# **FINAL Evaluation Findings**

## Virginia Coastal Zone Management Program

# August 2003 through May 2006



Office of Ocean and Coastal Resource Management National Ocean Service National Oceanic and Atmospheric Administration United States Department of Commerce

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#### I. EXECUTIVE SUMMARY

Section 312 of the Coastal Zone Management Act of 1972, as amended (CZMA), requires the National Oceanic and Atmospheric Administration's (NOAA) Office of Ocean and Coastal Resource Management (OCRM) to conduct periodic evaluations of the performance of states and territories with federally approved coastal management programs. This review examined the operation and management of the Virginia Coastal Zone Management Program (VCZMP or coastal program) by the Virginia Department of Environmental Quality (DEQ), the designated lead agency, for the period from August 2003 through May 2006.

This document describes the evaluation findings of the Director of NOAA's OCRM with respect to the VCZMP during the review period. These evaluation findings include discussions of major accomplishments as well as recommendations for program improvement. This evaluation concludes that the DEQ is successfully implementing and enforcing its federally approved coastal management program, adhering to the terms of the Federal financial assistance awards, and addressing the coastal management needs identified in section 303(2) (A) through (K) of the CZMA.

The evaluation team documented a number of VCZMP accomplishments during this review period. The VCZMP and the Coastal Policy Team have been able to build support around a number of statewide issues (for example, the seaside Heritage Program and several special area management planning efforts) and provide a unique mechanism and venue for the Commonwealth for integration and collaboration on a wide range of coastal issues and policies. The program has created a comprehensive grants management database and has supported the development of the Coastal Geospatial and Educational Mapping System. Since the previous evaluation, the VCZMP has taken actions to improve the program's visibility and distinct identity. The coastal program has used a variety of techniques and mechanisms to acquire and improve public access and to protect and manage coastal resources and habitats. The federal consistency process has been used to include all interested parties to affect changes to proposed projects. The VCZMP and its state and federal partners have also developed and adopted a modified Tidewater Joint Permit Application.

The evaluation team also identified areas where the VCZMP could be strengthened, including conducting some strategic planning by the Coastal Policy Team. The Coastal Policy Team should seek to use federal consistency as a tool for identifying new or influencing existing state policies based upon situations presented in federal consistency determinations. These findings suggest several ways to improve grants management and nonpoint program funding planning. In regard to local and coastal decision-makers, the VCZMP should consider a strong educational focus on these groups. The coastal program and its partners should consider development of a coastal community resiliency initiative through existing partnerships and programs as a further means to address coastal hazards.

#### II. PROGRAM REVIEW PROCEDURES

#### A. OVERVIEW

The National Oceanic and Atmospheric Administration (NOAA) began its review of the VCZMP in February 2006. The §312 evaluation process involves four distinct components:

- An initial document review and identification of specific issues of concern;
- A site visit to Virginia, including interviews and a public meeting;
- Development of draft evaluation findings; and
- Preparation of the final evaluation findings, partly based on comments from the Commonwealth regarding the content and timetables of necessary actions specified in the draft document.

The recommendations made by this evaluation appear in boxes and **bold** type and follow the findings section where facts relevant to the recommendation are discussed. The recommendations may be of two types:

**Necessary Actions** address programmatic requirements of the CZMA's implementing regulations and of the VCZMP approved by NOAA. These must be carried out by the date(s) specified:

**Program Suggestions** denote actions that the OCRM believes would improve the program, but which are not mandatory at this time. If no dates are indicated, the Commonwealth is expected to have considered these Program Suggestions by the time of the next CZMA §312 evaluation.

A complete summary of accomplishments and recommendations is outlined in Appendix A.

Failure to address Necessary Actions may result in a future finding of non-adherence and the invoking of interim sanctions, as specified in CZMA §312 (c). Program Suggestions that must be reiterated in consecutive evaluations to address continuing problems may be elevated to Necessary Actions. The findings in this evaluation document will be considered by NOAA in making future financial award decisions relative to the VCZMP.

#### B. DOCUMENT REVIEW AND ISSUE DEVELOPMENT

The evaluation team reviewed a wide variety of documents prior to the site visit, including: (1) the 2004 VCZMP §312 evaluation findings; (2) the federally-approved Environmental Impact Statement and program documents; (3) federal financial assistance awards and work products; (4) semi-annual performance reports; (5) official correspondence; and (6) relevant publications on natural resource management issues in Virginia.

Based on this review and discussions with NOAA's OCRM, the evaluation team identified the following priority issues:

- Program accomplishments since the last evaluation;
- The effectiveness of the Commonwealth in implementing, monitoring, and enforcing the core authorities that form the legal basis for the VCZMP;
- Implementation of the federal consistency process, including adherence to procedural requirements;
- The manner in which the VCZMP coordinates with other Commonwealth, local, and Federal agencies and programs;
- Effectiveness of technical assistance, training, and outreach to local governments and public outreach and education in order to further the goals of the VCZMP; and
- The manner in which the VCZMP has addressed the recommendations contained in the §312 evaluation findings released in 2004. The VCZMP's assessment of how it has responded to each of the recommendations in the 2004 evaluation findings is located in Appendix B.

#### C. SITE VISIT TO VIRGINIA

Notification of the scheduled evaluation was sent to the DEQ, the VCZMP, relevant environmental agencies, members of Virginia's congressional delegation, and regional newspapers. In addition, a notice of NOAA's "Intent to Evaluate" was published in the *Federal Register* on February 21, 2006.

The site visit to Virginia was conducted from May 15 - 19, 2006. The evaluation team consisted of Ralph Cantral, Evaluation Team Leader, Office of Ocean and Coastal Resource Management, National Policy and Evaluation Division; L. Christine McCay, Program Analyst, Office of Ocean and Coastal Resource Management, National Policy and Evaluation Division (May 18-19 only); Bill O'Beirne, Northeast Regional Manager, Office of Ocean and Coastal Resource Management, Coastal Programs Division (May 15-17 only); John Kuriawa, Program Specialist, Office of Ocean and Coastal Resource Management, Coastal Programs Division; Emily Woglom, Office of Management and Budget (May 15-17 only); and Ted Diers, Program Manager, New Hampshire Coastal Management Program.

During the site visit the evaluation team met with the Director of the Department of Environmental Quality (DEQ), other DEQ administrators and staff, VCZMP staff, other Commonwealth agency representatives, local government representatives and agencies, regional council representatives, academicians, and interest group members involved with or affected by the VCZMP. Appendix C lists individuals and institutions contacted during this period.

As required by the CZMA, NOAA held an advertised public meeting on Monday, May 15, 2006, at 4:00 p.m. at the Department of Environmental Quality, First Floor Conference Room, 629 East Main Street, Richmond, Virginia. The public meeting gave members of the general public the opportunity to express their opinions about the overall operation and management of the

VCZMP. Appendix D lists persons who registered at the public meeting. NOAA's response to written comments submitted during this review is summarized in Appendix E.

The VCZMP staff members were crucial in setting up meetings and arranging logistics for the evaluation site visit. Their support is most gratefully acknowledged.

#### III. COASTAL MANAGEMENT PROGRAM DESCRIPTION

NOAA's OCRM approved the Virginia Coastal Zone Management Program in 1986. The Virginia Department of Environmental Quality (DEQ) is the designated lead coastal management agency. The VCZMP is located in DEQ's Environmental Enhancement Division.

Virginia's coastal zone encompasses 29 counties, 17 cities, and 42 incorporated towns in Tidewater Virginia, and all of the waters therein, and out to the three-mile territorial sea boundary. This area includes all of the Commonwealth's Atlantic coast watershed, as well as parts of the Chesapeake Bay and Albemarle-Pamlico Sound drainage. Geographically, 29 percent of Virginia's land area lies within Tidewater Virginia. Over 60 percent of the Commonwealth's population lives in the coastal area. The Virginia shoreline along the four largest tidal rivers (Potomac, Rappahannock, York, James) and the Chesapeake Bay, into which they drain, along with the Atlantic Ocean, totals approximately 5,000 miles in length. Approximately 250,000 acres of tidal wetlands form the biological base of productive nursery and spawning grounds, act as natural buffers against flooding and storm damage, and perform a role in water quality maintenance.

