

# UNITED STATES COAST GUARD

Strategic Plan 1999

Ready Today... Preparing for

## **PREAMBLE**

**Ready today... Preparing for tomorrow**. Our motto, "Semper Paratus" (Always Ready) speaks to the commitment Coast Guard men and women demonstrate day in and day out to "get the job done," no matter how tough and demanding the circumstances. True to our motto and our traditions, this Strategic Plan focuses on meeting the needs of our customers, flawlessly performing our missions, and getting the job done, whenever and wherever called upon.

Hard work alone is not enough to achieve our vision. In order to meet the challenges of ever-expanding mission requirements and customer needs, and to take advantage of opportunities presented by technology and change in the 21<sup>st</sup> century, we must plan for the future, and make tough decisions on how best to apply limited resources. We must ensure *priorities*, clear *direction*, and *strategies* are developed to achieve our goals. We must balance our organizational focus across the near and long term. *This is the work of the Coast Guard's senior leadership*, and the intent of the Strategic Plan.

The Coast Guard's Leadership Council has established three priorities for organizational emphasis as we continue our focus on performance and customer service:

- Restoring Service Readiness
- Modernization
- Workload Management

These are the essential ingredients necessary for superior performance today and into the future. Public demand for our services requires us to maintain a constant level of readiness unique among the armed services. We perform a wide variety of missions, both planned and emergency response, routine and dangerous, 24 hours a day, 7 days a week, every day of the year. Meeting such demanding standards is only possible when our operating and support units are properly staffed, trained, equipped, maintained, and supported (i.e., when they are *ready* to perform their missions). However, workforce shortages, a lack of experienced personnel in critical ratings, deferred maintenance, and a lack of *modernization* projects now diminish our ability to meet public expectations. The price to our extraordinarily devoted, hard-working men and women as they strive to meet the demands of increasing mission requirements with inadequate resources is *increased workload* and reduced *quality of life*.

The Strategic Plan offers a solid foundation to meet these challenges. *Implementation will require focused effort and leadership* at all levels of the organization. It requires us to improve the processes by which we develop capabilities, deliver services and execute missions. It requires us to identify and eliminate unproductive activities and requirements, and to consider new ways of doing business. It requires us to improve teamwork and collaboration between operations and support, and Headquarters and the field, as well as partnerships with our stakeholders and other agencies.



Finally, implementation requires a commitment to continuous learning and improvement, and a willingness to let go of the past and step into the future.

The Strategic Plan provides a roadmap to that future. Drawing on the projections of future threat and demand in the Area and District Regional Strategic Assessments, the Strategic Plan links the near term program direction and guidance of Headquarters Business Plans to the vision of *Coast Guard* 2020. We charge each of you to read the Strategic Plan, familiarize yourselves with it, and use it to focus and align your priorities and areas of emphasis. *The destiny of the 21st century Coast Guard is in all our hands.* Join us on the journey to make this plan a reality.



ADM James M. Loy
COMMANDANT



VADM Thomas H. Collins COMMANDER PACIFIC AREA



VADM Timothy W. Josiah
CHIEF OF STAFF



VADM James C. Card VICE COMMANDANT



MCPO Vincent W. Patton
MASTER CHIEF PETTY

OFFICER OF THE

COAST GUARD

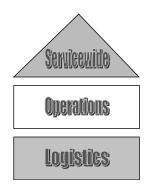


VADM John E. Shkor COMMANDER ATLANTIC AREA

(L. Siller)



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# STRATEGIC PLAN PURPOSE

The Coast Guard Strategic Plan is designed to provide a common framework, focal point and direction for planning in our complex organization – at Headquarters and in the field. The Strategic Plan defines our mission, vision, goals and objectives. It spells out the strategies senior leadership intends to pursue over the long term. The Strategic Plan's primary customers are senior leaders and managers, and planning, programming, budgeting and policy staff, both at headquarters and in the field.

We are entering a new century characterized by the rapidly accelerating pace of change in the world around us. This Coast Guard Strategic Plan gives us a framework for identifying, monitoring and keeping pace with those changes. Providing the best possible service to our customers – the American people – requires that we strive for continuous improvement, and determine where changing circumstances dictate shifts in direction and emphasis.

The Strategic Plan documents Coast Guard senior leadership's ongoing strategic planning processes. As part of these processes, we will continually assess and analyze current and future risk, threat, demand and trends. We will carefully craft strategies to leverage our capabilities and competencies to achieve our strategic goals. We will use well thought-out measures to continuously evaluate our performance in achieving our objectives, and identify targets for improvement and candidates for shifting of resources. We will develop long term budget strategies based on the strategic plan to better meet the needs of the nation.

Using the Strategic Plan as a foundation, Coast Guard senior leadership will plan, prioritize and define areas of emphasis for resource management to maximize public outcomes. Our strategies, priorities, and allocation of effort and resources will be based on the strategic planning process.

While a significant step forward, this is the Coast Guard's first Strategic Plan and, as such, there are gaps which reflect that our strategic planning processes are not mature. This first edition establishes a framework upon which we will seek improvement during subsequent cycles. Areas of improvement will include developing implementation steps for our strategies, refining our performance measures, and improving our management information systems and strategic planning processes.



# SUSTAINING THE STRATEGIC PLAN

The Leadership Council (LC) and Senior Management Team (SMT) are the Coast Guard's senior leadership bodies responsible for the Strategic Plan. The LC is responsible for providing the overarching guidance which the SMT uses to develop the Strategic Plan. The SMT is responsible for developing, updating and maintaining the Strategic Plan. Both the SMT and field commanders are responsible for implementation of the Strategic Plan.

The Strategic Plan documents the strategies and objectives the Coast Guard's senior leadership intends to pursue over the long term. Clearly, not all of the Strategic Plan can be implemented or emphasized in any given year. Therefore, the LC is responsible for providing annual, macro-level prioritization of the Strategic Plan's strategies and objectives. The SMT will use this prioritization in the development of directorate business plans and annual budget requests, and field commanders in prioritizing allocation of effort. The Coast Guard's annual Performance Plan, submitted as part of our annual budget request to Congress, will also reflect this prioritization.

The goals, strategies and objectives in the Strategic Plan are Coast Guard-wide. Ownership is not confined to single programs, directorates, or Areas. For example, the Safety strategy "Take the Search out of Search and Rescue" is not owned solely by G-O. Instead, it requires the collaborative effort of safety program managers in G-O and G-M; the field commanders; the technology, systems and information innovators and providers; and possibly the legal community as well. Collaboration and cooperation among the headquarters programs, and between headquarters and the field, is essential to successfully implement the Strategic Plan.

The Leadership Council is the Coast Guard's senior leadership body. It comprises the Commandant, the Vice Commandant, the Chief of Staff, the Atlantic and Pacific Area Commanders, and the Master Chief Petty Officer of the Coast Guard. The Senior Management Team is Coast Guard HQ's senior leadership body; its members include the Chief of Staff, Assistant Commandants, the Chief Financial Officer, Resource Director, Chief Counsel, and Director of the National Pollution Funds Center.



## STRATEGIC OUTLOOK

To be relevant, a Strategic Plan must be developed in the context of the projected future operating environment. Coast Guard Vision 2020 and the Area Commanders' Regional Strategic Assessments both project that a host of transnational dangers – from pollution to illegal immigration to international terrorism – face the United States as it enters a new millennium. Nowhere will the challenges be greater than in the Nation's waterways – the inland rivers, ports and harbors, coastal areas, and offshore maritime regions that serve as arteries for trade, sources of food and natural resources, playgrounds for recreation, and national borders. No matter how the future unfolds, the Coast Guard will face a complex operating environment characterized by new or unfamiliar security threats, competing environmental pressures, challenges to national borders and concepts of sovereignty, and a continuing demand for efficient and safe transport.

#### **Roles and Missions**

Pending the report of the Interagency Task Force on Coast Guard Roles and Missions in late 1999, the Coast Guard believes there will be few major changes to its roles and missions in the near to mid term. Rather, the ways the Coast Guard performs its roles and executes its missions will change, in response to such factors as the availability of new technologies and workforce capabilities. Also, mission emphasis will shift, based on changing national priorities and worldwide socioeconomic conditions; for example, the emphasis in maritime law enforcement may shift among illegal migrant interdiction, counterdrug, fisheries, and pollution. Because the factors driving these changes are outside our control and virtually impossible to predict with accuracy, our greatest assets will be a strong, multimission capability, grounded in core maritime competencies, and the capacity to adapt quickly and flexibly to shifting threats and mission demands.

#### **Shifting Demographics**

The world population will continue to grow, especially in developing countries, elevating the demand for transportation of goods, and significantly increasing the consumption of and competition for maritime resources. This will also drive increases in illegal immigration and illegal, sub-standard maritime trade. The U.S. population will pass 320 million by 2020. Population shifts to America's coastal areas will exceed national rates, with the South and West experiencing the most waterways congestion. *These trends will drive an increased demand for Coast Guard services.* Minorities and women will continue to increase as a percentage of America's skilled workforce. Balance in work and family will continue to be of greater importance to members of the workforce. *These trends will necessitate new approaches to workforce recruitment and retention, and our overall approach to workforce management.* 



#### **Increased Demands on Waterways**

U.S. international trade will more than double by 2020. Efficient, reliable maritime transportation will become more critical to America's economy and competitiveness. Global seaborne trade will bring larger numbers of ultra-large, deep-draft ships, carrying higher volumes of oil, hazardous materials and cargo. America's inland and coastal commerce will experience increased barge and tow traffic, as well as high speed and high capacity passenger vessels. Furthermore, more people will have the resources and leisure time to spend on cruises and recreational boating. *Collectively, this congestion on America's waterways will create a greater need for a well-integrated intermodal transportation system* with close links among the sea, land, and air components, and with correspondingly more capable safety assurance systems.

#### **Information and Technology Revolutions**

Profound advances in information and communications technologies will expand the ability to project maritime presence (both "virtually" and physically); to analyze, interpret and integrate data; and to coordinate responses to emergencies and other contingencies. Sensors, precision navigation systems, remotely piloted vehicles, and satellite communications and enhanced technological intelligence will provide force-multiplying advantages to friends and adversaries alike. "Knowledge management" will be a critical supplement to more specialized skills, as worldwide networks link individuals, governments and businesses in near seamless webs.

## **National Security**

Military operations other than war, or MOOTW, such as peacekeeping, crisis response, and counterterrorism, will proliferate. National boundaries will continue to blur as novel economic and security relationships emerge. New multilateral alliances and ad hoc coalitions will form to combat transnational crises and sophisticated international criminal cartels that operate well beyond the control of any single state. Mass migrations, terrorism, smuggling and other crime will continue to spill onto the seaways. Adversaries will look to exploit critical security regions, including transportation systems, ports, straits, and coastal areas, in unconventional ways. Because of its unique civil-military nature and specialized maritime capabilities, the Coast Guard will continue to be a critical element in supporting the National Security Strategy.

#### **Demand for Services**

Virtually all indicators suggest that the demand for Coast Guard services will continue to increase. America will rely on a strong, effective, efficient and forward-looking Coast Guard to protect her maritime security, safety, and environment well into the 21st century. Therefore, we must keep a close eye on the horizon for emerging risks, threats, and opportunities to meet national priorities and better serve the public. At the same time, understanding that public demands for our services will always exceed our capabilities to deliver, our leaders must use the strategic planning process to maintain a sharp focus on our core competencies, prioritize our activities in accordance with highest national priorities, and ensure that our available resources are allocated as effectively and efficiently as possible.



## U.S. COAST GUARD VISION STATEMENT

The world's best Coast Guard ... Ready today ... Preparing for tomorrow.

# U.S. COAST GUARD MISSION STATEMENT

The United States Coast Guard is a multimissioned maritime service and one of the Nation's five Armed Services. Its mission is to protect the public, the environment, and U.S. economic interests – in the Nation's ports and waterways, along the coast, on international waters, or in any maritime region as required to support national security.

#### U.S. COAST GUARD CORE VALUES

Honor, Respect and Devotion to Duty are the core values which bind us together and guide our conduct, performance, and decisions every day. They are deeply rooted in the heritage of commitment and service that has made the Coast Guard great. We embrace and live these values in our professional as well as our personal lives.

