current and future cruise missile-type targets. The AHE program will modernize the E-2 platform by replacing the current radar and other system components to maintain open ocean capability while adding transformational surveillance as well as theater air and missile defense capabilities. The Fiscal Year 2006 Budget requests $249M to procure two TE-2Cs in the third year of a four-year MYP. This effort will keep the production line viable while the AHE, formerly known as the Radar Modernization Program, continues spiral development toward an Initial Operational Capability in Fiscal Year 2011. The AHE program continues to execute the SDD program of record. Further, OA standards are being integrated into E-2C aircraft and AHE program to enhance interoperability with DoD systems.

Aerial Common Sensor (ACS)/EP-3

The Fiscal Year 2006 Budget requests $133.6M of RDT&E for joint ACS aircraft development. ACS is an Army Lead program that entered the SDD phase in July 2004. The Army awarded a contract to Lockheed-Martin for a commercial-derivative Embraer ERJ-145 aircraft. ACS replaces the Army’s Guardrail and Airborne Reconnaissance Low systems as well as the Navy’s EP-3E aircraft. It will provide a transformational multi-intelligence platform capable of providing strike support to the war fighter. The Navy became a fully integrated partner in February 2005. The Fiscal Year 2006 Budget requests $55.1M to modernize and sustain the EP-3E fleet until ACS IOC of 2012.

Unmanned Aerial Vehicles (UAV)

The GWOT continues to place emphasis on the importance of UAVs. The Fiscal Year 2006 Budget request reflects our commitment to a focused array of UAVs that will support and enhance both surveillance and strike missions with persistent, distributed, netted sensors.

Fire Scout UAV
The Fiscal Year 2006 Budget requests $77.6M to continue development of the Fire Scout UAV. The Fire Scout is a Vertical Takeoff and Landing Tactical UAV (VTUAV) designed to operate from all air-capable ships, carry modular mission payloads, and operate using the Tactical Control System and Tactical Common Data Link. The Fire Scout UAV will provide day/night real time ISR and Targeting as well as communication-relay and battlefield management capabilities to support core Littoral Combat Ship (LCS) mission areas of ASW, MIW and ASUW for the Naval forces. Upgrades will include a four-bladed rotor and increased payload capacity. Upgraded Fire Scout capability will be fielded with LCS Flt 0.

The Army has selected the Fire Scout for their Army Future Combat System Class IV UAV. Numerous similarities in hardware components, testing, logistics, training, software and support requirements, offer potential for overall program cost reduction which would clearly benefit both the Army and Navy. We expect to sign a MOA with the Army for the acquisition of the Fire Scout airframe, and selected subsystems on a single Navy contract. The airframes will be subsequently modified to Service specific requirements under separate existing Navy and Army contracts. The goal is to maximize common support opportunities, eliminate redundant costs, maximize common avionics and sensor configuration to promote interoperability, and eliminate redundant tests.

Vertical Unmanned Air Vehicle (VUAV).

UAVs have played a critical role in recent operations and are also a key element of our transformation. The Marine Corps is pursuing the replacement of its almost 20-year-old Pioneer UAV system that has flown over 6,950 hours in support of OIF highlighting the criticality of these systems for our Marine forces. Requirements for VUAV are being developed in consonance with Ship to Objective Maneuver concepts from Expeditionary Maneuver Warfare, the Naval concepts of Sea Basing and Seapower 21, and with lessons learned from recent operational experience. The Fiscal Year 2006 Budget requests $9.2M to evaluate the Eagle Eye UAV, currently being developed by the United States Coast Guard in connection with its Deepwater Program. The Department will also continue to evaluate the capabilities of Fire Scout for this mission, seeking commonality within the Department

Joint Unmanned Combat Air System (JUCAS)

The Fiscal Year 2006 Budget realigns funding to the Air Force to establish a Joint Program Office with Navy representation to advance the JUCAS Program. The Department is committed to a JUCAS initiative, developed in partnership with the Air Force and DARPA. The Navy and the Air Force have defined a common set of science and technology requirements that recognize the unique needs of each Service that will form the basis for developing air vehicles that will contribute to a joint warfighting concept of operation.

OTHER SIGNIFICANT CAPABILITIES

Presidential Helicopter Replacement Aircraft (VXX)

The Fiscal Year 2006 Budget requests $936M RDT&E for SDD efforts for the VXX program. The goal of this accelerated program is to introduce a new Presidential helicopter by October
The VXX program will utilize an evolutionary acquisition approach through a two-part incremental development to deliver a safe, survivable and capable vertical lift aircraft while providing uninterrupted communications with all required agencies. The Department completed a Milestone B/C Defense Acquisition Board on January 13, 2005, and on January 28, 2005, a contract was awarded to LMSI to proceed into SDD and Pilot Production of the first increment aircraft.

**T-45**

The Fiscal Year 2006 Budget requests $239M for six T-45 aircraft. The request also includes funding to start Required Avionics Modernization Program installations.