Using a "network" program management concept, the VCZMP uses existing Commonwealth programs, agencies, regulations, and laws and a gubernatorial Executive Order that binds Commonwealth agencies to its policies. Networking is a process for coordinating and integrating existing Commonwealth programs, agencies, and laws into a system that will ensure compliance of all Commonwealth agencies to the policies of the VCZMP, thereby meeting federal requirements. Facilitating coordination and cooperation among these agencies is the Coastal Policy Team (CPT). The CPT, whose members represent all of Virginia's networked agencies and key coastal zone management partners, provides a forum for discussion and resolution of cross-cutting coastal resource management issues and development of coastal policy.

The DEQ is responsible for monitoring all Commonwealth actions for consistency with the VCZMP. The central feature of the VCP is a core of nine existing regulatory programs which ensure that critical land and water uses in the coastal zone are subject to regulation by the Commonwealth. The VCP also includes 25 statements in the program document and Executive Order, which set forth the goals of coastal management in Virginia, and various policies embodied in statute and regulations. The Executive Order is reaffirmed at the beginning of each new term by the Office of the Governor. Executive Order Number 23, signed in 2002, condensed and streamlined the previous 25 goal statements into a new set of 10 goals.

#### IV. REVIEW FINDINGS, ACCOMPLISHMENTS, AND RECOMMENDATIONS

#### A. OPERATIONS AND MANAGEMENT

## 1. Organization and Administration

The strength of the VCZMP continues to be its staff members, whose number is small, but whose depth and breadth of knowledge and dedication serve the Commonwealth extremely well. Throughout the site visit, the evaluation team was impressed by the respect and regard in which VCZMP staff members are held by partners, organizations, and individuals with whom they work. The staff has been able to galvanize public and partner support around a number of issues (e.g., the Seaside Heritage Program and several special area management planning efforts). The Department of Environmental Quality is also recognized for the ongoing support and commitment it maintains for the coastal program and staff members.

The program, through both the staff and the Coastal Policy Team (CPT), serves as an effective integrating and coordinating force and singular venue to discuss coastal issues, potential areas of conflict, and policy development. Team members recognize the unique role the CPT plays and are willing to take advantage of that reality and its potential.

ACCOMPLISHMENT: The Virginia Coastal Zone Management Program, through its staff members and the Coastal Policy Team, provides a unique mechanism and venue for the Commonwealth for integration and collaboration on a wide range of coastal issues and policies. In doing so, it creates strong relationships with citizens at the regional and local level, garnering support and building consensus.

#### 2. Coastal Policy Team

A major part of the mission of the Coastal Policy Team is to identify coastal policy issues that cut across agency jurisdictions and develop policy recommendations. The CPT also works with the VCZMP staff to identify funding priorities and recommend funding levels for projects as part of the annual NOAA financial cooperative agreement application. During the site visit the CPT met with the evaluation team and discussed a range of issues. Team members felt that by having an opportunity to focus on an issue or issues before the permit process was concluded, many problems were reduced or eliminated. They also indicated that the special area management planning process has been a good mechanism to focus on a specific geographic area and to test the priorities the CPT has identified. Other topics the CPT members brought up during the site visit meeting are perhaps indicative of emerging issues the CPT may need to confront; e.g., how to protect high quality streams rather than (or in addition to) focusing efforts and funding on poor water quality streams, and how the devolution or decentralization of DOT permitting, construction, and maintenance to local levels will affect the state's efforts to ensure that best

management practices are incorporated into the planning and execution of transportation projects.

During the 2003 evaluation site visit, the CPT noted to the evaluation team that there was no official mechanism for communicating information and coastal policy recommendations from the Team to the Secretary of Natural Resources. Based upon that self-identified shortcoming, the final evaluation findings contained a program suggestion recommending that the CPT develop such a formal mechanism. Since then the VCZMP has added the Deputy Secretary of Natural Resources to the Coastal Policy Team. A staff member from the DEQ Policy Division attends CPT meetings to help advance legislative recommendations from the Team to the Secretary's Office and to the General Assembly. In addition, the Deputy Secretary of Natural Resources receives copies of all e-mails sent to the CPT and the VCZMP staff prepares weekly reports on program activities that flow through the DEQ Director's Office directly to the Secretary of Natural Resources.

During this 2006 evaluation site visit, CPT members identified and discussed with the evaluation team the need for and the ways in which strategic planning is conducted for the CPT and the VCZMP. The VCZMP, like all coastal programs, is charged with addressing a number of coastal and watershed issues by the Coastal Zone Management Act. Throughout the years it has, like all coastal programs, attempted to prioritize, focus, and find specific niches that it can uniquely fill or address, given the resource limitations it faces. In general, the staff and the CPT have done a good job of this. The CPT sets priorities three years at a time for Section 306 funding focal area(s), and uses the Section 309 Coastal Needs Assessment and Strategy development process every five years to prioritize certain national issue areas. In terms of measuring success, the VCZMP is working with NOAA in development and implementation of the National Coastal Management Performance Measurement System (NCMPMS), and it reports performance for two measures as part of a state planning and budgeting effort.

The evaluation team was impressed with the forethought and critical analysis that members of the CPT apply to the work of the team and encourages that continual planning and evaluation. The Coastal Policy Team and the VCZMP should continue to ensure that there are mechanisms in place to measure the performance and success of priority issues, funded projects, and partnership efforts in which the CPT and VCZMP are involved.

PROGRAM SUGGESTION: The Coastal Policy Team should continue its strategic planning efforts for the team and the VCZMP. There should be clear links for measurement between the strategic planning efforts and the issues, projects, and partnerships in which the CPT and the VCZMP are involved. If there are areas of policy development and recommendation in which the CPT specifically acts (e.g., statutory or rule recommendations), the CPT could also set objectives and some measurable goals or performance measure criteria to help gauge the CPT's specific success.

## 3. Grants Management

Federal CZMA funds to the VCZMP are administered through the program's annual award, which is provided as grants to Commonwealth agencies, planning district commissions, and local governments for implementation of the coastal zone management program. Since 1999 the Virginia coastal program has focused on a resource or special geographic region for a three-year or longer period to enable the VCZMP to more effectively concentrate its financial and policy efforts. Even with this focused effort, the program still administers and manages between 35-50 or more individual project grants annually. In order to do so, the coastal program uses a grants database. Information on grant projects from 1992 to the present is available to all coastal program staff members on their desktop computers by accessing the grants database.

The Virginia grants tracking database is one of the most comprehensive tools developed by a coastal state to facilitate the tracking and analysis of grant information. It is designed to generate grant progress reports and final products for submission via "Grants Online" to NOAA as part of the VCZMP's reporting requirements. Federal and match funds expended during the federal fiscal year also are entered into the database. These figures are used now in performance indicators reporting. Recently "categorization" and "keyword" pages have been added so that reports can be generated on how the VCZMP has allocated coastal zone management funds. This database is a very useful tool for the VCZMP staff to administer and manage a relatively large number of grants and to generate a variety of reports. The ability to track and analyze project data in a searchable and sortable database for performance indicators reporting is a significant accomplishment during this evaluation period. NOAA encourages the VCZMP to share the database and the process by which it was developed with other coastal states.

ACCOMPLISHMENT: The Virginia Coastal Zone Management Program has created a grants database capable of providing a variety of information and reports that serve a number of functions. In particular, the database can generate information for performance indicators reporting.

There are two areas of grants management that could benefit from a review and analysis by the VCZMP staff and the CPT. The first is the number of post-award actions necessary to service and maintain the wide array of tasks identified in each annual cooperative agreement grant award. To continue serving as an effective coordinator and facilitator of many state programs, the VCZMP may need to maintain a large number of grant awards to networked partners. However, each CZMA section funding award to the VCZMP in a fiscal year (i.e., Section 306, Section 309, etc.) ought to have a contingency plan in the event that personnel changes or shifts in recipient priorities forces a reconsideration of spending. Having a predefined back-up plan will help the State use federal dollars efficiently and effectively rather than having to react to a sudden need to define another project or use of funds and to seek extensions of the award beyond 18 months or more.