**HONOR:** Integrity is our standard. We demonstrate uncompromising ethical conduct and moral behavior in all of our personal and organizational actions. We are loyal and accountable to the public trust.

**RESPECT:** We value our diverse workforce. We treat each other and those we serve with fairness, dignity, respect and compassion. We encourage individual opportunity and growth. We encourage creativity through empowerment. We work as a team.

**DEVOTION TO DUTY:** We are professionals, military and civilian, who seek responsibility, accept accountability, and are committed to the successful achievement of our organizational goals. The Coast Guard exists to serve; we serve with pride.



## **GUIDING PRINCIPLES**

The following principles serve to guide our choices and decisions in implementing the strategic plan at all levels of the organization; they are embedded throughout the Strategic Plan:

#### **SEIZE THE FUTURE**

We will carefully study trends and **listen to our customers** to **identify emerging challenges**, and **determine future requirements** for safe waterways, secure borders, a clean environment, sustainable resources and competitive ports. We will carefully **chart our course to the future**. We will be **innovative** and bold as we invest in the people, hardware, information systems, and strategies to meet the maritime challenges of the 21<sup>st</sup> century.

#### STAND THE WATCH

We will maintain high levels of **readiness**, **adaptability** and **flexibility** to identify and respond quickly to the nation's maritime needs. Our people will be **professionals**, well grounded in both operational and support competencies. We will be the **world's leader in maritime safety**. We will build on our 200 year legacy as a maritime, multimission, military service to meet the nation's needs.

#### **BUILD AND VALUE OUR TEAM**

We recognize that **people are our most valuable** – and costly – **asset**. We will foster working environments that promote **learning**, **commitment** and **opportunity** for all members of our increasingly diverse workforce. We will develop superior **leadership** and **management skills** at all levels. We will maintain an environment that fosters commitment and dedication.

#### PARTNER FOR A STRONGER AMERICA

We understand that **teamwork is essential** to achieving our vision. Internally, we will **collaborate** across traditional **organizational boundaries**, and will plan, manage and operate from a **systems perspective.** Externally, we will **engage** and **partner** with our diverse **stakeholders** in government and industry, locally, regionally and internationally, to maximize our performance.

#### **INNOVATE FOR SUPERIOR PERFORMANCE**

We will excel as responsible stewards of taxpayers' resources. We will build a 21<sup>st</sup> century decision-making architecture and the information system that supports it. We are committed to excellence in all our mission areas, and will strive to continuously improve operational and support performance, business processes and systems. We will use aggressive performance measures to track our progress.



## STRATEGIC GOALS

The Coast Guard has established five strategic "outcome" goals to describe the outcomes the Coast Guard seeks to achieve or influence over the long term. The five strategic outcome goals collectively describe why the taxpayers fund the Coast Guard each year. Our entire organizational effort - programs, policies, assets, processes, activities and requirements - should ultimately be traced to achieving these goals. Measures, strategies and objectives for each of these goals are found in the Operations section (pages 13-34).

**MARITIME SAFETY:** Eliminate deaths, injuries, and property damage associated with maritime transportation, fishing, and recreational boating.

**MARITIME SECURITY:** Protect our maritime borders by halting the flow of illegal drugs, migrants and contraband into this country through maritime routes; preventing illegal incursions of our Exclusive Economic Zone; and suppressing violations of federal law in the maritime region.

**PROTECTION OF NATURAL RESOURCES:** Eliminate environmental damage and natural resource degradation associated with all maritime activities, including transportation, commercial fishing, and recreational boating.

**MARITIME MOBILITY:** Facilitate maritime commerce and eliminate interruptions and impediments to the economical movement of goods and people, while maximizing recreational access to and enjoyment of the water.

**NATIONAL DEFENSE:** Defend the nation as one of the five U.S. Armed Services. Enhance regional stability in support of the National Security Strategy, utilizing our unique and relevant maritime capabilities.

## **LOGISTICS GOALS**

The Coast Guard has established three logistics goals which describe the purpose of the Coast Guard's extensive logistics components. Measures, strategies and objectives for each of these goals are found in the Logistics Section (pages 35-45).

**HUMAN RESOURCES:** Identify and provide the right Human Resources capabilities at the right time, in the right place and at the right cost.

**SYSTEMS:** Identify and provide the right Systems capabilities at the right time, in the right place and at the right cost.

*INFORMATION:* Identify and provide the right Information capabilities to the right people at the right time and at the right cost.



## **ORGANIZATIONAL INITIATIVES**

The Coast Guard's senior leadership has determined that the following broad, long term, organizational initiatives are critical to more effectively achieve our mission, vision, and strategic and performance goals. Implementation steps for these initiatives will be discussed and prioritized by senior leadership as part of their ongoing strategic planning processes and will be reflected in the next edition of the Strategic Plan:

## **Partnerships and Alliances**

The Coast Guard will identify, prioritize and energize strategic partnerships and alliances in line with organizational needs and emerging mission requirements. Where it holds the potential to improve organizational performance, we will strengthen existing relationships and forge new ones. We will be a leader in the ONE DOT initiative. We will develop strategic partnerships and alliances with federal agencies and Presidential advisory bodies, state and local government, industry, and the international community.

## **Agility**

The Coast Guard will imbed greater agility in both operations and logistics processes and systems. The ability to anticipate and then respond rapidly to new threats, risks, demands and opportunities is critical to our success. We must be able to more quickly identify new requirements; acquire, develop and deploy capabilities; and shift between missions to meet emerging national priorities. Tactically, we must maintain our ability to surge when required and return to a normal operational tempo with minimal disruption.

### **Risk-based Decision-making**

The Coast Guard will expand and institutionalize the use of systematic, risk-based processes for decision-making, from the strategic to the tactical level. Using risk, performance and affordability information, we will develop, evaluate and rank potential interventions to manage risk at appropriate levels and achieve our strategic goals. We will ensure that our strategies, programs and activities provide the best overall return on investment in serving the American people. We will articulate and accept appropriate levels of risk in order to encourage innovation and improved performance.

#### **Core Competencies**

The Coast Guard will focus its energy and resources on its core competencies and on activities that align with and support those core competencies. We will identify and eliminate nonessential workload. We will consider alternate means of ensuring delivery of services in those areas that are not core competencies, in order to re-invest energy and resources in areas that are.



## **Workload Management**

The Coast Guard will engage in a comprehensive, service-wide initiative to better manage workload through process improvement, reduction, and balance. We will aggressively seek out innovative ways to improve the quality of life of our people, and improve service to customers, by eliminating or waiving unnecessary administrative burdens, and updating or revising operational requirements consistent with sound risk management principles.

## **Intellectual Capital Development**

The Coast Guard will invest in developing the critical and creative thinking capabilities, knowledge and analytical skills of its people. We will improve our ability to manage information and knowledge, design effective business, planning and decision-making processes and tools, optimize resources, support innovation, and manage risk. We will benchmark with other organizations to learn intellectual capital development "best practices." We will ensure our people have the proper training and intellectual tools to effectively manage the service, and we will support the concept of "life long learning" as essential ingredients of organizational success and employee satisfaction.

#### **Effective Internal and External Communications**

The Coast Guard will cultivate and manage a clear and commanding public image of its identity, missions, and the value it delivers to the U.S. public in the performance of its missions. We will identify those key enduring characteristics that make our service "The Coast Guard," and clearly and consistently articulate this image both internally and to the public. We will foster a culture within the Coast Guard that values public outreach.

#### **Modernization**

In order to maintain the highest levels of effectiveness, efficiency and responsiveness to customers, the Coast Guard will develop, acquire and deploy completely integrated, multimission, interoperable systems of cutters, aircraft, sensors, communications and logistics to replace its aging Deepwater assets and to modernize the National Distress and Response System (NDRS). The Integrated Deepwater System and NDRS will leverage both technology and an innovative, mission-based performance acquisition approach to increase capability and improve performance at the lowest total ownership cost.



## COAST GUARD OPERATIONS

# **Operations Concept**

The Coast Guard is an operating agency carrying out diverse missions over vast geographical areas. From inland waterways to coastal zones to the deepest oceans, we apprehend smugglers, educate boaters, rescue those in distress, create the highways in the water, regulate the shipping industry, protect the waters and living marine resources of our marine environment, conduct anti-terrorist and defense operations, and oversee state boating safety grants. *Alone among government agencies, the Coast Guard simultaneously serves in regulatory, law enforcement, oversight, emergency response, military, environmental and humanitarian roles.* Most importantly, we use the same organizational capabilities – personnel, vessels, aircraft and infrastructure – in multiple mission areas, increasing our efficiency and value to the taxpayer.

The Coast Guard's wide-ranging, diverse array of responsibilities is framed and bounded by three defining characteristics: **Multimission**, **Maritime**, and **Military**.

#### Multimission:

We save lives and property at sea;

We ensure a safe, efficient maritime transportation system;

We *protect the environment* and living marine resources;

We enforce laws and treaties in the maritime region; and

We defend the maritime borders and national security of the United States.

*Maritime*: We serve in all the nation's waterways – inland rivers, ports and harbors; coastal areas; and oceans – as well as in international waters.

*Military*: We are one of the nation's five Armed Services; we provide specialized national defense capabilities to the Department of Defense and support the Commanders in Chief (CINCs) during theater engagement and other military operations.

We execute our responsibilities through **Prevention**, **Response**, and **Enforcement** activities:

We work to *prevent* incidents from occurring;

We *respond* to incidents that have occurred; and

We enforce laws, treaties and regulations.

Our customers and stakeholders include all beneficiaries and users of clean waterways, safe and efficient maritime transportation systems, healthy and sustainable fish stocks, and secure borders. We partner with public and private organizations to facilitate achievement of shared goals.



## **OPERATIONS STRATEGIES**

The Coast Guard's senior leadership has determined that the following broad, long term, operational strategies are critical to more effectively achieve our mission, vision, and strategic and performance goals. Implementation steps for these strategies will be discussed and prioritized by senior leadership as part of their ongoing strategic planning processes and will be reflected in the next edition of the Strategic Plan. These overarching strategies will contribute to all our outcome goals; strategies specific to each goal are listed on subsequent pages.

# **Integrated Marine Management System**

The Coast Guard will take a leadership role in developing an integrated marine management system within America's maritime domain, including ports, waterways, territorial waters, Exclusive Economic Zones and the high seas, as well as the natural resources found therein. In managing maritime domain issues, the Coast Guard will use an integrated systems approach that balances national security, maritime safety, law enforcement, transportation, natural resource management, and environmental protection perspectives.

## **Integrated Policy Development, Mission Planning and Execution**

The Coast Guard will shift from a program-focused approach to policy development, mission planning and execution to an integrated, cross-programmatic approach. Coast Guard missions increasingly cross program boundaries; we must develop planning processes which transcend traditional Operations (G-O) and Marine Safety (G-M) boundaries. Although the program-focused paradigm has begun to shift, primarily in the field, more cross-programmatic coordination and integration are required to improve our performance, increase efficiency, and better serve our customers. The respective roles of the operational commanders and headquarters program managers in these areas must be clarified. We must be agile enough to determine and evolve into the most effective and efficient organization structure as conditions dictate in the future.

#### **Maritime Domain Awareness**

The Coast Guard will achieve the ability to acquire, track, and identify in real time vessels and aircraft entering America's maritime domain. The Coast Guard will use technology to develop a system capable of integrating aircraft, cutters, boats, stations and regional command centers to meet mission requirements. As part of the development of an integrated marine management system, the Coast Guard must also achieve the ability to maintain maritime domain awareness at the strategic level. This includes access to full information and awareness of national and international trends in critical aspects of marine activities and the marine industry.



## STRATEGIC GOAL: MARITIME SAFETY

Eliminate deaths, injuries, and property damage associated with maritime transportation, fishing, and recreational boating

America depends on the Coast Guard to provide safe, efficient, and environmentally sound waterways for her myriad commercial and recreational users. Competing demands on America's waterways – commerce, national security, public health and safety, environmental concerns, recreation, fisheries, and more – must be balanced. However, safety is integrally linked to all other concerns. Preventing a distress incident not only saves lives, but prevents a potential oil spill, property loss, and impeded commerce. The Coast Guard works to achieve its Safety strategic goal both by preventing incidents from occurring, and responding to mitigate the effects of those that do.