**SEA TRIAL AND SEA ENTERPRISE IN ACTION: OPERATION RESPOND**

In support of the I Marine Expeditionary Force’s (I MEF) return to Iraq and in support of deployed Marines in Afghanistan, the Secretary of the Navy established a formalized process and action team, OPERATION RESPOND, to rapidly respond to technological and materiel requirements generated from deployed Marines. A senior Navy Marine Corps team co-chaired by the Assistant Secretary of the Navy (Research, Development and Acquisition) and the Deputy Commandant for Combat Development reviews and coordinates technical and materiel requirements for deployed units and utilizes the technical and engineering expertise throughout the DON and industry to expedite the best solutions available to counter rapidly evolving threats. This process served I MEF well in the initial year of deployment to OIF and OEF. The DON is establishing a Naval Innovation Lab environment to develop innovative ways to meet emerging technology problems within the GWOT. This effort under the ASN (RDA) will leverage and expand the current roles and capabilities of our established requirements generation and materiel development and acquisition commands in order to better respond to innovative enemy threats.

**Counter-Improvised Explosive Devise (IED) Technology, Equipment and Operations**

The Department has reprogrammed over $28.0M in Fiscal Years 2004 and 2005 for the testing, assessment and fielding of technology and equipment to counter and exploit the IED threat. Specific focus areas include joint, man-portable explosive ordnance disposal (EOD) and intelligence, surveillance, and reconnaissance robots, IED electronic countermeasures, backscatter X-Ray systems, specialized search dogs and establishing and maintaining an IED countermeasures group at our Naval EOD Technical Division, Indian Head, Maryland. This group is responsible for support to the joint, forward-deployed and CONUS-based IED exploitation cells, analysis of tactical and technical IED threats, development and dissemination of EOD threat advisories and EOD tactics, techniques and procedures, and provision of technical and training support to EOD operational teams. The Marine’s IED Working Group coordinates closely with Naval EOD Technical Division, the Army’s IED Task Force, and the Joint IED Defeat Integrated Process Team.

**Intelligence, Surveillance and Reconnaissance (ISR)**

The Marine Corps is engaged in initiatives to provide enhanced ISR capabilities in theater. The Dragon Eye UAV is in full-scale fielding and the Marine Corps is working to conduct an
Extended User Assessment of the Silver Fox UAV system. The Marine Corps is in the process of creating requirements for a Tier II UAV system to provide an organic UAV to the Infantry Regiment. The I MEF Scan Eagle services lease had codified a capability gap at this echelon and the Marine Corps Warfighting Lab is coordinating with Marine Corps Combat Development Command to find a long-term solution. The Marines have also employed aerostat balloon platforms to provide persistent ISR capability.

**Aircraft Survivability Equipment (ASE)**

As a result of Army aviation lessons learned, Navy and Marine Corps aviation Staffs undertook a coordinated rapid fielding initiative of more than $152M to upgrade ASE for Marine aviation units, preparing to deploy to Iraq in 2004. These efforts focused on ASE to counter infrared man-portable missiles and small arms being employed by insurgents in more advanced anti-aircraft tactics. As a result of the focused efforts by our Navy and Marine Corps aviation maintenance teams and hard-working contractors, every Marine Helicopter engaged in OIF II is today supporting combat operations with upgraded ASE. All deploying aircraft receive the “V2” upgrade to the AAR-47 Missile and Laser Warning Set and the new ALE-47 Countermeasure Dispensing systems; AH-1W aircraft received IR suppressor exhaust modifications to reduce their signatures; AH-1W, UH-1N and KC-130 aircraft have been equipped with the more advanced APR-39AV2 radar detection system; CH-53E aircraft received interior ballistic armor and new ramp-mounted GAU-21 .50 caliber machine guns; existing IR jamming systems on the CH-46E and KC-130 aircraft were upgraded. CH-46 aircraft received the M-240 7.62 caliber machine guns, lightweight armor, and lightweight armored cockpit seats.

**SUMMARY**

Our mission remains bringing the fight to our enemies. The increasing dependence of our world on the seas, coupled with growing uncertainty of other nations’ ability or desire to ensure access in a future conflict, will continue to drive the need for Naval forces and the capability to project decisive joint power by access through the seas. The increased emphasis on the littorals and the global nature of the terrorist threat will demand the ability to strike where and when required, with the maritime domain serving as the key enabler for U.S. military force.

Accordingly, we will execute the GWOT while transforming for the future fight. We will continue to refine our operational concepts and appropriate technology investments to deliver the kind of dominant military power from the sea envisioned in Sea Power 21. We will continue to pursue the operational concepts for seabasing persistent combat power, even as we invest in technology and systems to enable Naval vessels to deliver decisive, effects-based combat power in every tactical and operational dimension. We look forward to the future from a strong partnership with Congress that has brought the Navy and Marine Corps Team many successes today. We thank you for your consideration.