The second grants management issue that warrants discussion by the VCZMP staff and the CPT is the non-federal match used for the majority of all CZMA section grant tasks. The match is provided from the state's Water Quality Improvement Program funds (WQIP). Ideally, non-

federal match provided for CZMA awards is from a corresponding activity and is consistent with federal rules by being "allowable, allocable, and reasonable." Use of the WQIP funds is certainly aligned with the VCZMP goal of maintaining and improving water quality. However, the use of WQIP funds as match for over 75% of the Section 306 funds in 2006 may not be completely "reasonable." OCRM recognizes that Department of Environmental Quality has been unsuccessful so far with requests to the Virginia General Assembly to appropriate state funds to the DEQ or VCZMP that would be used as match. Nevertheless, OCRM encourages the coastal program to investigate opportunities to further diversify CZMA non-federal match.

PROGRAM SUGGESTION: Prior to development of the application for 2007 grant award funds, the VCZMP should consider ways to diversify match used for the CZMA cooperative agreement and to ensure mechanisms are in place to spend federal funds within the 18-month time frame of the award.

The most recent evaluation findings included a program suggestion addressing increased program visibility. Part of that suggestion recommended that the VCZMP insure that all projects funded through the coastal program acknowledge that role with appropriate signage or other written statements. In March 2006 the coastal program held its first Grantee Workshop to improve compliance with grant procedures and requirements, including proper funding acknowledgement of the Virginia coastal program and NOAA. The evaluation team hopes this will become a regular workshop.

## 4. Program Identity and Visibility

As a networked program, the VCZMP endeavors to bring about collaboration and coordination among a variety of agencies and partners while trying to maintain clear roles and responsibilities and a unique identity. A distinct identity and program visibility are necessary for the VCZMP to gain public support and funding and to establish itself in the eyes of the public and its many partners as a problem-solving, value-added program. As noted above, the most recent evaluation findings included a program suggestion for the coastal program to continue its efforts to maintain and increase program visibility.

After the 2003 site visit, program staff held a retreat to focus, in part, on improving program visibility. During the retreat the staff clarified goals, target audiences and messages and discussed the effectiveness of the program's communication tools in reaching its target audiences and conveying its messages. Since then, the coastal program has taken several steps to address the visibility and identity issues. It has changed its name from the Virginia Coastal Program to the Virginia Coastal Zone Management Program to reinforce its relationship to the Coastal Zone Management Act. A logo was professionally designed in 2005 (using the image of an American oystercatcher, a shorebird species of conservation concern, whose largest number of breeding birds on the east coast is found in Virginia) and is being incorporated into printed materials and the VCZMP web site. Promotional items with the logo have been made and distributed to program partners and the general public.

The workshop for grantees was held to improve compliance with grant requirements, one of which requires funding acknowledgments (including logos) for the VCZMP and NOAA. The new logo was unveiled at this workshop. The recent addition of 'categorization' and 'keyword' functions to the grants database has already allowed the VCZMP to quickly and easily generate reports about the coastal program's accomplishments in fact sheets, displays, presentations, and other exhibits. Additional discussions which complement and highlight the visibility issue through public outreach and education are included under the Government Coordination and Decision-making section (G.) below.

ACCOMPLISHMENT: The VCZMP has taken actions to improve the program's visibility and distinct identity since the previous evaluation.

#### 5. Use of Technology

The coastal program has enhanced its ability to manage project-related data and information through the creation of and enhancements to the grants database. Another equally important technological achievement for the VCZMP is the creation and ongoing development of the coastal geospatial and educational mapping system (GEMS). To assist in coordinating each agency's management goals for coastal resources, the coastal program needed an inventory of the important water and land-based natural resources required to support the functioning of the Commonwealth's coastal ecosystems. This coastal resource infrastructure would: 1) serve as a framework for prioritizing issues, concerns and/or management efforts for coastal resource protection; and 2) would better allow for the consideration of how activities on the land affect resources in the water, and vice versa. "Blue" and "green" infrastructure are being mapped from a variety of sources using geographic information system (GIS) technology. A contractor is developing a mapping portal to organize and display the blue and green infrastructure data layers. Coastal GEMS will also provide textual data on the value of the various resources displayed and how they are managed through laws and regulations.

ACCOMPLISHMENT: The Coastal Geospatial and Educational Mapping System (Coastal GEMS) is a useful tool that will benefit all of the VCZMP partners and should help to integrate many separately funded projects and data sets.

The ultimate goal of Coastal GEMS is to foster stronger linkages between local land use plans with Commonwealth water use policies. As it is further populated and refined, the evaluation team believes the output data could be translated into information for local decision-makers, or federal consistency reviewers could consider the integrated data layers as agencies look at the broader impact of consistency decisions. Because Coastal GEMS is such a comprehensive tool, it would be an excellent mechanism for use in developing and refining the Commonwealth's CELCP (Coastal and Estuarine Land Conservation Program) plan.

One plan to capitalize on the information contained in Coastal GEMS is in place through the 2006-2010 Section 309 strategy on Intergovernmental Decision-making. Teams will be going out to each of the eight coastal planning district commissions (PDCs) to run workshops on

Coastal GEMS for the PDCs' local government members. Workshops within individual agencies and other groups will be conducted as needed and as time and resources allow.

#### B. PUBLIC ACCESS

Public access is integrated into numerous projects and activities supported by the VCZMP, including the Seaside Heritage Program and special area management plans. The coastal program provided funds for reconstruction of a T-head access pier to the New Point Comfort Lighthouse in Mathews County. The lighthouse is the third oldest lighthouse in the Chesapeake Bay. Prior to this evaluation period, the VCZMP purchased land on New Point Comfort very near the lighthouse and then built a boardwalk northwest of the lighthouse on the mainland. A preservation task force was formed to develop a master plan for preserving the lighthouse and making it accessible to the public. Hurricanes in 1933 severed the lighthouse from the mainland, and the lighthouse now stands on a small rip-rap island about one-quarter mile from the mainland. The pier, previously destroyed by storms on the island, was completed during this evaluation period and now provides both public access and access for site improvements and normal maintenance work and repairs on the lighthouse.

Repair and extension of a jetty pier in the Town of Cape Charles, on Virginia's Eastern Shore, was also completed during this evaluation period. The pier was originally constructed in the 1990s using VCZMP funding and is heavily used by the local population and tourists. An additional 300 feet was added to the pier (a total length of almost 1,790 feet). The expansion includes a right-angled extension into deeper waters for better fishing, a roofed structure toward the center of the pier to provide cover from sun and rain, and special lights aimed downward toward the water to attract fish at night and prevent nocturnally migrating birds from being distracted.

Northampton County completed construction of a raised wooden walkway trail and overlook platform through the woodlands along the marsh edge of the new Seaside Park as part of a larger trail network within the park. Seaside Park is a designated national 'brownfield to greenfield' showcase by the U.S. EPA. It is part of the Northampton Special Area Management Plan and implements part of the VCZMP Seaside Heritage Program's ecotourism goal. NOAA's Office of Sustainable Development and Intergovernmental Affairs funded workshops for the design of the park (prior to this evaluation period).

The most recent evaluation findings discussed the creation of the Middle Peninsula Chesapeake Bay Public Access Authority (PAA). The PAA is a special purpose body created by the Virginia General Assembly to specifically deal with the regional issue of providing and protecting public access to the water. Through the VCZMP's Technical Assistance Program to the planning district commissions (PDCs), the Middle Peninsula PDC was able to address the issue of public access and create this particular solution. In addition to the New Point Comfort Lighthouse access improvements discussed above, the Middle Peninsula Chesapeake Bay PAA is acquiring land known as the Browne Tract with VCZMP funding for general public passive and active pursuits. During this evaluation period, the Northern Neck PDC has also been enabled by the General Assembly to create a PAA. That effort is just beginning.

ACCOMPLISHMENT: The VCZMP has been successful in supporting a variety of mechanisms to acquire or improve coastal public access. In particular, the program's support in the creation and implementation of the public access authority concept is acknowledged.

#### C. COASTAL HABITAT

The VCZMP has a number of projects and initiatives that address various aspects of coastal habitat. Because some of these projects and initiatives focus on multiple issues, they may be discussed in more than one section in these findings. The program has also worked with a variety of partners, and in particular, the Virginia Institute of Marine Science, to address coastal habitat issues.