<u>Prevention:</u> Prevention activities should focus on areas of greatest risk, which considers both the probability of an incident occurring and the consequences. To better assess and respond to risk, we look at it through different lenses, such as type of maritime activity, and type of causal factor. Regardless of activity type, most maritime incidents resulting in death, injury or property damage are the result of human error; therefore, Coast Guard efforts will continue to support the *Prevention Through People* concept.

Recreational boating is second only to highway travel in U.S. transportation fatalities. The recreational boating population continues its rapid growth. While recreational boating fatalities have been generally decreasing over the last three decades, the number of deaths has leveled (roughly 800 annually) over the last several years. Human error is the most common cause of fatal incidents, and failure to use life jackets is the most common cause of deaths following these incidents. The Coast Guard coordinates a federal-state recreational boating partnership, largely consisting of administering congressional grant funds to state programs. Although recreational boating safety (RBS) is largely a state responsibility, failure in RBS directly impacts the Coast Guard: 70% of the Coast Guard's search and rescue (SAR) effort results from recreational boating incidents.

Commercial Vessels: The largest percentage of maritime worker fatalities occurs in commercial fishing, an industry over which the Coast Guard has little regulatory authority. The Coast Guard will focus on reducing human error, along with enforcement of safety regulations to drive a long term reduction in fatalities in this industry. While other commercial vessels (i.e., tankers, freighters, tow-boats) have lower percentages of maritime worker fatalities than the fishing industry, the Coast Guard will continue to work to reduce the number of fatalities and injuries in these vessels. The Coast Guard's Port State Control inspection program has been effective in ensuring the safety of foreign flagged vessels. The Coast Guard is working to reduce the number of fatalities in the towing industry, as well as the number of work-related injuries to maritime workers, through active partnering with industry associations and educational outreach. Passenger Vessel casualty risk, and threats to and crimes against U.S. passengers, have been steadily increasing over the past



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decade. Growing numbers of high-speed passenger vessels with expanded passenger capacities increases the likelihood of a serious accident. Reducing this risk requires a concerted, collaborative effort by the Coast Guard and industry alike, focusing on prevention, enforcement, investigation and development of response capability and contingency plans for large casualties.

<u>Response</u>: The most persistent factor contributing to distress incidents is mariner behavior: failure to use widely available safety tools, or poor judgment. Therefore, preventative measures are potentially the most effective in achieving our safety strategic goal. When prevention efforts fail, the Coast Guard responds in order to mitigate the damage. In order for response to work, we must be promptly notified; many deaths occur without or before Coast Guard notification. Therefore, we will focus not only on improving our SAR response, but also on increasing the ability of mariners in distress to notify us in time to permit a successful response.

#### 1. Performance Goals

Goal S1: Save all mariners in imminent danger

Goal S2: Save all property in imminent danger as a result of maritime accidents

Goal S3: Eliminate crewmember fatalities on U.S. commercial vessels

Goal S4: Eliminate passenger vessel casualties with major loss of life

Goal S5: Eliminate recreational boating fatalities

### 2. STRATEGIES

- A. <u>Safety as a System</u> Develop and employ an integrated corporate strategy for managing safety as a system, bridging across all individual programs which contribute to the safety goal.
- B. <u>Risk-Based Resource Management</u> Employ a systematic, risk-based process for prioritization/ allocation of effort and resources in safety programs to achieve the safety strategic goal, focusing on reducing risk. Using risk, performance and affordability criteria, seek the optimum mix between different prevention and response strategies.

For example, the Coast Guard currently has efforts underway in support of the following three safety strategies; a safety risk management strategy would inform decisions about relative levels of investment in each: "Take the Search out of Search and Rescue" (improve SAR performance); "Take the Search and Rescue out of Safety" (prevent incidents from happening); and "Survivability" (increase usage of survival gear to increase survival when incidents are not prevented).



- C. <u>Mariner Preparedness</u> Improve the preparedness of mariners and vessels, using appropriate prevention, facilitation/partnering, regulatory and enforcement strategies to reduce the probability of incidents and improve survivability when they occur.
- D. <u>Partnership</u> Partner with state and local governments, associations and industry to eliminate the human element in incidents (for example Prevention Through People) and to improve coordinated emergency response.
- E. <u>Legislative</u> Obtain statutory authority to mandate safety standards for high risk vessels and activities where appropriate, and seek to align penalties more closely with severity of violation.
- F. <u>Incident Awareness</u> Improve the capabilities and usage of the National Distress and Response System (NDRS), focusing on technology and education to improve notification, identification and positioning, in order to decrease the lives lost due to untimely, incomplete or inaccurate notification of distress.

#### 3. Measures

<u>Prevention</u>: The Coast Guard's success in prevention is reflected by trends in the overall rate of distress incidents. We track specific measures for recreational boating, commercial vessels and passenger vessels. We lack good exposure measures for large proportions of the boating population (i.e., recreational boating rates, numbers of commercial vessel voyages, etc.). This inhibits accurate assessment of the effectiveness of our prevention activities.

<u>Response</u>: Until 1999, we measured our success in response by the percentage of lives saved after Coast Guard notification. Because many lives are lost before notification, we now measure the total lives lost. Improvements in response should come by addressing factors which cause casualties to go unreported until too late.

<u>Readiness</u>: A Coast Guard-wide effort is currently underway to develop measures of readiness which can be used to actively monitor our ability to fully meet safety mission requirements.

<u>Productivity</u>: Comparing the productivity of different safety strategies and assets helps us direct limited resources at the most effective and efficient mix of prevention and response strategies. Determining productivity requires both cost and value measures. The Coast Guard has several initiatives underway to accurately determine the full cost of our activities. Determining value is problematic for several reasons, including difficulty quantifying the results of our preventative activities (how many fatal incidents were prevented because of education and regulation), and the presence of many external factors which affect the length and difficulty (and hence cost) of response activities.



#### 4. KEY OBJECTIVES

## A. Near term (1-3 years)

(Specific performance targets for each of the safety performance goals are listed in the Performance Plan).

- 1. Rebuild the readiness posture of small boat stations, including people, training, infrastructure and equipment.
- 2. Perform a comprehensive evaluation of the Coast Guard's safety system, including both prevention and response programs, standards and requirements, assets, mandates, policies, levels of investment, and risk.
- 3. Develop an implementation schedule for the recommendations of the Fishing Vessel Casualty Task Force, including prioritization, and begin implementation.
- 4. Develop prevention and response plans to address the increased threat of large scale casualties resulting from incidents involving high speed vessels with increasing passenger capacity.
- 5. Improve the capability to identify hoaxes and false alarms, including direction finding technology, educational outreach and imposition of penalties to deter hoaxes.

## B. <u>Mid and Long Term</u> (4-10 years)

- 1. Integrate the various information systems now maintained by separate programs which are essential to managing safety as a system. Manage this integration in accordance with the principles discussed in the information section of this plan.
- 2. Develop exposure rate data to allow better understanding of relative risk and performance in each major maritime area.
- 3. Complete modernization of the National Distress and Response System and Global Maritime Distress Safety System.



## STRATEGIC GOAL: MARITIME SECURITY

Protect our maritime borders by halting the flow of illegal drugs, migrants, and contraband into this country through maritime routes; preventing illegal incursions of our Exclusive Economic Zone; and suppressing violations of federal law in the maritime region

America's economic strength and national security are in many ways tied to the sea, which links us to the increasingly open world economy. However, this openness has left the United States and the international community increasingly exposed to a variety of transnational threats. And, with increasing volumes of people and goods moving across maritime borders, it is becoming increasingly difficult to detect and separate illegitimate from legitimate maritime activities. Deriving its mandate from 14 U.S.C., which confers the power to enforce U.S. laws and policies at sea, the Coast Guard is uniquely positioned and authorized to safeguard our maritime security interests. Major strategic areas are:

<u>Interdiction of Illegal Drugs:</u> As the lead agency for maritime drug interdiction and co-lead for air interdiction, the Coast Guard's role in the broader national counterdrug policy is focused on the supply side. The National Drug Control Strategy (NDCS) tasks the Coast Guard to conduct flexible operations to detect, disrupt, deter, and seize illegal drugs in transit to the United States and at U.S. borders. The purpose of these operations is to pressure drug traffickers, increasing their risks and costs, and in the process also to seize drugs in the transit zone.

Smuggling organizations and cartels are sophisticated and well-financed, with strong communications links and the ability to respond with agility to threats from the point of production to reinvestment of capital. Their responses to Coast Guard pressure will continue to include shifting both preferred maritime trafficking routes and methods of shipment. Therefore, flexibility and agility in detecting and countering these changes will be key to Coast Guard success. Smugglers will continue heavy activity in the Caribbean basin, due to the geography, sparse populations and limited enforcement capabilities of its "stepping stone" nations. Trafficking organizations are also likely to increase their use of the eastern Pacific to take advantage of the lack of natural choke points and current lack of interdiction resources in that area. The size of the projected increase in commercial maritime shipping will likely prove attractive to smugglers. More drugs will be shipped via commercial means, particularly container shipping. Technologies capable of rapid scanning and detection of shipments for contraband will be necessary to counter this threat.

<u>Interdiction of Undocumented Migrants:</u> As the lead federal agency for the maritime interdiction of undocumented migrants, the Coast Guard's goal is to support national immigration policy by eliminating the flow of undocumented migrants destined for the United States through maritime routes. Superceding this mission is rendering humanitarian, life-saving assistance to the migrants, who are often in dangerous, unseaworthy craft and, if in the hands of professional smugglers,



inhumanely treated. The goal of eliminating the flow is accomplished through interdiction and deterrence activities. The Coast Guard has traditionally faced two types of threat: day to day flow, and mass migrations. The four major source countries for illegal maritime migration are Cuba, Haiti, the Dominican Republic and the People's Republic of China. The increased involvement of organized, professional smugglers has caused a major change in the migrant threat. With more resources at their disposal than individual migrants, smugglers will employ more sophisticated techniques and the latest technology to avoid detection and thwart law enforcement efforts. The threat from the People's Republic of China continues to grow as a major source of illegal migration. Smugglers are transporting their human cargo to all parts of the United States and its territories, as well as to Canada, Mexico, and Central America for eventual entry across the land borders.

<u>Preventing Illegal Incursions of the EEZ:</u> World demand for fisheries resources continues to increase, and the world's major fishing grounds reach or surpass maximum sustainable yields, with many major world fisheries dangerously close to depletion. As a result, foreign fishing fleets are being pushed farther from home and into the high seas. As these trends continue, there will be greater pressure to illegally harvest fish, causing lost economic gain for U.S. fishermen. Small-scale armed disputes over fisheries issues have been increasing throughout the world and are expected to continue to do so.

Protecting and preserving these valuable resources has become a matter of national security; prudent management and effective enforcement action are necessary. The Coast Guard, as the nation's only on-scene enforcement resource to protect these fisheries and help rebuild them for the future, is charged with preventing encroachment of the U.S. EEZ by foreign fishing vessels. The U.S./ Russia EEZ boundary in the Bering Sea, U.S./Canadian maritime borders, as well as the Central and Western Pacific around U.S. territories, and U.S./Mexican maritime border, will continue to be major areas of concern due to the high value, high volume nature of these fisheries. Because of the huge expanses of ocean involved and the limited resources available to cover them, it is vital that resources be targeted at high-risk areas. Coast Guard success in preventing illegal incursions will hinge on its ability to both maintain a credible, visible presence, and to most effectively and efficiently direct its resources through targeted, rather than random, surveillance. This will require greater access to intelligence, improved sensors, and partnerships with other nations and agencies.