The Seaside Heritage Program is the second focal area to which the VCZMP has directed Section 306 funding. Focusing on a resource or special geographic region for a multi-year period enables the program to more effectively concentrate its financial and policy efforts. The goal is to "kick-start" a long-term, self-sustaining program or movement. The first focal area, the Oyster Heritage Program, was resource-specific. The coastal program initiated the Seaside Heritage Program in 2002, and funding will continue through September 2008. Its focus is geographic – Virginia's Eastern Shore, which is the Atlantic Ocean watershed out to the 3-mile territorial sea boundary on the Virginia portion of the Delmarva Peninsula – and it addresses not only management of the aquatic resources of the barrier islands, bays, and salt marshes along the shore, but also use-conflict resolution and sustainable economic development, such as tourism and aquaculture.

During this evaluation period, Seaside Heritage Program partners planted eelgrass for each of three fall seasons with apparent excellent success. Since the 1930s, there has been virtually a total absence of eelgrass, but recovery rates are very promising. Broadcasting seeds by hand instead of transplanting whole plants has proven to be an extremely effective method of restoration. Oyster restoration is somewhat more difficult than seagrass restoration but efforts have continued. Seaside oysters tend to grow very quickly in these higher salinity waters (as compared to Chesapeake Bay) but are very susceptive to diseases to which they succumb at ages 2-3. Salt marsh restoration is also an important aspect of the Seaside Heritage Program. The salt marshes are seriously threatened by the invasive reed *Phragmites australis*. All the phragmites acreage has been mapped, control work using aerial spraying has begun, and workshops on how to control phragmites have been conducted for private landowners. Finally, the Seaside Program has used radio collars to map mammalian predators (foxes and raccoons) as part of the effort to restore beach nesting bird habitat by removing those predators from certain barrier islands. Monitoring of avian nesting following removal of predators on six barrier islands showed bird numbers and nest productivity increased in most cases.

The VCZMP also uses the special area management plan (SAMP) to address a variety of issues, including those related to coastal habitat. Most of the coastal program's efforts during this evaluation period have focused on the Dragon Run SAMP (the others include the Northampton County SAMP initiated in 1991-92, and the Southern Watersheds SAMP begun in 1996). The

Dragon Run is ranked 2<sup>nd</sup> of 232 natural areas in the Chesapeake Bay region for its ecological significance and is recognized as the most pristine watershed in Virginia (Smithsonian Institute). Because the watershed is dominated by forestry and farming and is largely undeveloped, the project goals generally involve or will ultimately result in protection and management of the Dragon Run's ecosystems and habitats. A management plan for the Dragon Run Watershed was completed in November 2003, and three of the four counties in the watershed have adopted the management plan as an addendum to their comprehensive plans. Acquisition of the 274-acre Browne tract within the Dragon Run with VCZMP funds was completed in this evaluation period as well, thereby protecting significant coastal resources and habitat.

The coastal program has also begun work on a new SAMP. The SAMP focus area remains a high priority in the Section 309 Assessment for 2006-2010, and a strategy has been developed for a Seaside SAMP to develop new enforceable policies designed to protect the investments made under the Seaside Heritage Program. Such policies may include regulations regarding the use of subaqueous lands and associated uplands, and local ordinances designed to protect seaside water quality and habitat.

ACCOMPLISHMENT: The Virginia Coastal Zone Management Program continues to use a number of techniques with success, including the special area management plans and focal areas (heritage programs), to protect and manage coastal resources and habitats through both regulatory and non-regulatory/consensus strategies. Significantly, the Dragon Run SAMP Watershed Management Plan has been adopted by three of the four counties within the watershed, and the VCZMP is expanding the process to include a new Seaside SAMP to protect the investments made under the Seaside Heritage Program.

## D. WATER QUALITY

The VCZMP's fully-approved coastal nonpoint pollution control program (nonpoint program) is a major mechanism through which the coastal program addresses coastal water quality. After a vacancy of approximately a year and a half, the VCZMP was able to fill the nonpoint program manager position.

During the period covered by this evaluation the primary focus of the nonpoint program was on implementation of the hydromodification management measures. A stream restoration workgroup was established and a stream restoration guide was developed, which provides a technical resource for government, private, and non-profit organizations involved in designing or constructing stream channel and bank stabilization and restoration projects. As an outgrowth of the need to document the health of streams in the coastal zone, a stream health assessment was developed to specifically address the management measure for protecting surface water quality and in-stream and riparian habitat. Development of the Interactive Stream Assessment Resource (INSTAR) has evolved into a comprehensive stream health assessment. INSTAR provides access to an extensive dataset for stream reaches throughout Virginia's coastal zone, including in-stream habitat and stream geomorphology. INSTAR also has the capability to model streams in the coastal zone and assign 'stream health' values.

Implementation of onsite sewage disposal system (OSDS) management measures was another focal area, and an OSDS plume characterization study was completed. The project focused on assessing the utility and applicability of using a fluorometer to investigate OSDS failure. A fluorometer is a device that fluoresces in the presence of certain agents found in detergents and is therefore thought to be a good indicator of human wastewater signatures. The technology was also tested as a tool for locating leaking sewage lines. Overall, the technology shows considerable promise, and the Department of Health and some local governments are continuing tests to document its effectiveness.

The nonpoint program's third major implementation priority during this evaluation period was local government capacity building. Direct funding support was made available to local governments for planning, ordinance development, and data development and dissemination primarily related to stream health assessment and watershed planning. Some of these projects included:

- City of Chesapeake Milldam Creek Ecological Assessment
- James City County Skiffes Creek Watershed Plan
- City of Fairfax Watershed Plan
- Henrico County Rocky Branch Stream Stabilization Plan
- Arlington County Donaldson Run Assessment
- Northern Virginia Onsite Wastewater Program

The VCZMP has reported that direct funding support to local governments has proven difficult because of competing priorities and local staffing limitations, and therefore the coastal program has decided that technical assistance will be a primary nonpoint program focus. At a more general level, the VCZMP wants to start putting to use for local decision-makers and governments the vast amount of data it has. Helping local officials use much of the data that relates to coastal nonpoint is an excellent element of technical assistance. It does appear, however, that another opportunity is available. With the 'devolution' of local road planning, operations, and maintenance from the Virginia DOT to the local level, the VCZMP might consider using nonpoint program funding to support targeted assistance for the "Roads, Highways, and Bridges" nonpoint program management measures. A new nonpoint program manager can work with the VCZMP to develop a niche or establish priorities for the nonpoint program. Because the nonpoint program federal funding is uncertain from year to year, some projects can be identified and developed for implementation whenever and whatever funding levels become available to the Commonwealth.

The newly established Chesapeake NEMO (Nonpoint Education for Municipal Officials) initiative, a federally coordinated network of education and assistance for municipal officials, presents the VCZMP partners (e.g., DCR, DEQ, and the PDCs) with an opportunity to tap into greater levels of financial and technical assistance than are available solely through Section 310 of the CZMA. In addition, early discussions between State agency staff and Chesapeake NEMO partners have helped generate new ideas for ways of reaching local stakeholders and new opportunities for cross-agency collaboration among Virginia agencies.

PROGRAM SUGGESTION: With the 'devolution' of local road planning, operations, and maintenance from the Virginia DOT to the local level, the VCZMP should consider using nonpoint program funding to support targeted assistance for the "Roads, Highways, and Bridges" nonpoint program management measures. The VCZMP and the nonpoint program manager should work to establish priorities for the nonpoint program and identify and develop for implementation some projects for whenever and whatever funding becomes available.

#### E. COASTAL HAZARDS

The VCZMP's primary mechanism for addressing coastal hazards is beach and dune protection through the Coastal Primary Sand Dunes and Beaches Act. The Chesapeake Bay Preservation Act provides some protection to non-primary dunes. Shoreline management, some activities associated with some special area management plan efforts, wetland protection, and education of the public are the other major ways coastal hazards are addressed in Virginia.

The VCZMP has provided funding during the period covered by this evaluation for several projects to address various aspects of coastal hazards. A coastal program internship focused on the issue of supratidal beaches (those above mean high water that are found along the tributaries of the Chesapeake Bay) that are not regulated by either the Tidal Wetlands Act or the Coastal Primary Sand Dunes and Beaches Act (Dunes/Beaches Act). A report was then developed that evaluates the need for expanded regulatory authority over these beaches. The Virginia Institute of Marine Science (VIMS) received funding to complement this supratidal beaches study by using aerial video and mapping imagery to determine the location and extent of beaches in 19 localities not covered by the Dunes/Beaches Act. The VIMS also received funds from the VCZMP to develop shoreline situation reports and shoreline evolution maps for localities with higher energy shorelines.

The Commonwealth's 2001 Section 309 Assessment ranked coastal hazards as a high priority issue, and the recently developed 2006 Assessment reached the same conclusion. At the time of the site visit, the VCZMP had drafted and submitted strategies to address coastal hazards over the next five-year period. The strategy would result in recommendations for improving management of Virginia's dune and beach resources through changes to the Dunes/Beaches Act. If these changes were made, the strategy would then focus on updating and improving the Coastal Primary Sand Dunes/Beaches Guidelines. The coastal program is also focusing on promoting the concept of living shorelines (as opposed to shoreline hardening). Although its primary emphasis will be to address cumulative and secondary impacts of development through a technique that stabilizes the shoreline while providing valuable habitat and improving water quality, living shorelines will provide wetland and dune protection that can reduce the risks of coastal hazards. The VCZMP will hold a living shorelines summit in December 2006.

There is another mechanism already in place that the VCZMP could use to reduce some of the risks of coastal hazards, specifically hurricanes, storm surge/storm tide, and flooding. All-hazard mitigation planning has taken place locally, regionally and at the Commonwealth level under the requirements of FEMA (Federal Emergency Management Agency) through the Disaster

Mitigation Act of 2000. The coastal program, and more recently the CPT, have a history as a coordinating force for integration and collaboration with numerous partners. This includes established relationships with the planning district commissions and local communities and governments. Given those relationships and the VCZMP's access to Commonwealth and federal agency capacity, "coastal community resiliency" could be developed through existing partnerships and could benefit many localities in Virginia's coastal zone. Because local governments must deal with increased development along the coast, community resiliency as a prospective planning tool, and including elements such as vulnerability assessments, hazard mitigation, and economic vitality, among others, would seem to be an important facet as communities manage growth in the coastal zone. Much of the research done by VIMS related to dune protection and living shorelines could be integrated into training for local officials as part of a coastal community resiliency program.

OCRM acknowledges that the VCZMP already has a "full plate" of initiatives and priorities it is addressing with finite financial and staff resources. However, whenever the timing is appropriate (during discussions of Section 306 focal areas, or if additional funding is made available, for example), OCRM encourages the VCZMP to consider the development of a coastal community resilience initiative.

PROGRAM SUGGESTION: When the timing is appropriate, the VCZMP and its Commonwealth, regional, and local community partners should consider development of a coastal community resiliency initiative through existing partnerships and programs (e.g., SAMPS, directed technical assistance) as a further means to address coastal hazards. Existing research data and results and recent development of infrastructure (i.e., data layers and geospatial information) such as Coastal GEMS could be translated and disseminated through training programs and workshops for local government decision-makers as part of this effort.

#### F. COASTAL DEPENDENT USES AND COMMUNITY DEVELOPMENT

The VCZMP uses several program elements to address coastal dependent uses and community development. The Seaside Heritage Program seeks to demonstrate appropriate management of economic development and habitat restoration within a rare and fragile ecosystem. The coastal habitat aspects of this Program have been discussed in an earlier section of this document, but two projects address coastal dependent uses and community development through sustainable ecotourism. A 100-mile long Seaside Water Trail for canoes and kayaks has been developed with over 35 day-use paddling routes. The water trail guide and a companion web site identify appropriate public access locations and cultural resources and amenities near these locations as well as paddling time, level of difficulty, emergency and safety information, and information on wildlife and conservation practices. The Seaside Heritage Program has also developed an ecotourism guide certification training course. Organized canoe and kayak trips led by certified ecotour guides can help protect sensitive coastal resources and stimulate the economies of rural coastal communities.

Willis Wharf is a small community in Northampton County within the boundaries of the Seaside Heritage Program that is trying to maintain its fishing heritage in several ways, ranging from development of aquaculture facilities to being an important node for low impact boating via the Seaside Trail. Funding from the VCZMP is being used for ecotourism site improvements to a County-owned property at the marina. A wildlife viewing platform overlooking the tidal wetlands and kiosk with interpretive displays explaining the barrier island-lagoon ecosystem and its wildlife are being constructed. Willis Wharf is a stop on both the Virginia Birding and Wildlife Trail and the Seaside Water Trail. The increased interest in outdoor recreation and wildlife viewing and increasing economic impacts from wildlife watchers carry the potential for long-term adverse effects from increased numbers of visitors. This project benefits the County in terms of increased economic impact while directing that impact to activities that have a light footprint and are in keeping with the community's development desires.

The SAMP program also provides a mechanism to address a broad set of issues related to community development, including economic development and environmental/resource protection. The Northampton County SAMP was an early success story in encouraging sustainable industries and low impact tourism in an area where the creation of jobs is desirable. The Cape Charles Sustainable Technologies Park, the nation's first eco-industrial park, was developed through the SAMP. The County is a key migratory bird stopover area, which offers the opportunity to establish ecotourism. The Eastern Shore of Virginia Birding and Wildlife Festival was initiated in 1993 through the SAMP and held its 14<sup>th</sup> annual event in 2006. It draws over 1,000 birders to the County each October, adding to the economy of the area. Through the SAMP program, land has been purchased through partnerships with nonprofit organizations and state and federal agencies in, for example, the Dragon Run SAMP (Browne Tract).

The coastal program's technical assistance grants to planning district commissions (PDCs) also work to assure coastal and community development that is sensitive to natural, historic, and cultural resources and to a community's traditional waterfront heritage. The PDCs have worked with local governments and communities on issues ranging from water quality, economic sustainability, comprehensive land use planning and zoning, land conservation, and Chesapeake Bay activities. PDC technical assistance has also benefited local governments within all three SAMPs. Additional discussion and a recommendation regarding a greater focus on the education of local government decision makers is included in the following section, Item 3. Public Participation and Outreach.

#### G. GOVERNMENT COORDINATION AND DECISION-MAKING

#### 1. Federal Consistency

Virginia's federal consistency review is administered by the DEQ Office of Environmental Impact Reviews (OEIR) and is located in the Environmental Enhancement Division, with the VCZMP. Since the most recent evaluation in August 2003 until the time of this evaluation site visit, the OEIR reviewed over 700 projects in the coastal zone for federal consistency. This represents approximately 76% of total projects reviewed statewide for federal consistency, state consistency, or NEPA review. Because the VCZMP is a networked structure, the federal

consistency process and OEIR benefit from the review of a wide range of experts in different agencies, but coordination becomes somewhat difficult, with different deadlines and priorities. The OIER and the coastal program have a 'lateral' relationship in the Environmental Enhancement Division. Although the two programs must sometimes compete for limited resources, the small staff size of both programs often means that personal relationships are important for, and the cause of, a very successful working process.

During the site visit the evaluation team visited a project site where federal consistency and the cooperation between the industry, federal and state agencies, and citizens are influencing the outcome of a project. The US Nuclear Regulatory Commission was the federal licensing agency for an early site permit application submitted by Dominion Virginia Power Company (Dominion). The application was for the construction of two new reactor units at Dominion's existing North Anna Power Station in Louisa County. Although the proposed site is not located within the geographical boundaries of Virginia's coastal zone, Dominion determined that the proposed action could affect Virginia's coastal uses and resources through potential impacts of site preparation activities on coastal water quality and submitted a consistency certification.

Simplistically, the proposed process for cooling one of the two new reactors involved withdrawal of "cool" water from one side of Lake Anna and discharge of the "hot" water after it was used to cool the reactor into the other side of Lake Anna. The lake is split and divided by a series of small islands and dikes. The dike farthest from the power station allows flow from the hot to the cool side so the water recirculates. Residents living on the hot side of the lake were very concerned about the impacts of the proposal, and reviewers believed the proposal to be inconsistent with fisheries management and point source pollution control enforceable policies of the VCZMP.