#### 1. Performance Goals

Goal C1: Reduce the flow of illegal drugs by denying maritime smuggling routes as part of the interagency effort to impact the national demand level

Goal C2: Eliminate the flow of undocumented migrants entering the U.S. via maritime routes

Goal C3: Eliminate illegal encroachment of the 200 mile U.S. Exclusive Economic Zone by foreign fishing vessels



#### 2. STRATEGIES

- A. <u>Technology</u> Aggressively explore and integrate new technologies to improve the effectiveness and efficiency of surveillance, detection and interdiction operations.
- B. <u>Intelligence</u> Increase access to and utilization of intelligence information to improve the effectiveness and efficiency of surveillance and interdiction operations.
- C. <u>Partnerships</u> Improve the coordination and effectiveness of law enforcement efforts by developing and maintaining bilateral and regional agreements with other nations, federal agencies, and state/local governments. Assist other nations in developing capable maritime security forces in support of mutual goals.
- D. <u>Campaign Steel Web</u> Pursue the ten year Counterdrug Strategic Plan, and its core strategies of denial of maritime drug smuggling routes; strengthening ties with source and transit zone nations; and support of interagency and international operations.
- E. <u>Ocean Guardian</u> Pursue the ten year Fisheries Law Enforcement Strategic Plan, and its three strategic foundations: a strong national constituent base; effective use of resources; and support of national and regional goals.
- F. <u>Port and Waterways Security</u> Develop and implement processes to continuously assess and monitor domestic port and waterway vulnerabilities; establish minimum security standards; and develop plans to reduce security risk.

#### 3. Measures

<u>Prevention & Response</u>: There is a relationship between enforcement and deterrence where at some point, successful enforcement deters enough activity that violation rates decrease. This point varies according to risk tolerance of individual smugglers, which varies according to a variety of other conditions. Difficulty in quantifying this deterrent effect has made it difficult to develop distinct measures for prevention and response. Efforts are underway to conduct a comprehensive interagency study of the deterrent effect of drug interdiction operations. A similar study of the deterrent effect of fisheries enforcement operations is being conducted. We currently gauge our success in Maritime Security with measures of smuggler and illegal migrant success, percentage of cocaine seized, and illegal encroachment of the U.S. EEZ by foreign fishing vessels.

<u>Readiness</u>: A Coast Guard-wide effort is currently underway to develop measures of readiness which can be used to actively monitor our ability to fully meet Maritime Security mission requirements.



<u>Productivity</u>: Measurement of law enforcement productivity is complex and problematic. Successful deterrence tends to reduce "successful" enforcement (violations; seizures). The most readily available measure of enforcement productivity (cost per unit of interdiction event) is not an effective measure of overall enforcement productivity because it does not include a factor for the value of deterred criminal activity. Other measures, such as cost per readiness hour, underway hour, or square mile monitored, may be more appropriate for gauging law enforcement productivity.

#### 4. KEY OBJECTIVES

## A. Near Term (1-3 years)

(Specific performance targets for each of the maritime security performance goals are listed in the Performance Plan)

- 1. Complete and promulgate *Ocean Steward*, the LMR Strategic Plan.
- 2. Complete the Drug Smuggling Deterrence Study.
- 3. Develop a strategic plan for undocumented migrant interdiction.
- 4. Explore the enhancement of airborne wide area surveillance and other technologies, such as satellites, to provide greater coverage and improved targeting of assets.
- 5. Assist NMFS in finalizing a national Vessel Monitoring Systems (VMS) and develop a system to integrate VMS data into CG operations to enhance effectiveness and efficiency.
- 6. Develop vulnerability index for port and waterways security threats.
- 7. Complete the Fishing Enforcement Deterrence Study.
- 8. Aggressively pursue and field end-game capability against drug smugglers.

## B. <u>Mid and Long Term</u> (4-10 years)

- 1. Continue pursuing the Integrated Deepwater System (IDS) project to develop an integrated system of surface, air, command and control, intelligence and logistics systems to carry out drug and migrant interdiction and EEZ enforcement.
- 2. Implement enhanced airborne wide area surveillance and other technologies to provide greater coverage and targeting of assets.
- 3. Improve measures used to monitor performance in deterrence and interdiction activities.



## STRATEGIC GOAL: PROTECTION OF NATURAL RESOURCES

Eliminate environmental damage and natural resource degradation associated with all maritime activities, including transportation, commercial fishing, and recreational boating.

The nation's waterways and their ecosystems are vital to the nation's economy and health. The Coast Guard works to preserve healthy stocks of fish and other living marine resources, and to keep the Nation's waters free of oil, chemicals, other marine pollution, and invasive species. Stewardship of the marine environment entails a broad spectrum of activities, including education, surveil-lance, inspection, enforcement, response, and investigation. Heightened national expectations for a clean and sustainable environment come at a time of increasing stress on the marine environment. The Coast Guard focuses on three major areas in providing stewardship of the marine environment:

Marine Pollution: The U.S. imports over 7 million barrels of crude oil a day, most of it via maritime transportation. Petroleum products are also transported over U.S. inland and coastal waterways. Historically, major and medium sized oil spills are few in number but account for over 95% of the total volume spilled annually, primarily from tank barges and tank ships. Since 1990, the maritime petroleum transportation industry has increased its commitment to the prevention and mitigation of oil spills. As more commercial operators hold themselves to higher operating standards, the Coast Guard will be able to shift from a predominantly regulatory scheme to a plan of compliance through strong partnerships and self-regulation. We will continue to target an appropriate level of regulatory and inspection attention, particularly on higher risk operators.

*Plastic* and *garbage* discharged into the water are another source of environmental degradation likely to increase with the rise in maritime traffic and recreational boating, unless preventative activities such as education and regulation keep pace. Finally, the Coast Guard will undertake measures to ensure compliance with the National Invasive Species Act to defend against the introduction of environmentally destructive *aquatic nuisance species* introduced from ballast water.

In the future, marine pollution incidents may be less frequent, but potentially more severe because of the increased volumes and broader array of hazardous materials carried by ships. The Coast Guard will continue to reduce the risk of spills, working with industry partners, implementing effective regulations and enforcing compliance. We will focus on prevention strategies, emphasizing "Prevention Through People." The Coast Guard will also maintain a strong response capability, and continue to lead responses to major incidents, as well as serve as a focal point for coordinated action.

<u>Protected Living Marine Resources:</u> The Coast Guard will continue to pursue an aggressive approach to protected living marine resources (PLMR). Public concern about the state of our oceans and living resources requires increased Coast Guard attention to enforcement of the Endangered Species Act (ESA) and Marine Mammal Protection Act (MMPA). The ESA requires the



federal government to establish and implement recovery plans for all threatened and endangered species. For protected marine species, recovery plans often involve regulating vessel activities, particularly fishing vessels, whose equipment or activities pose a threat to the species' existence.

In the future, increased volume, size and speed of marine traffic and coastal development will further threaten habitats. Sanctuaries where marine life is protected under the National Marine Sanctuaries Act will require closer Coast Guard monitoring. Shifts in offshore fishing, continued illegal high seas driftnet (HSDN) activities which indiscriminately lay waste to both protected and unprotected living marine resources in international waters, and enforcement of international agreements, will extend air and sea patrols farther from traditional patrol areas. In the past, international policies governing the conservation of high seas fisheries fell well short of their goals due to a lack of any effective enforcement provisions. The 1995 Straddling Fish Stocks and Highly Migratory Fish Stocks Agreement established the framework for future international fishery regimes. It contains non-flag state enforcement provisions, allowing the Coast Guard to board foreign fishing vessels party to any mutual international fishing agreement. This growing dynamic will potentially require additional Coast Guard effort targeted at enforcement of international fisheries treaties. The Coast Guard will seek additional legislation and resources as necessary to protect Living Marine Resources.

<u>Domestic Fisheries Law Enforcement:</u> The United States has the largest and one of the most productive Exclusive Economic Zones (EEZ) in the world, with 42,000 miles of coastline, 3.36 million square miles of ocean and about 20% of the world's fisheries resources. These waters support a \$24 billion American commercial industry, as well as a recreational fishery estimated to be worth \$10 billion. However, overfishing has placed many fisheries in danger of collapse. The increasing fishing power of the 110,000 commercial fishing vessels in the U.S. far exceeds the fish stocks' capabilities to reproduce. As the availability of fishery resources declines, and the demand for them increases, there will be greater pressure exerted to illegally harvest fish. Wherever enforcement is perceived as lacking, illegal fishing is likely to occur.

Prudent management and effective enforcement action are necessary to protect and preserve these fisheries. National policy objectives, management strategies and specific regulations are set by the National Marine Fisheries Service (NMFS). The Coast Guard, as the nation's only at sea enforcement resource is responsible for ensuring compliance with these regulations, and collaborating with NMFS and the Regional Fishery Management Councils in developing viable enforcement schemes. As new measures to control foreign and domestic harvests are developed, the Coast Guard must provide the at sea enforcement crucial to their success. To effectively pursue this mission, the Coast Guard will need capable platforms with the speed, seakeeping ability, endurance and advanced sensors to operate in the often harsh environment associated with this mission.



#### 1. Performance Goals

Goal P1: Eliminate oil discharged into the water from maritime sources

Goal P2: Eliminate plastics and garbage discharged into the water from maritime sources

Goal P3: Eliminate the adverse impact of pollution incidents on the maritime environment

Goal P4: Effectively enforce federal regulations that provide stewardship of living marine

resources and their environments

#### 2. STRATEGIES

- A. <u>Prevention</u> Prevent oil spills by reducing the risk of tank ship, tank barge and deep-draft vessel collisions, allisions and groundings.
- B. <u>Prevention</u> Reduce the risk of oil spills during oil transfer operations.
- C. <u>Response</u> Improve pollution response preparedness, from Coast Guard units to the national level, including planning, processes, partnerships, and equipment.
- D. <u>Intelligence</u> Increase access to and utilization of intelligence information to improve the effectiveness and efficiency of surveillance, monitoring and interdiction operations.
- E. <u>Technology</u> Aggressively pursue new technologies to improve the effectiveness and efficiency of surveillance and interdiction operations, and to gain the ability to monitor the large expanses of ocean currently unmonitored or only lightly monitored.
- F. <u>Partnerships</u> Improve the coordination and effectiveness of law enforcement and other efforts to protect the ocean environment and marine species by developing and maintaining bilateral and regional agreements with other nations, federal agencies, state/local governments, and responsible sectors of the shipping industry.
- G. <u>Legislative</u> Assess the need for regulatory authority to more effectively protect designated sanctuaries, protected areas, and threatened species.
- H. <u>Ocean Guardian</u> Pursue the ten year Fisheries Law Enforcement Strategic Plan, and its three strategic foundations: a strong national constituent base; effective use of resources; and support of national and regional goals.
- I. <u>Ocean Steward</u> Promulgate and pursue the Protected Living Marine Resources Strategic Plan. Elevate the PLMR mission, obtain necessary resources and authorities, partner with other agencies, and publicize our efforts.



#### 3. Measures

<u>Prevention:</u> Success in prevention is gauged by trends in discharges of oil and other pollutants, including plastics and garbage, into the marine environment. In fisheries law enforcement and protection of living marine resources, as in counterdrug operations, there is a deterrent effect to enforcement and visible presence. However, we have not yet developed a methodology to quantify this effect. We currently measure our success in these two areas by the observed compliance rate with living marine resource regulations.

<u>Response:</u> The Coast Guard attempts to respond quickly and effectively to pollution incidents. Measures are currently under development to quantify the affect of our cleanup and response coordination activities on mitigating environmental damage. The Coast Guard supports the NMFS goal of improving the status of endangered or threatened species through enforcement operations. NMFS and the RFMCs are working to establish measures of "sustainable fisheries."

<u>Readiness:</u> A Coast Guard-wide effort is currently underway to develop measures of readiness which can be used to actively monitor our ability to fully meet Protection of Natural Resources mission requirements.

<u>Productivity:</u> Determining productivity requires both cost and value measures. The Coast Guard has several initiatives underway to determine the full cost of our activities. Determining value at the outcome level is problematic, especially because of the many external factors which affect the health of natural resources, including fish stocks.

#### 4. KEY OBJECTIVES

## A. Near Term (1-3 years)

(Specific performance targets for each of the Protection of Natural Resources performance goals are listed in the Performance Plan)

- 1. Establish standards, targets and measures for pollution preparedness and response.
- 2. Complete and promulgate *Ocean Steward*, the protected living marine resources Strategic Plan.
- 3. Develop strategies to more effectively address the High Seas Driftnet threat.
- 4. Ensure PLMR missions are included in Deepwater requirements development.
- 5. Engage in partnership with NMFS to develop better understanding of the relationship between our enforcement activities and the health of fish stocks.
- 6. Analyze the effects of voluntary compliance regulations for invasive species, and report to Congress on their effectiveness.

#### B. <u>Mid and Long Term</u> (4-10 years)

- 1. Develop improved measures of effectiveness for PLMR efforts.
- 2. Develop better denominator data for pollution goals.
- 3. Develop a comprehensive environmental protection strategy encompassing all Coast Guard programs which contribute to Protection of Natural Resources.



## STRATEGIC GOAL: MARITIME MOBILITY

Facilitate maritime commerce and eliminate interruptions and impediments to the economical movement of goods and people, while maximizing recreational access to and enjoyment of the water

Our waterways are the backbone of our international commerce and intermodal transportation system. The U.S. has nearly 47,000 miles of coastline, lakes and rivers. Nearly all U.S. commerce eventually passes through a marine port; 14.2 million intermodal containers move through U.S. ports annually. The U.S. river system carries 310 billion ton-miles of commodities via barge. About 2.3 billion tons of commodities and 90 million passengers move through our deep sea and river ports. Maritime cargo activities alone contribute an additional \$140 billion in services and \$14 billion in Federal taxes, add \$74 billion to the U.S. Gross Domestic Product, and employ 1.4 million people. Because of the nation's dependence on imported oil, all of which moves by water, and on the waterborne internal movement of crude oil and refined products, maritime trade is critical to our economy and national security.

U.S. marine traffic will grow tremendously in the coming years. Changing complexity in the Marine Transportation System (MTS) poses increased risk to safe vessel transits and protection of the marine environment. Our waterway system and the associated shore side infrastructure will require careful planning and management to meet the challenges of:

- increased vessel traffic
- deeper draft ships
- high speed ferry vessels traveling at over 40 knots carrying carrying large numbers of passengers in congested urban port areas
- megaships carrying 6,000 or more twenty foot equivalent containers
- passenger ships designed to carry 5,000 people
- advanced information systems technology employed in ships and supporting precision electronic radionavigation
- and improved communications, hydrographic, and cargo systems

Careful coordination and collaboration by federal, state and local governments; users, commercial and private; as well as the general public are essential. Threats to safety, mobility, competitiveness in international trade, and the environment will increase with the increase in usage, unless ways are found to better integrate planning and actions of all waterway users and stakeholders.

The Coast Guard facilitates mobility through a multitude of activities, including maintenance of a system of electronic and visual navigational aids to mariners, Vessel Traffic Management services which facilitate safe passages in congested ports, and icebreaking activities to permit maintenance of shipping trade during ice seasons.



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Aids to Navigation: The Coast Guard's strategic vision for aids to navigation incorporates a combination of traditional short-range aids to navigation, electronic aids to navigation, and Vessel Traffic Services (VTS). An essentially Industrial Age activity unchanged for many years, the short range aids to navigation program is infrastructure intensive and high cost. Recent technological developments in marine navigation systems, such as the Global Positioning System (GPS), Differential GPS (DGPS), and electronic chart systems (ECS) will eventually provide a level of accurate and reliable navigation service to mariners substantially greater than that previously available. These technologies hold promise to reduce our reliance on short range navigational aids in the future; however, different classes of mariners vary widely in their requirements and ability to leverage the new technologies. The Coast Guard is obligated to maintain a system of aids to navigation that meets the needs of *all* waterways users; therefore, replacement of the existing steel infrastructure with an information age infrastructure will be an evolutionary process.

To better understand customer needs, the Coast Guard has initiated a major study to develop information, methods and tools to determine the optimum mix of these aids. While planning for the system of the future, however, the Coast Guard will also seek to optimize the effectiveness and efficiency of the existing system.

<u>Vessel Traffic Management</u>: In contrast to the passive navigational assistance role of traditional Aids to Navigation, Vessel Traffic Management (VTM) uses a range of tools to actively induce order and predictability into traffic flow. At the local level, Captain of the Port Orders are used to establish safety zones to manage vessel movement. Other measures in the VTM toolkit include establishing Regulated Navigation Areas, Traffic Separation Schemes, compulsory state and/or federal pilotage, the Rules of the Road, and federal VTS. Each of the various VTM tools is suited to a particular risk. The key to effective and efficient management of vessel traffic risks is choosing and then successfully implementing the correct VTM tools in a given waterway.

The Coast Guard's Ports and Waterways Safety System (PAWSS) project is fostering a new generation of collision avoidance and navigation safety equipment called Automatic Identification System. AIS combines GPS satellite navigation, electronic charts, other sensors and communications systems in innovative ways to improve mariners' ability to perform safely. AIS will also permit less costly VTS operations in those ports where a risk assessment has determined the necessity of a VTS. This Ports and Waterways Safety Assessments process considers various safety enhancing alternatives based on the risks in a given port, then assesses the cost and effectiveness of implementation.

<u>Domestic Icebreaking</u>: Coast Guard icebreaking activities in the Great Lakes and Northeast facilitate the movement of bulk cargoes carried by regional commercial fleets during the winter months. Secondary benefits include flood control and search and rescue. Icebreaking produces benefits for the American Public in these regions by maintaining access to cheaper waterborne transportation of goods and minimizing inventory stockpiling requirements. Annual demand for icebreaking



services is largely driven by winter severity and the resulting thickness of ice. However increased trade may result in an increase in the number of vessels needing specific icebreaking assistance. The Great Lakes Icebreaking Capability Project currently underway seeks to identify the best course of action to maintain effective and efficient icebreaking services over the next 30 years.

<u>Polar Operations</u>: The Coast Guard conducts polar operations to facilitate the movement of critical goods and personnel in support of scientific and national security activity in the polar region. The ability to clear tracks for supply vessels, and serve as mobile laboratories for scientific research is critical to operations at polar bases. Projections from the National Science Foundation forecast a continuing demand for this service.

#### 1. Performance Goals

Goal M1: Maximize vessel mobility within ports and waterways

Goal M2: Eliminate vessel collisions, allisions, and groundings

Goal M3: Maintain the navigation season in ice-bound areas of the Great Lakes

Goal M4: Provide icebreaking capability needed to support national interest in the polar

regions

#### 2. Strategies

- A. <u>Marine Transportation System</u> Increase integration and coordination of public and private policies, activities and infrastructure needs to create a seamless, intermodal transportation system by leading the Marine Transportation System initiative.
- B. <u>Mobility as a System</u> Employ an integrated corporate strategy for managing mobility as a system, bridging across all individual programs which contribute to the mobility goal. Link major decisions in management of the mobility system to service-wide strategy.
- C. <u>Risk-Based Resource Management</u> Employ a systematic, risk-based process for prioritization/allocation of effort and resources in support of mobility. Balancing risk against performance and affordability criteria, seek the optimum mix between various strategies to achieve the mobility goal.
- D. <u>Mariner Preparedness</u> Improve the preparedness of vessels and mariners, using appropriate prevention, facilitation/partnering, regulatory and enforcement strategies to reduce risk of incidents which degrade mobility.



- E. <u>Technology</u> Develop and implement technological solutions to meet the threat of expanded traffic at major ports.
- F. <u>Modernization</u> Aggressively explore technological solutions for meeting mobility goals with the longer range goal of reducing short range aids to navigation infrastructure, when this can be done safely.

## 3. Measures

<u>Prevention:</u> The Coast Guard's success in ensuring mobility can be derived through an aggregate measure of the impact of incidents of impeded or blocked waterways. This measure is not presently available. We currently gauge success in prevention through the proxy measure of number of collisions, allisions, and groundings. We count VTS actions/interventions which potentially break the causal chain before accidents occur. We also monitor the availability of Coast Guard-maintained aids to navigation, an output measure which contributes to the goal.

<u>Response:</u> The Coast Guard responds quickly to incidents degrading mobility through direct action as well as indirect coordination. The Coast Guard has not yet developed measures of performance in restoring mobility to impeded or blocked waterways.

<u>Readiness:</u> A Coast Guard-wide effort is currently underway to develop measures of readiness which can be used to actively monitor our ability to fully meet Mobility mission requirements.

<u>Productivity:</u> Further work must be completed on developing comprehensive, accurate cost data for major contributors to mobility (e.g., the short range aids to navigation program) before productivity measures will be available. Developing productivity measures will also require the means to measure the economic value of the Coast Guard's contribution to mobility.

#### 4. KEY OBJECTIVES

## A. Near Term (1-3 years)

(Specific performance targets for each of the mobility performance goals are listed in the Performance Plan).

- 1. Continue effort in partnership with the Maritime Administrative leading the development of the Marine Transportation System.
- 2. Continue development of cost-effective technological solutions that promote long-term improvements in the effectiveness and efficiency of the mobility system (e.g., DGPS; AIS; VTS; PAWSS; ECS and Waterways Evaluation Tool (WET).



- 3. Develop more effective mobility performance measures, including cost of ATON and other mobility activities and aggregate measures of the impact of impeded or blocked waterways.
- 4. Complete the Navigation Aid Mix System Analysis, to determine the most effective mix of electronic, audio, visual and other aids to facilitate mobility.
- B. <u>Mid and Long Term</u> (4-10 years)
- 1. Based on the results of the Navigation Aid Mix System Analysis, develop and implement a plan to optimize the short range aids to navigation infrastructure.
- 2. Based on the results of the Navigation Aid Mix System Analysis, develop and implement a plan for the long-term evolution and optimization of the overall aids to navigation infrastructure.



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## STRATEGIC GOAL: NATIONAL DEFENSE

Defend the nation as one of the five U.S. Armed Services. Enhance regional stability in support of the National Security Strategy, utilizing our unique and relevant maritime capabilities

The Coast Guard's national defense mandates derive from 14 USC (1, 2, and 141), which states that the Coast Guard is a "military service and a branch of the Armed Forces of the United States at all times;" is required to "maintain a state of readiness to function as a specialized service in the Navy in time of war;" and that the Coast Guard is also specifically authorized to assist the Department of Defense in performing any activity for which the Coast Guard is especially qualified.

The Coast Guard's national defense role encompasses a spectrum of activities, from peacetime engagement activities intended to support the President's National Security Strategy, through contingencies involving intermediate levels of threat (such as sanctions enforcement and homeland defense), to preparing for and supporting the Commanders in Chief (CINCs) in major theater wars. A 1995 Memorandum of Agreement between the Secretaries of Defense and Transportation recognized four major national defense missions of the Coast Guard:

- Maritime Intercept Operations
- Port Operations, Security and Defense
- Peacetime Engagement
- Military Environmental Response Operations

In 1998, the Chief of Naval Operations and the Commandant of the Coast Guard signed a joint National Fleet Policy Statement. This statement emphasizes interoperability of Navy and Coast Guard forces in meeting America's "maritime security needs. Coast Guard maritime security cutters" will be optimized for "peacetime and crisis response Coast Guard missions, and filling the requirement for relatively small, general purpose, shallow draft warships."

The 1997 National Defense Panel concluded that the complexity of meeting challenges to regional stability demands the use of all elements of national power – diplomatic and economic, as well as military. The Coast Guard's unique status as a military service with an international reputation as a humanitarian, safety, regulatory, and law enforcement agency, make it a unique and effective instrument of national security policy, able to serve as a model and work cooperatively with the navies and coast guards of nations reluctant to accept a more overt U.S. military presence. All indications point to increased use of Coast Guard capabilities in support of these missions in the future.



#### 1. Performance Goals

Goal N1: Achieve and sustain complete military readiness for CG units as required by the Department of Defense

Goal N2: Provide core competencies including Maritime Interception Operations; Port Operations, Security and Defense; Military Environmental Response Operations, and Peacetime Engagement, when requested by the Department of Defense or Department of State

#### 2. Strategies

- A. <u>Interoperability</u> Emphasize interoperability in planning, manning, training, and acquisition to provide enhanced support to the CINCs in accordance with the National Fleet concept.
- B. <u>Unique Instrument of National Security</u> Emphasize and maintain the Coast Guard's unique maritime competencies and characteristics in order to provide a response to emerging maritime security threats.
- C. <u>Regional Stability</u> Support the President's National Security Strategy of promoting regional stability by actively engaging with other nations and helping them develop maritime organizations based on the U.S. Coast Guard.