Residents living on the hot side of Lake Anna contacted DEQ about their concerns about the increase in water temperature that would result from the cooling system. At the site visit, the residents expressed their gratitude for the federal consistency process – the NEPA process would not have offered them a mechanism to raise their concerns. Through the hard work and cooperation of Dominion representatives, the OEIR and VCZMP staffs, and Virginia's coastal networked agencies, the project has been modified, and although the final consistency determination certification was not completed at the time of the site visit, all the parties acknowledged the role that federal consistency played in bringing everyone together. The final resolution of this effort has not yet been concluded.

ACCOMPLISHMENT: The VCZMP and the Commonwealth have been successful at using the federal consistency process to address citizen concerns and to gather together all interested parties to bring about changes to proposed projects so that they are consistent with the enforceable policies of the VCZMP.

Perhaps a next step could build upon the ability of VCZMP and OEIR staffs and the federal consistency process itself to bring affected parties to the table and bring about change in a project or proposal. Although federal consistency is a mechanism to implement state policy, using the federal consistency process to bring about changes in state-level policies seems to be a logical

link between federal consistency decisions and the basis for those decisions. The Coastal Policy Team provides a mechanism to discuss issues as well as to recommend state policy changes. Perhaps the CPT could review a yearly synthesis of priority consistency projects with a goal of looking for any policy changes that could have affected some of those decisions or would have rendered the decision (consistent or inconsistent) unnecessary.

PROGRAM SUGGESTION: The Coastal Policy Team should consider using federal consistency as a tool for identifying opportunities to review state policies or influencing new state policy based upon new situations presented in federal consistency determinations.

The most recent evaluation findings included a Necessary Action requiring the VCZMP to establish a schedule for submission of amendments and changes to existing policies and core authorities for incorporation into the coastal program and to identify and prioritize other policies and programs for incorporation into the program. The coastal program staff worked with OCRM to establish a schedule, and began submitting amendment/change packages. Five program change packages were submitted until OCRM requested a temporary hold until OCRM staff could catch up.

## 2. Programmatic Coordination and Partnerships

During the period covered by this evaluation, revisions to a joint permit application (JPA) were adopted. Projects to control shoreline erosion on private property fall under the jurisdictions of regulatory programs administered at the state, federal and local levels. A JPA was adopted long ago by the entities involved in the regulatory process to address impacts to wetlands, beaches, and dunes. However, the riparian zone landward of those resources that are affected by shoreline erosion control projects may also be impacted. Construction and land disturbance in the riparian zone falls under the jurisdiction of the Chesapeake Bay Preservation Act (Bay Act) and the Erosion and Sediment Control Act, both administered by local governments, and were not addressed by the JPA. Following evaluation of this issue by the VCZMP staff, the Coastal Policy Team, a new JPA has been adopted that focuses on shorelines erosion projects and includes clarification about the relationship of these projects and the regulations that apply to the riparian zone. The Tidewater JPA is shorter, more informative for property owners, and includes a diagram of regulatory jurisdictions as well as an explanation of Bay Act requirements and process. As a result of the Coastal Policy Team discussion, the Division of Chesapeake Bay Local Assistance at the Department of Conservation and Recreation has also clarified its regulations with respect to shoreline erosion control projects and adopted a Riparian Buffers Modification and Mitigation Guidance Manual that clarifies local administration responsibilities for shoreline projects.

ACCOMPLISHMENT: The VCZMP, its networked partners, and federal regulatory agencies developed and adopted a modified "Tidewater Joint Permit Application" to address impacts to the riparian zone from projects to control shoreline erosion. The end result has been a better coordinated regulatory process that both protects resources and minimizes delays for property owners.

The Virginia coastal program is particularly skilled at both formal and informal coordination. As discussed earlier, the Coastal Policy Team (CPT) facilitates communication and coordination in a formal way with networked agencies and partners. Such a management or policy team can sometimes be little more than a monthly meeting where members may or may not attend with any regularity. But the CPT members themselves told the evaluation team that they believe the CPT is the only place where agencies can discuss coastal issues, especially use conflicts. They all strongly support the CPT and discussed both its accomplishments and areas for greater scrutiny and emphasis in the future.

As a networked program with a small staff, developing partnerships is a necessary skill. It seems to be an automatic response for the staff to make connections with a wide range of individuals and organizations, not only to seek assistance in a coastal program activity, but to offer VCZMP assistance to others whenever it can. The planning district commissions offer a way for the coastal program to reach local governments and decision-makers and in turn bring local government concerns and issues to the networked agencies of the VCZMP. The coastal program also sponsors a biennial "Coastal Partners Workshop" to provide a specific forum for all its partners to share information and strengthen connections.

#### 3. Public Participation and Outreach

As was discussed in a preceding section entitled "Program Identity and Visibility," the VCZMP has begun to more clearly delineate its identity and be more visible to a wide range of partners and citizens to whom it provides information. Education and outreach are a part of all projects and programs conducted by the VCZMP. The coastal program has an excellent web site populated with a great depth and breadth of data and information, as well as links to other sites and data/information sources. It produces an excellent VCZMP magazine as well as a variety of other project or resource-specific publications. There are many opportunities for education, and it is a difficult task to find a balance among the wide range of audiences and subjects to address.

During the evaluation site visit, there were several opportunities noted where local and coastal decision-makers were an audience in need of information or education on various topics (e.g., local wetlands boards, VIMS research on dunes, a possible 'coastal community resiliency" program). The evaluation team believes that the VCZMP should evaluate just what educational niches it best serves, keeping in mind that local and coastal decision-makers appear to be "underserved." The planning district commissions are an obvious conduit to that market, and Sea Grant and the Chesapeake Bay-Virginia National Estuarine Research Reserve's (NERR) Coastal Training Program are mechanisms for helping to serve that decision-maker community. Because of limited staff and resources, this may also require reconsideration about the extent of outreach and education to the traditional K-12 school community.

PROGRAM SUGGESTION: The Virginia Coastal Zone Management Program should evaluate the numerous educational and outreach markets it serves and consider a stronger focus on the local and coastal decision-makers. The planning district commissions, Sea Grant, the Chesapeake Bay-Virginia NERR Coastal Training Program, and the federal staff of the Chesapeake NEMO program could provide coordination and assistance.

## 4. Aquaculture

During this most recent evaluation period, the Seaside Heritage Program has focused in part on clam aquaculture. The VCZMP contracted with the Virginia Institute of Marine Science (VIMS), who worked with the five largest members of the clam aquaculture industry to develop a draft set of "Environmental Codes of Practice (ECOP) and Best Management Practices (BMPs)." The draft ECOPs have received general industry endorsement, while the ultimate goal is to get industry buy-in and commitment to implement the BMPs.

The Seaside Heritage Program is also addressing possible conflicts between clam aquaculture and feeding activity of migratory shorebirds. The Virginia Coast Reserve and associated habitats along the seaside of the Delmarva Peninsula support significant numbers of migrant shorebirds and have been designated as a Western Hemisphere Shorebird Reserve with international status. The majority of migrant shorebirds focus their foraging activities on intertidal mud flats. Commercial clam aquaculture involves planting beds of clams that are covered with predator excluding plastic for up to two years before harvesting. A large clam farm may have 100 or more nets covering an area of several acres. The number of nets located along the Delmarva Peninsula (and specifically within the area of the Virginia Seaside Heritage Program) or what percentage of available shorebird foraging habitat they impact is not known.

Benthic samples have been taken at sites with and without clam aquaculture to determine the type and abundance of prey species available to shorebirds and the potential impacts of clam aquaculture on prey availability. Preliminary data indicate potential conflicts between shorebird foraging and clam aquaculture may be limited. Shorebirds tend to feed higher in the intertidal zone than the clam aquaculture sites are located, and shorebirds may be feeding on organisms attached to the clam nets, which could be mutually beneficial. This data will be important to consider when aquaculture BMP guidelines are finalized.

Aquaculture was a high priority issue in the Year 2001-2005 Section 309 Coastal Needs Assessment and Strategy. The 2001-2005 aquaculture strategy (a portion of which occurred during this evaluation period) included two efforts to complete the development of a comprehensive aquaculture management program in Virginia: 1) development of guidance ensuring aquaculture activities occur in the most appropriate locations that may ultimately be incorporated into the review of permit applications; and 2) development of guidance/regulations for the integration and coordination of the many aquaculture management programs in the Commonwealth. The VCZMP partners were authorized by the Virginia General Assembly to prepare a management plan for shallow water areas in the Chesapeake Bay to reduce use conflicts and promote continued development and long-term sustainability of aquaculture operations. The Virginia Marine Resources Commission drafted an amendment "Water Column

Leases for Aquaculture Purposes," which authorized the VMRC to lease the water column above certain state-owned bottomlands for aquaculture purposes. In April 2004 the Virginia General Assembly approved the amendment. Once funded, the amendment would provide the aquaculture industry with necessary water rights and protection while minimizing potential conflicts with other user groups and existing natural resources. However, the bill would only have been effective if the General Assembly earmarked state funding for the specific purpose. Funding was not provided, and the legislation expired.

The Year 2006-2010 Section 309 Coastal Needs Assessment and Strategy again finds aquaculture to be a high priority and proposes a strategy to complete development of a set of BMPs for all shellfish (oyster, clam and other shellfish) farming for all of Virginia's waters, which would be attached to aquaculture or shellfish growing permits. It also proposes to develop policies for ensuring that appropriate areas are set aside for shellfish aquaculture.

The VCZMP has also addressed non-commercial oyster 'gardening,' which is a rapidly growing hobby in Virginia. During this evaluation period the Oyster Reef Heritage Foundation notified the VCZMP that it had unallocated funds left from a NOAA Oyster Restoration grant. The VCZMP, Tidewater Oyster Gardeners Association, VIMS, and the Oyster Reef Heritage Foundation decided to use the funds to update a 1999 VIMS booklet dealing with culturing oysters. "Virginia Oyster Gardening" is a 20+ page document that is a step-by-step, colorful, easy-to-read guide for hobbyists. It was recently translated into Japanese.

#### V. CONCLUSION

For the reasons stated herein, I find that the Commonwealth of Virginia is adhering to the programmatic requirements of the Coastal Zone Management Act and its implementing regulations in the operation of its approved VCZMP.

The VCZMP has made notable progress in the following areas: Organization and Administration, Grants Management, Program Identity and Visibility, Use of Technology, Public Access, Coastal Habitat, Federal Consistency, and Programmatic Coordination and Partnerships.

These evaluation findings also contain six (6) recommendations. All of the recommendations are in the form of Program Suggestions. There are no Necessary Actions. The Program Suggestions should be addressed before the next regularly-scheduled program evaluation, but they are not mandatory at this time. Program Suggestions that must be repeated in subsequent evaluations may be elevated to Necessary Actions. Summary tables of program accomplishments and recommendations are provided in Section VI.

This is a programmatic evaluation of the VCZMP which may have implications regarding the Commonwealth's financial assistance awards. However, it does not make any judgment about or replace any financial audits.

/signed/ David M. Kennedy	<u>2-27-07</u>	
David M. Kennedy	Date	
Director, Office of Ocean and Coastal		
Resource Management		

## VI. APPENDICES

# Appendix A. Summary of Accomplishments and Recommendations

The evaluation team documented a number of the DEQ's accomplishments during the review period. These include:

Issue Area	Accomplishment
Organization and Administration	The Virginia Coastal Zone Management Program, through its staff members and the Coastal Policy Team, provides a unique mechanism and venue for the Commonwealth for integration and collaboration on a wide range of coastal issues and policies. In doing so, it creates strong relationships with citizens at the regional and local level, garnering support and building consensus.
Grants Management	The Virginia Coastal Zone Management Program has created a grants database capable of providing a variety of information and reports that serve a number of functions. In particular, the database can generate information for performance indicators reporting.
Program Identity and Visibility	The VCZMP has taken actions to improve the program's visibility and distinct identity since the previous evaluation.
Use of Technology	The Coastal Geospatial and Educational Mapping System (Coastal GEMS) is a useful tool that will benefit all of the VCZMP partners and should help to integrate many separately funded projects and data sets.
Public Access	The VCZMP has been successful in supporting a variety of mechanisms to acquire or improve coastal public access. In particular, the program's support in the creation and implementation of the public access authority concept is acknowledged.
Coastal Habitat	The Virginia Coastal Zone Management Program continues to use a number of techniques with success, including the special area management plans and focal areas (heritage programs), to protect and manage coastal resources and habitats through both regulatory and non-regulatory/consensus strategies. Significantly, the Dragon Run SAMP Watershed Management Plan has been adopted by three of the four counties within the watershed, and the VCZMP is expanding the process to include a new Seaside SAMP to protect the investments made under the Seaside Heritage Program.

Federal Consistency	The VCZMP and the Commonwealth have been successful at using the federal consistency process to address citizen concerns and to gather together all interested parties to bring about changes to proposed projects so that they are consistent with the enforceable policies of the VCZMP.
Programmatic Coordination and Partnerships	The VCZMP, its networked partners, and federal regulatory agencies developed and adopted a modified "Tidewater Joint Permit Application" to address impacts to the riparian zone from projects to control shoreline erosion. The end result has been a better coordinated regulatory process that both protects resources and minimizes delays for property owners.

In addition to the accomplishments listed above, the evaluation team identified several areas where the program could be strengthened. Recommendations are in the form of Program Suggestions and Necessary Actions. Areas for improvement include:

Issue Area	Recommendation
Coastal Policy Team	PROGRAM SUGGESTION: The Coastal Policy Team should continue its strategic planning efforts for the team and the VCZMP. There should be clear links for measurement between the strategic planning efforts and the issues, projects, and partnerships in which the CPT and the VCZMP are involved. If there are areas of policy development and recommendation in which the CPT specifically acts (e.g., statutory or rule recommendations), the CPT could also set objectives and some measurable goals or performance measure criteria to help gauge the CPT's specific success.
Grants Management	PROGRAM SUGGESTION: Prior to development of the application for 2007 grant award funds, the VCZMP should consider ways to diversify match used for the CZMA cooperative agreement and to ensure mechanisms are in place to spend federal funds within the 18-month time frame of the award.
Water Quality	PROGRAM SUGGESTION: With the 'devolution' of local road planning, operations, and maintenance from the Virginia DOT to the local level, the VCZMP should consider using nonpoint program funding to support targeted assistance for the "Roads, Highways, and Bridges" nonpoint program management measures. The VCZMP and the nonpoint program manager should work to establish priorities for the nonpoint program and identify and develop for implementation some projects for whenever and whatever funding becomes available.

Coastal Hazards	PROGRAM SUGGESTION: When the timing is appropriate, the VCZMP and its Commonwealth, regional, and local community partners should consider development of a coastal community resiliency initiative through existing partnerships and programs (e.g., SAMPS, directed technical assistance) as a further means to address coastal hazards. Existing research data and results and recent development of infrastructure (i.e., data layers and geospatial information) such as Coastal GEMS could be translated and disseminated through training programs and workshops for local government decision-makers as part of this effort.
Federal Consistency	PROGRAM SUGGESTION: The Coastal Policy Team should consider using federal consistency as a tool for identifying opportunities to review state policies or influencing new state policy based upon new situations presented in federal consistency determinations.
Public Participation and Outreach	PROGRAM SUGGESTION: The Virginia Coastal Zone Management Program should evaluate the numerous educational and outreach markets it serves and consider a stronger focus on the local and coastal decision-makers. The planning district commissions, Sea Grant, the Chesapeake Bay-Virginia NERR Coastal Training Program, and the federal staff of the Chesapeake NEMO program could provide coordination and assistance.

## **Appendix B. Response to Previous (2004) Evaluation Findings**

<u>Program Suggestion:</u> The VCP and the Coastal Policy Team should consider developing a formal mechanism for communicating policy recommendations, suggestions, requests, or other information through departmental agency heads to the Secretary of Natural Resources.