#### 3. Measures

<u>Prevention:</u> The Coast Guard contributes to preventing regional instability and conflict which impacts U.S. national security interests through engagement efforts. The Coast Guard measures its ability to support Department of State and Department of Defense requests for support of engagement activities.

<u>Response:</u> The Coast Guard's gauge of success in response is its ability to meet CINC requests for national defense support. However, because preliminary negotiations typically ensure CINC requests do not exceed the Coast Guard's ability to respond, this measure is pro forma and not informative. Efforts are underway to determine actual CINC requirements, and base Coast Guard response measures on them.

<u>Readiness:</u> The Coast Guard measures its success in national defense readiness through an index score which indicates the preparedness of critical organizational elements to respond to Department of Defense tasking.

<u>Productivity:</u> Measures for the productivity of national defense activities are to be developed.



#### 4. KEY OBJECTIVES

## A. Near Term (1-3 years)

(Specific performance targets for each of the National Defense performance goals are listed in the Performance Plan)

- 1. Seek to define and provide required levels of military readiness to effectively execute military missions in support of DoD, including interoperability and required levels of personnel, training, supplies, equipment and maintenance.
- 2. Continue to support the Integrated Deepwater Systems (IDS) project to develop an integrated system of surface, air, command and control, intelligence and logistics systems to carry out missions in support of the CINCs.
- 3. Develop measures of Peacetime Military Engagement activities.
- 4. Enhance the ability of Port Security Units to support the growing need for port operations, security and defense in support of the National Security Strategy, including defining readiness requirements and measures for PSUs.

## B. <u>Mid and Long Term</u> (4-10 years)

- 1. Implement the National Fleet Policy on four fronts: 1) Acquisition (the Integrated Deepwater System; 2) Integrated and interoperable logistics systems; 3) Joint training; 4) Integrated and interoperable information systems.
- 2. Improve the ability to fulfill national military requirements that build on peacetime competencies and that complement the capabilities of our DoD partners and allied forces. Develop a coordinated strategy for managing to the national defense goal, bridging across all individual programs which currently contribute.



# COAST GUARD LOGISTICS

# **Logistics Concept**

"Logistics" encompasses all the activities associated with developing, acquiring, sustaining, and eventually retiring the components of capability: people, information, and systems. The fundamental purpose of Coast Guard logistics is to put the right capability in the right place at the right time and at the right cost.

Logistics processes are complex and interconnected, with ripple effects throughout the system; the flow of capabilities to the field cannot be modulated like the flow of water from a faucet. Because lead times required are significant, the logistics system must include provisions for full awareness and information to provide adequate time for capabilities development and provision. At the same time, logistics providers must focus on *finding ways to reduce lead times* while still meeting standards and requirements. Doing so requires an integrated *logistics concept*. The Coast Guard is developing a service-wide logistics concept. This logistics concept will apply to workforce, systems, and information management. It will include a decision-making architecture, and will be based on the underlying concepts that follow.

Logistics is the foundation of performance. Performance is enabled by operational commanders' readiness, which is enabled by the availability of required levels of capabilities. Coast Guard personnel, vessels, and aircraft are equipped and trained to readily shift to the mission of greatest national importance. An asset on counterdrug law enforcement patrol may divert to perform search and rescue, pollution response, or alien migrant interdiction operations, while simultaneously providing a deterrent effect on criminal activity in other areas. This multi-mission capability allows us to maintain a continual state of readiness for all Coast Guard missions, even when actively engaged in others. Maintaining the proper level of readiness for high-tempo, multi-mission operations is possible only when our operating and support units are properly staffed, trained, equipped, and maintained.

The most critical measures of logistics provision are *performance* and *availability*. Specific performance and availability requirements are expressed as *standards*. Readiness is assessed by comparing current capability against required capability through the lens of standards. Suppliers must factor in the additional measure of *affordability (cost)*.



#### LOGISTICS STRATEGIES

Several overarching strategies serve as the foundation for the Coast Guard's developing logistics doctrine, and apply equally to human resources, systems, and information management. These strategies are listed below. Subsequent pages list strategies specific to each of the three logistics goals.

#### Requirements-based logistics support, and collaborative standard-setting

Fundamental to placing the right capability in the right place at the right time is the users' determination of capability **requirements**, and agreement between the supplier and customer as to **standards** to be met to meet those requirements. Capability requirements must be based on a systematic, analytical **assessment** of **current** and **projected threat** and **demand**. Standard setting must be an ongoing, **collaborative** effort between support providers and their customers.

#### Integrated logistics, and life cycle support

We must shift toward **systems thinking**. In evaluating alternatives for providing capability, we must consider and integrate the **complete logistics chain**: all the activities needed to acquire, deliver, train, maintain, operate, and eventually retire assets - whether people, systems, or information. We must consider **total ownership costs** across the **life cycle of the asset** to produce solutions that provide the **overall best value** and **performance** for the Coast Guard.

#### Continuous performance improvement, and reduction of life cycle cost

To improve productivity, support providers must focus on **continually improving** logistics **performance**, and **continually reducing life cycle cost**. Essentially, this means delivering more "bang for the buck," or **productivity**. The measure of productivity is value over cost (P=V/C), with value being a measure of performance, either in outcomes achieved, output completed or dollar value.

#### Innovation, re-engineering and use of technology

Reconciling continuous performance improvement with continuous reduction of life cycle cost requires us to look "outside the box" to develop **new support business models**. We must **re-engineer** and **redesign** business practices, processes and programs where appropriate. We must learn from and leverage the **best practices** and capabilities of the marketplace. We must **use technology** as a force multiplier. Recognizing the rapid pace of change in technology, we must seek to ensure rapid evolution and integration of new technologies and tools into business and logistics processes.



## LOGISTICS GOAL: HUMAN RESOURCES

Identify and provide the right Human Resources capabilities at the right time, in the right place and at the right cost to achieve the Coast Guard's Mission, Vision, and Strategic Goals

Meet the people needs of the Coast Guard... Though the post-Streamlining Coast Guard continues to perform missions successfully, the cost of decades of imposed efficiencies and our own strategic choices and reactions have put tremendous stress on our people. Recruiting, training and retaining high quality Coast Guard men and women – civilian and military, active duty and reserve, and Auxiliary - are critical to our success. The Coast Guard is suffering from deficits in each of these areas. Workforce shortfalls adversely affect readiness. Many billets and positions are vacant; many more are filled with less than fully qualified individuals. Reductions in the general detail have aggravated the situation, causing additional stress on units. Gaps in many technical specialties are expected to increase. Officer attrition is at its highest rate in two decades. It is becoming more and more difficult to attract military and civilian employees due to private sector employment and educational opportunities, changing expectations for work and family life, well-funded DoD recruiting campaigns, and the disinclination of young people to affiliate with the armed forces. These socioeconomic changes are significant and require changes in our entire approach to workforce management.

Most of our personnel assignment, training, and qualification systems were designed decades ago, and may no longer be adequate. We must aggressively explore better ways to obtain, train, qualify, and deliver people to the units that need them. We must take a hard look at current standards and requirements, and reengineer major processes where needed to improve the Coast Guard's human resources system.

The human resources system of the future must include collaboration between all stakeholders to determine capability requirements expressed in terms of knowledge, skills, and experience. Because of the years required to develop skilled, experienced personnel, it must look forward strategically to anticipate and adapt to future HR demand. At the same time, it must find ways to reduce the lead time required. The system must maximize flexibility in component mix, location, size, skills, and culture. It must recognize that Coast Guard jobs are becoming increasingly technical, while at the same time, the need for management talent is greater than ever.

While meeting the needs of Coast Guard people... Filling billets and positions with talented, dedicated employees requires that employees believe they have ample and equal opportunity for professional development and growth, and a good quality of life for them and their families. Members of Team Coast Guard and their families deserve fair and adequate medical care, compensation, affordable housing, retirement and educational benefits, and family and community programs. The Coast Guard's senior leadership must take steps to improve the quality of life of our personnel and their families as competition for scarce resources increases.



1. Performance Goals (Service-wide performance goals for Human Resources, Systems, and Information will be developed)

#### 2. Strategies

- A. <u>HR System</u> Develop a flexible, dynamic human resources system that provides the capabilities essential for the Coast Guard's complex, diverse and multi-mission operations and management.
- B. <u>HR Information System</u> Develop and employ a comprehensive and integrated HR management information system to support HR system measurement and to provide stakeholders at all levels the information needed to manage the workforce.
- C. <u>HR Supplier Customer Relationship</u> Employ improved processes, including collaborative relationship from unit commanding officer level to the program manager level, for determining current and future human resources capability requirements (both number of people, and specific skill requirements).
- D. <u>Recruiting, Hiring and Retaining</u> Increase capability to attract, retain, reward, compensate, and develop members of Team CG, challenging existing systems and processes (e.g., compensation system, benefits, up or out, specialist vs generalist, lateral entry, grow from within vs hire from without, job design, career paths, etc) as needed.
- E. <u>Diversity Management</u> Develop and continually review and improve plans, policies, and practices to access and retain a diverse workforce.
- F. <u>Legislative</u> Obtain legislative authority where necessary to achieve greater flexibility and capability in workforce management.
- G. <u>HR Profession</u> Create a Human Resources profession in the Coast Guard and develop a core of HR professionals.

#### 3. Measures

#### Performance (Right Person)

- 1. Customer Satisfaction (satisfaction of unit CO with product of the HR system in the context of agreed upon standards)
- 2. Employee Satisfaction
  - (a) Willingness to Perform (measure of satisfaction and commitment)
  - (b) Willingness to Affiliate (measure of the concept of "employer of choice")
- 3. Fill Quality (measure of how well skills, experience levels and other attributes of as signed individuals meet billet or position requirements)



# <u>Availability</u> (Right Time/Right Place)

1. Fill Rate (measured as time a billet is filled divided by the time the billet was available to fill)

Affordability (Right Cost) To be developed

#### 3. KEY OBJECTIVES

#### A. Near Term:

(1-3 years) See G-W Business Plan, and HR Appendices (Appendix E) of other (G-O, G-M, G-S, G-A) Business Plans

- 1. Fill the workforce (civilian and military components) by end of FY 2000.
- 2. Conduct a comprehensive evaluation of existing workforce management systems; where appropriate, design new, better ways to manage the workforce and its structure.
- 3. Conduct a comprehensive evaluation to determine how accurately the Personnel Allowance List (PAL) states requirements for people, present and future, including the general detail.
- 4. Implement Diversity Management Strategy.
- 5. Publish and implement the recommendations of the Junior Officer Needs Assessment (JONA).
- 6. Develop and employ performance and cost metrics to better manage the HR system.
- 7. Implement Workforce Performance and Training Strategy. Review training requirements and develop a risk-based approach to training requirements in order to reduce the service-wide training burden; eliminate "one size fits all" where appropriate.
- 8. Develop strategies to recruit a diverse workforce.
- 9. Develop enlightened leaders at all levels through the Leadership Development Program.
- B. Mid to Long Term: (4-10 years)
- 1. Develop the ability to model the Coast Guard's HR system to evaluate the comparative life cycle costs and benefits of proposed HR strategies.
- 2. Develop and implement a plan for the "Academy after Next."
- 3. Create a core of HR professionals to manage the HR system.



# LOGISTICS GOAL: SYSTEMS

Identify and provide the right Systems capabilities at the right time, right place and right cost to achieve the Coast Guard's Mission, Vision, and Strategic Goals

Systems includes the coordinated planning, design, construction, acquisition, renovation, maintenance, outfitting and alteration of cutters, boats, aircraft, motor vehicles, aids to navigation and shore facilities. It is the complex infrastructure that sustains the capability for the Coast Guard to perform its operational missions.

Operational requirements are changing with increasing emphasis on expanding the capability and integration of our systems. The Deepwater, Coastal Zone and C4I Mission Analysis Reports highlight the importance of an integrated operational approach to achieving outcomes. To the maximum extent possible, future shore facilities, cutters, boats, electronics, aircraft, aids to navigation equipment and logistic support must be designed to be interoperable or "fit together" if we are to improve our effectiveness and efficiency in accomplishing our missions. At the same time, the support concept for our assets is evolving from one that has traditionally focused on self-sufficiency to one that requires extensive external support.

Increasing demands for operational capability will require the sophisticated integration of information technology in systems. Technology in the C4ISR (Command, Control, Communications, Computers, Intelligence, Sensors, and Reconnaissance) and navigation worlds is continuing its almost geometric expansion. Ensuring that equipment and technology meet operational requirements will demand aggressive and innovative corporate level acquisition, maintenance, and divestiture management.

In this era of constrained budgets, the Coast Guard finds itself in a difficult capital management situation: the annual recapitalization costs of currently-owned capital assets exceeds current out-year budget estimates. Capital investment requirements regularly exceed funding. As a result, we can expect to continue to operate many existing systems beyond their present design life. Shore plant recapitalization rates are expected to remain well below industry standards for some time. Maintenance managers will be challenged to keep old systems running while finding new ways to maintain, replace, or divest them. Continuing to deliver a high level of service to the public, while finding ways to do so less expensively, will require innovative management of our capital portfolio — improving our organizational return on the taxpayer investment.

1. Performance Goals (Service-wide performance goals for Human Resources, Systems, and Information will be developed)



#### 2. Strategies

- A. <u>Portfolio Management</u> Employ an integrated corporate strategy for the management of the Coast Guard's major capital assets (shore facilities; operational assets; logistics systems; C4ISR) as portfolios, using a life cycle management approach which includes planning, investing, using and divesting.
- B. <u>Strategic Alignment</u> Link major decisions in capital asset portfolio management (acquisition, maintenance, siting, divestiture) to service-wide strategy and include a systematic process for prioritization of recapitalization and new investment proposals.
- C. <u>Agility</u> Maintain the flexibility and agility to meet dynamic operational requirements.
- D. <u>Shore Facility Capital Asset Management</u> Transition shore support from a facility engineering focus to a capital asset management focus.
- E. <u>Technology</u> Develop and improve an enterprise-wide, systems approach to the acquisition and application of new technologies to decrease system costs and increase operational effectiveness.
- F. <u>Collaborative Planning</u> Develop and employ improved, collaborative internal management processes for involving all stakeholders in systems planning and requirements development.

#### 3. Measures

#### <u>Performance</u> (Right Thing/Right Place)

- 1. Customer Satisfaction (as measured by meeting agreed upon standards)
- 2. Flexibility (ability to support multiple missions and environments)
- 3. Responsiveness (right service provided at the right time)

#### <u>Availability</u> (Right Time)

- 1. Maintainability (ability to restore or retain assets in an effective operational state)
- 2. Supportability (how well the asset can be supported by logistics systems)
- 3. Reliability (percentage of time the asset performs satisfactorily)

Affordability (Right Cost) under development



#### 4. Key Objectives

- A. Near Term: (1-3 years) See G-S Business Plan, and Capability Appendices (Appendix B) of other (G-O, G-M, G-W, G-A) Business Plans
- 1. Complete pilot phase of Systems Measurement project. Develop implementation plan for performance and cost metrics linking HQ, HQ units and MLCs.
- 2. Implement Shore Facility Capital Asset Management strategies.
- 3. Develop and implement the R&D Strategic Plan. Integrate R&D selection, execution, and implementation processes with Coast Guard strategic planning, long-range planning, and life-cycle management processes.
- 4. Focus and align R&D initiatives to the highest priority organization-wide issues, problems, and capability gaps.

# B. <u>Mid and Long Term</u>: (4-10 years):

- 1. Where appropriate, promote DoD interoperability as a leading consideration in the development and acquisition of new systems.
- 2. Align logistics and maintenance information systems to be interoperable with Coast Guard information systems.



## LOGISTICS GOAL: INFORMATION

Identify and provide the right information capabilities to the right people at the right time and at the right cost to achieve the Coast Guard's Mission, Vision, and Strategic Goals

Taking full advantage of the potential of emerging technologies requires that we change the way we look at information and information systems. Many of the Coast Guard's existing data systems were designed to collect data, not to provide information for decision-making, and hence are not dynamic and do not provide accurate and current data on which to base critical strategic decisions. Decentralized authority for review, approval and development of IT systems has resulted in stove-piped and redundant systems. Information technology has been viewed as a narrow technical specialty, not recognized as a critical corporate resource demanding equal management attention as human and capital assets.

Internal demands for IT support will continue to grow in the future. The pace of change in IT will continue to accelerate; the shelf life of IT products will continue to shrink, making timely acquisition and deployment ever more critical. The information management system of the future will require collaboration and coordination between all stakeholders to determine information capability requirements, and to eliminate the proliferation of redundant, stovepiped systems which now inhibit effective planning, analysis and decision-making. It must include a plan for looking "outside the box" for business process reengineering opportunities, so that IT is not used simply to do the same old processes, but with computers. The IT acquisition process must be improved and aligned with organizational priorities, in order to take advantage of industry best practices and ensure limited resources are spent most effectively.

- 1. Performance Goals (Service-wide performance goals for Human Resources, Systems, and Information will be developed)
- 2. STRATEGIES
- A. <u>Knowledge Management</u> Support Knowledge Management efforts by institutionalizing collaborative, enterprise-wide processes for sharing information throughout the Coast Guard.
- B. <u>Strategic Alignment</u> Plan, prioritize and implement IT systems from an enterprise versus program perspective. Base IT investments on alignment with Coast Guard Strategic Goals.
- C. <u>Standardization</u> Develop a common operating environment, standard architecture and configuration management process which facilitates the management of information as a central corporate resource and drives Coast Guard IT systems toward interoperability and non-redundancy.



- D. <u>Information as a Critical Corporate Resource</u> Recognize and treat information as a critical corporate resource, equivalent to finance and human and capital assets in the strategic planning hierarchy. Ensure that organizational planning, management and decision-making processes and structure reflect the criticality of information management to organizational success.
- E. <u>Financial Information System</u> Support financial management efforts by developing and deploying an integrated budget and financial information system facilitating enterprise-wide access to current financial data. Utilize financial data to conduct cost-benefit analyses to support planning, evaluation, and decision-making.

#### 3. Measures

#### <u>Performance</u> (Right Information/Right People)

- 1. Customer Satisfaction (as measured by meeting agreed upon standards)
- 2. Accuracy
- 3. Useability
- 4. Effectiveness

#### <u>Availability</u> (Right Time)

- 1. Accessibility
- 2. Currency
- 3. Maintainability (ability to restore or retain in an effective state)

#### Affordability (Right Cost) under development

#### 4. KEY OBJECTIVES

- A. Near Term: (1-3 years): See IT Management Strategy, and IT Appendices (Appendix F) to G-O, G-M, G-S, G-W and G-A Business Plans
- 1. Elevate the role of the IT Management Board in IT planning, strategy development and decision-making. Utilize the IT Management Board to deploy improved, collaborative internal management processes for involving all stakeholders in information systems planning and requirements development.
- 2. Establish and maintain clear authority, accountability and responsibility for all IT initiatives.
- 3. Develop a recapitalization strategy for Coast Guard IT infrastructure.
- 4. Develop a working capital fund for recapitalizing IT infrastructure.
- 5. Create a knowledge management plan under the leadership of the Chief Knowledge Officer.
- 6. Develop and utilize IT performance indicators to support Coast Guard business processes.



# B. <u>Mid to Long Term</u>: (4-10 years):

- 1. Develop an accessible corporate information tool that provides users real-time, one stop access to operational, logistical, management and financial information for the purpose of improving overall management decision-making.
- 2. Develop effective, collaborative enterprise-wide decision-making processes for IT investments throughout their life cycle.
- 3. Develop and document a requirements management process for software development.

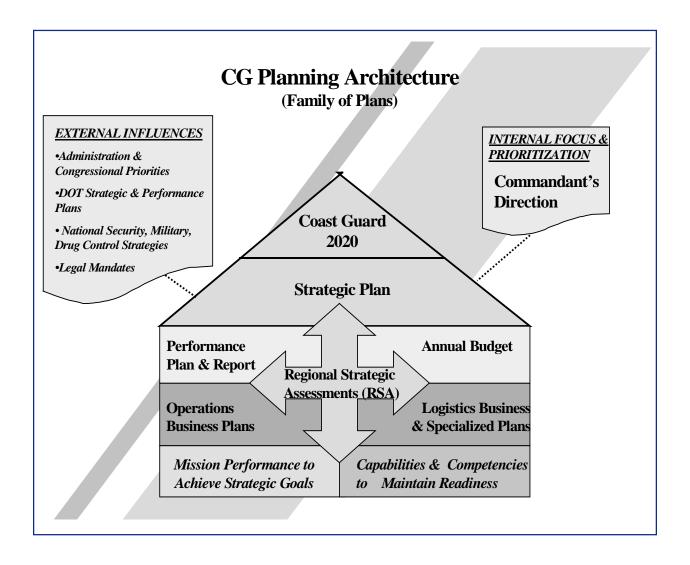


# APPENDIX A: COAST GUARD STRATEGIC PLAN SUMMARY

VISION			The world's hee	I Coast Guard Re	arly today Prepari	on for tomorrow.		
	The world's best Coast GuardReady todayPreparing for tomorrow.  The United States Coast Guard is a multi-missioned maritime service and one of the Nation's five Armed Services.							
MISSION	Its mission is to protect the public, the environment, and U.S. economic interests - in the Nation's ports and waterways,							
CORE VALUES	along the coast, on international waters, or in any maritime region as required to support national security.  Honor, Respect & Devotion to Duty							
GUIDING PRINCIPLES	Seize the Future – Stand the Watch – Build and Value our Team							
ORGANIZATIONAL	Partner for a Stronger America - Innovate for Superior Performance							
INITIATIVES	Partnerships and Alliances — Agility — Risk-Based Decision Making — Core Competencies — Workload Management intellectual Capital Development — Effective Internal and External Communication — Modernization							
			PROTECTION OF			HUMAN		
STRATEGIC GOALS		MARITIME SECURITY	RESOURCES		NATIONAL DEFENSE	RESOURCES	SYSTEMS	INFORMATION
	Eliminate deaths, number, and properly demage associated with markine transportation, fishing, and recreational boaling	broken by Maring the Sow of Blogal crugs, alone, and contraband more the country through martime routes, preventing deget incursions of our Each, ever Economic Zone, and suppressing workform of rederal law in the martime rocket.	Eliminate any roomental damage and natural necurs on organization associated with all meritims activates, including immegoration, commercial fishing, and representational booting	Fact later mathmatic commerce, and a trivinate interruptions and impositional to the economics into the economics in overned of goods and people, while maximally recreational access to and analyze of the water.	Cetted the nation as one of the fine U.S. Armed Services. Enhance regional stability in support of the National Security Strangy, utilizing our unique and relevant martitime capabilities.	Provide the right Human Resources depth lines, in the right place, at the right cost others the Cost Guerf's Meson, Vision, and Strategic Goals	Provide the night time, in the right time, in the right time, in the right place, at the right cost to achieve the Coset Guard's Meson, Vision, and Strafegic Goale	Provide the right Information capabilities at the right lime, in the right piece, at the right cost to achieve the Coset Guerd's Misson, Vision, and Sivalegic Gods.
			OPERATIONS				LOGISTICS	
CONCEPT	Mulimission, Maditime, Milkary					Alghr Capability, Right Place, Right Time, Right Cost		
OVERARCHING STRATEGIES	Integrated Marine Management System — Integrated Policy Development, Mission Plenning and Execution — Maritime Domain Awareness					Requirements-Besed Support/Collaborative Standard Setting — Integrated Logistics and Lifecycle Support — Continuous Performance Improvement/Reduction of Lifecycle Cost — Innovation, Re-engineering and Use of Technology		
STRATEGIES	A. Variage safety as a system.	Expore and integrate new technologies	A. Reduce risk of vessel collisions, all sions, and groundings	A: Lead Marine Transportation System Initiative	A Interoperactity in providing support to CINCs	A: Develop a fekble, dynamic HR system	A: Integrated corporate strategy for managing capital assets	A: Support Knowledge Management efforts
	B. Risk-based process for allocation of effort and resources	8. Increase access to and utilization of intelligence information.	B: Reduce risk of oil spile during oil transfer operations	B Manage mobility as a system	B Emphasize and maintan unique mentime competencies.	B: Comprehensive, inlegrated HR information system.	B. Align capital asset management with service-wide strategy.	B: Plan/implement If from an enterprise perspective.
	C improve the preparedness of manners and vessels	C: Partner to improve law enforcement coordination	C: Improve polition response preparedness	C Risk-based process for allocation of effort and resources	C Support the President's National Security Strategy	C. Colaborative HR supplier-outlamer relationships	C. Flexibility and agility to meet dynamic operational requirements.	C: Standard architecture and common operating any common
	D: Partner to eliminate the human element in incidents. E: Obten statutory	D: Courtentrug Strategic Plan (Campaign Steel Web) E: Fisheres LE	D. Increase access to and utilization of intelligence information E. New rechnologies to	D Improve the preparedness of vessels and manners E Develop		D Recruting hing and retaining.  E Plans, policies and	support to a capital asset focus	Di Recognize and treat IT as a critical corporate resource.  E. Financial information
	authority to mandate safety standards	Strategic Plan (Ocean Guardian)	improve surveillance and interdiction	technological solutions to traffic at major ports.		practices to access and retain a civerse workforce	E: Develop anterprise- wide, systems approach to new technologies	system to support cost- benefit enalysis.
	F. Improve incident awareness.	F. Port and waterways security	F. Pather to improve environmental LE effectiveness. G. Assess need for regulatory authority. H. Coeen Guardian	F: Technological solutions white reducing Alphi inhastructure		F: Lagislative authority as needed to support workforce management. G: Create a core of HR professionals	P. Collaborative systems planning	
NEAR TERM	Readiness posture at	1. LMR Plan (Ocean	1. Measures for pollution	1 Partner with MARAD	1. Define military	1. Fit the workforce by	1. Complete plot phase	1. Elevete role of If
OBJECTIVES		Sleward).  2 Drug Smuggling Determine Study	msponse and preparedness 2. Ocean Steward	in leading development of MTS.  2. Development of technological solutions	readmess requirements  2. Integrated Despwater System (IDS) project	The end of FY 2000  2. Conduct an evaluation of workforce systems	of ayerame measurement project. 2. Implement SFCAM strategies	2. Authority and accountability for IT initiatives.
	3 Fishing Vassel Tesk. Force recommendations.	Develop undocumented migrant strategic plan	Develop strategies to address HSDN threat.	Effective mobility performance measures.	Measures of Peacetime Military Engagement activities.	3 Evaluate the Parapriner Allowance List (PAL)	Swategic Plan.	3 Receptalization strategy for IT infrastructure
	4 High speedhigh capacity passenger vessels 5 Capability to identify focuses and false alarms.	4 Explore wide-area surveillence lechnologies 5 Asset NVFS with Vessel Monitoring Systems (VMS).	4 PLVR missions included in IDS requirements 5 Partner with NMFS	Compare Navigation     Ad Mix System analysis.	Enhance Port Security Units (PSUs)	Implement Diversity Management Strategy     Publish Jurior Officer Needs Assessment.	R&D interfees aligned to enterprise priorities.	Working capital fund for IT infrastructure.     Knowledge management plan under CKO
		Vulnerability index for ports and waterways.     Fishing Ceterrence Study	<ol> <li>Voluntary compilance regs for invasive species</li> </ol>			<ol> <li>Cevelop and employ performance and cost metrics</li> <li>Workforce performance and training strategy</li> </ol>		<ol> <li>Ceverage and utilize IT performance includers.</li> </ol>
		Counterdrug end- game capability				Single of recruit a diverse worklorge     Leadership Development Program		
MID AND LONG TERM OBJECTIVES	Integrate safety Information systems.	Pursue inlegrated Deepwater System (IDS)	Drivelop improved measures for PLMR efforts.	Develop and implement a plan to optimize short range AloN.		Model HR system to evaluate impact of proposed strategies	1 Promote DoD meroperability	Integrated, accessible corporate information loof
	2 Exposure rate data for risk analysis	Determine and interdiction performance metrics.	Develop better denominator data for pollurion goals	Z Develop a plan to optimize overail AloN	requirements using peacetime competencies	Z Develop a pien for "Academy after Next"	2 Interoperability of logistics and maintenance information systems.	2 Enterprise-wide decision processes for IT investments
	3 Modernization of MDRS and GMDSS	3. Imperient wide-area aurveillance technologies.	Comprehensive environmental strategy		Coordinate strategy to the National Defense goal	Create a core of HR professionals.		3 Software requirements management process

# APPENDIX B: THE COAST GUARD "FAMILY OF PLANS"

The "Family of Plans" model illustrates how planning efforts at various levels of the Coast Guard are linked. The Family of Plans is designed to facilitate the communication of vital information for decision-making purposes between the Coast Guard's operational and logistics components, in the field and at headquarters. Integrated, collaborative, ongoing *planning* is the goal. The actual production of *plans* is necessary to communicate organizational intent, but plans are only useful as *tools* to provide focus and alignment, not as ends in themselves. Depicted to the left of the planning model are external influences, which are incorporated into both CG 2020 and the Strategic Plan to ensure organizational alignment with national priorities, and to the right is Commandant's Direction, which provides focus and prioritization of the elements of the Strategic Plan.



A short description of the components of the Family of Plans:

- Coast Guard 2020: A broad, internal and external environmental scan, CG 2020 outlines probable challenges and opportunities the Coast Guard may face in the coming decades.
- **Strategic Plan** (new): An implementation plan for Coast Guard 2020, and a link between 2020 and headquarters business plans, the Strategic Plan establishes the Coast Guard's mission, vision, and strategic goals, as well as strategies for achieving the goals. It provides focus and alignment for the development of business plans and specialized plans.
- **Commandant's Direction**: Establishes the Commandant's personal priorities and areas of emphasis for his/her tenure.
- **Performance Plan**: Explains to the Administration and Congress how the Coast Guard intends to translate the resources it has, and those it is requesting, into performance outcomes for the specific budget year concerned. Establishes measurable operational performance goals aligned with our strategic goals. Submission required by the Government Performance and Results Act (GPRA).
- **Performance Report**: Details the annual level of performance actually achieved for a specific budget year, as compared to the goals established in the Performance Plan, and provides an analysis of the key factors that influenced the outcomes. The report mirrors the framework of the Performance Plan. Required by GPRA.
- **Annual Budget**: Details the resources that the Coast Guard requests to fund operations and logistics activities that will ultimately produce our desired outcomes. Presented in two formats: a detailed, comprehensive document, and a Budget in Brief (BIB).
- **Specialized Plans**: These are comprehensive plans for the Coast Guard's major capital assets: workforce, systems, and information (includes research and development).
- **Business Plans**: The means by which each Headquarters directorate documents the strategies, measures, and objectives it will use, and resources required, to implement the Coast Guard's mission, vision, and strategic goals.
- **Regional Strategic Assessments**: Assessments of risk, threat, opportunity, and demand, as well as resource requirements and major issues, the RSAs provide input from Area and District Commanders for incorporation into Headquarters business plans and the Coast Guard Strategic Plan.

# APPENDIX C: LEXICON

Agility. Organizational ability to adjust and/or respond to new or changing conditions or requirements.

<u>Business Process Re-engineering</u>. Changing practices, policies, and/or programs to improve overall performance. Based on an assessment of why the practice, policy and/or program exists, what it is intended to achieve, and what alternative methods could be used to better achieve the same objective.

<u>Capability</u>. Having the necessary people, systems, information, support, and policy to conduct missions.

<u>Customer</u>. Anyone, internal or external, for whom the organization provides goods or services.

<u>Core Values</u>. The personal attributes expected of each member of Team Coast Guard.

<u>Doctrine</u>. Fundamental operating principles by which the Coast Guard, or elements of the Coast Guard, guides its actions.

<u>Effectiveness</u>. The level of success in achieving established objectives or meeting established standards. A ratio of accomplishment to objective.

Efficiency. A measure of how well resources are being utilized; the absence of waste in a process.

<u>Evaluation</u>: A critical element of the classic management cycle (plan, execute, evaluate, adjust). The process of appraising the usefulness, efficiency and effectiveness of processes, practices, policies or programs. The usefulness of evaluation is in providing feedback to inform decision-making and assisting in the efficient and effective allocation of resources.

Guiding Principles. Overarching values that govern the conduct of Coast Guard business.

<u>Lagging Indicator</u>. Measure of performance that has already occurred. For example, the number of deaths in recreational boating last year.

<u>Leading Indicator</u>. Measure that can be used to predict future performance. For example, the trend in percentages of new boaters taking boating safety courses.

<u>Logistics</u>. Encompasses all of the activities associated with developing, acquiring, sustaining, and eventually retiring the components of capability: people, systems, and information, throughout their service lives. The overall objective of logistics is to provide the right capability in the right place, at the right time, at the right cost.

Measure. A quantifiable value that reflects progress toward achievement of a specific goal or objective.

<u>Mission Statement</u>. An enduring statement of purpose, it establishes the Coast Guard's fundamental reason for existence.

Objective. A time-phased, measurable accomplishment required to implement a strategy, or achieve a goal.

<u>Outcomes</u>. The public benefits which the Coast Guard seeks to achieve or influence. The Coast Guard's outcomes are summarized in our five Strategic Goals (Safety, Mobility, Protection of Natural Resources, Maritime Security, and National Defense).

<u>Partner</u>. A partner is an organization that cooperates with another in providing goods or services. For example, the National Marine Fisheries Service (NMFS) and the Coast Guard are partners in protecting fish stocks.

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<u>Productivity</u>. A ratio of results produced to the effort expended in producing them. Increases in productivity can be achieved in various ways. For example, increasing the results produced using the same level of resources (lives saved per readiness hour or manhour); decreasing the cost of providing resources (cost per cutter hour or readiness hour).

<u>Readiness</u>. The ability of Coast Guard systems to execute mission requirements in accordance with standards. Readiness is measured by comparing current capability against required capability through the lens of standards.

<u>Resource Allocation</u>. How resources (in terms of funding, assets, and/or effort) are distributed to achieve Coast Guard goals.

<u>Risk Assessment</u>. The process of systematically identifying, estimating, and ranking risk according to exposure, probabilities, and consequences.

<u>Risk Management</u>. The systematic process of developing, evaluating, ranking and selecting potential interventions to reduce risk and most efficiently achieve our goals.

<u>Stakeholder</u>. Any person, group or organization that can place a claim on, or influence, the organization's resources or outputs, is affected by those outputs, or has an interest in or expectation of the organization.

<u>Standards</u>. Designated parameters or expectations of performance. For example, operational asset on scene within 2 hours; parts delivered within 48 hours, etc. Standards should be established based on systematic assessment of requirements and should be updated to reflect changing conditions.

Strategy. A deliberate, planned action or decision taken to achieve a particular result or results. For example, "Take the Search out of Search and Rescue" is a strategy designed to both increase the percentage of lives saved (by getting to scene sooner) and reduce the cost of SAR operations (by reducing total sortie time. Strategies typically cascade through the organization, as different organizational elements implement substrategies in support of the overarching strategy. For example, to implement the strategy above, R&D programs must be initiated, systems acquired, educational outreach conducted, operations policy modified, and possibly, legislation enacted.

<u>Strategic Goal</u>. The Coast Guard's broad, overarching goals; what we hope to achieve or influence as an organization. Everything we expend effort and resources on – including programs, policies, assets, activities and requirements – should ultimately be traced to achieving our Strategic Goals.

<u>Strategic Planning</u>. The continuous and systematic process by which our leadership make decisions about our future, define its long range objectives, identify quantifiable goals, develop strategies to reach these objectives and goals, and allocate resources to carry out the strategies.

Supplier. A supplier is a person or organization that provides goods or services to a customer.

Systems Thinking. A holistic view in which the focus is on the "whole" of a system, and the interdependence of its parts, rather than the individual parts out of context of the bigger picture. For example, in systems thinking, when evaluating a new platform, we consider the implications of the platform on training, assignments and career paths, maintenance, current and future Coast Guard missions, relevant shore facility plans, etc. In order for systems thinking to occur, processes must be put into place which bring together the relevant parties during the planning and implementation phases.

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