Response: The Virginia CZM Program now formally includes the Deputy Secretary of Natural Resources (currently Nikki Rovner, with Jeff Corbin, the Assistant Secretary, serving as an alternate) in its Coastal Policy Team membership. This provides a direct conduit through which policy recommendations developed by the team can reach the Secretary's Office. In addition, Rick Linker (DEQ – Policy Division) works with the Virginia CZM Program and attends Policy Team meetings to help advance legislative recommendations from the team to the Secretary's Office and finally to the General Assembly.

An example of this is the 2005 General Assembly directive for the Virginia Department of Mines, Minerals and Energy and the Coastal Policy Team to prepare a study on the potential impacts of natural gas exploration and production in the coastal waters of the Commonwealth (HJR 625). The Coastal Policy Team all provided input to the study and our recommendations were all incorporated into Secretary of Commerce & Trade Schewel's report to the General Assembly. Subsequently, as oil and gas legislation was discussed during the 2006 General Assembly, Rick worked with us to incorporate CPT concerns and recommendations into the various pieces of oil and gas legislation that DEQ was reviewing.

The Deputy Secretary of Natural Resources also receives copies of all emails sent to the CPT regarding program activities, including the Coastal States Organization Weekly Reports. In addition, Virginia CZM staff prepare weekly reports on our activities that flow through the DEQ Director's Office directly to the Secretary of Natural Resources.

As an example, through the weekly reports and direct interaction with the Deputy Secretary, the Secretary's Office will be stepping in to help resolve policy differences with Virginia's Department of General Services relative to coastal land acquisitions.

<u>Program Suggestion:</u> The VCP is encouraged to continue its work on a state coastal management performance indicator system and, to the extent possible, to closely align its efforts with the work toward a national coastal management indicator system being conducted by NOAA. The state is urged to participate in and comment on the work of NOAA and state participants in the development of a national performance indicator system and to share the VCP's experiences in its system development efforts with other states.

<u>Response:</u> The Virginia CZM Program abandoned its biennial review process in favor of NOAA's new indicator program.

<u>Necessary Action:</u> a) Within six months from the date of these findings, the VCP must work with OCRM to complete a schedule for submission of amendments and changes to existing

policy and core authorities for incorporation into the VCP. b) Within one year from the date of these findings, the VCP must identify and prioritize other policies and programs that should be incorporated into the VCP.

Response: Virginia CZM staff worked with OCRM to create a schedule for program updates. Work then began on individual updates in early 2004. Virginia CZM contracted with the Environmental Law Institute to prepare packages and began submitting them to NOAA beginning in the summer of 2004. Five program change packages have been submitted and recently NOAA requested that we hold back on any additional submissions until NOAA can catch up.

<u>Program Suggestion:</u> The VCP should continue its efforts to maintain and increase program visibility through its outreach and other activities. In particular it should work with the planning district commissions, which serve as points of contact with coastal local governments, and which should work to acknowledge the role of the VCP. The VCP should also assure that all projects funded through the VCP acknowledge that role with appropriate signage or other written Statements as appropriate.

<u>Response</u>: In December 2004 staff held a retreat to focus, in part, on our lack of visibility. Virginia CZM staff took a fresh look at the communication component of our office. We clarified goals, target audiences and message(s) and discussed the effectiveness of our current communication tools in reaching these target audiences and conveying these message(s). A primary message surfaced: "The Coastal Program is a problem-solving entity that uses networking, coordination and grants as tools to solve coastal management issues."

During the retreat, staff outlined immediate steps we could take to address our lack of visibility:

• Develop a Virginia CZM Program logo

A logo was professionally designed in 2005 with input from all networked partners and distributed with use guidelines to grantees. It is being incorporated into printed materials and our Web site. This consistency in appearance is helping to reinforce the "brand" the program conveys as a problem-solving, value-added network. Promotional items with the Logo have been made and distributed to the program's partners and the general public.

• *Provide a workshop for grantees* 

A Grantee Workshop was help in February of this year. Virginia CZM staff unveiled the new Virginia CZM program logo and discussion focused on how grantees can help improve the program's visibility through proper and consistent funding acknowledgement.

• Create grant categories to facilitate grants data analyses

Categorization of all grants by topic, program goal, recipient, geographic location, congressional district, project type and keywords is enabling us to quickly and easily generate reports about the program's accomplishments in fact sheets, displays, PowerPoint presentations, etc.

Other communication and education efforts and projects that have helped heighten awareness of program's value include:

- Virginia Coastal Zone Management Magazine
- Virginia CZM Web site
- Virginia CZM Program Exhibits and Presentations
- 2003 Coastal Partners Workshop
- 2005 Annual Northeast Regional Meeting
- Support for oyster gardening and publication of Virginia Oyster Gardening Guide
- Seaside Heritage Program Specific Outreach Publications, Signage and Web site

## Appendix C. Persons and Institutions Contacted

Office of the Secretary of Natural Resources
Jeff Corbin, Assistant Secretary

<u>Department of Environmental Quality</u> David Paylor, Director

Environmental Enhancement Division

Michael Murphy, Director
Ellie Irons, Manager, Environmental Impact Review/Federal Consistency
Charlie Ellis, Coordinator, Environmental Impact Review/Federal Consistency
John Fisher, Coordinator, Environmental Impact Review/Federal Consistency
Sharon Baxter, Manager, Pollution Prevention Program
Laura McKay, Manager, Virginia Coastal Zone Management Program
Shep Moon, Coastal Planner, Virginia Coastal Zone Management Program
Scott Lerberg, Coastal Specialist, Virginia Coastal Zone Management Program
Virginia Witmer, Outreach Coordinator, Virginia Coastal Zone Management Program
Rachel Bullene, Grants Coordinator, Virginia Coastal Zone Management Program

Air Quality Division

Dan Salkovitz, Office of Air Data Analysis

Water Quality Division
Arthur Butt, Chesapeake Bay Program
Dave Davis, Office of Wetland and Water Protection

Water Resources Division
Joe Hassell, Office of Water Supply Planning

Policy and Legislation
Ann Regn, Environmental Education
Rick Linker, Water Policy

#### Commonwealth Agency Representatives

Tony Watkinson, Marine Resource Commission, Habitat Management
Jack Travelstead, Marine Resource Commission, Fisheries Management
Jim Wesson, Marine Resource Commission, Oyster Conservation and Replenishment
Rick Hill, Department of Conservation and Recreation, Coastal Nonpoint Program
Tom Smith, Department of Conservation and Recreation, Natural Heritage Program
Rick Myers, Department of Conservation and Recreation, Natural Heritage Program
Joe Weber, Department of Conservation and Recreation, Natural Heritage Program
Jennifer Ciminelli, Department of Conservation and Recreation, Natural Heritage Program
Dot Field, Department of Conservation and Recreation, Natural Heritage Program
Joan Salvati, Department of Conservation and Recreation, Chesapeake Bay Local Assistance
David Whitehurst, Department of Game and Inland Fisheries, Wildlife Diversity Division

Jeff Trollinger, Department of Game and Inland Fisheries, Watchable Wildlife Program

John Kauffman, Department of Game and Inland Fisheries, District Biologist

Bob Croonenberghs, Department of Health, Division of Shellfish Sanitation

Mike Foreman, Department of Forestry, Forest Resources

Rick Woody, Department of Transportation

Roy Seward, Department of Agriculture and Consumer Services, Policy, Planning and Research

Robert McClintock, Economic Development Partnership

### Federal Agency Representatives

Sue Rice, U.S. Fish and Wildlife Service, Chincoteague and Eastern Shore of Virginia National Wildlife Refuges

Paula Jasinski, NOAA Chesapeake Bay Office

#### Planning District Commissions (PDCs)

Katherine Mull, Northern Virginia PDC

Lewis Lawrence, Middle Peninsula PDC

Paul Berge, Accomack-Northampton PDC

Elaine Meil, Accomack-Northampton PDC

Leslie Savage, Accomack-Northampton, PDC

John Carlock, Hampton Roads PDC

Eric Walberg, Hampton Roads PDC

Jackie Stewart, Richmond Regional PDC

Stuart McKenzie, Northern Neck PDC

Victor Liu, Crater PDC

Eldon James, Rappahannock Area Development Commission

#### Academia

Willy Reay, College of William and Mary, Virginia Institute of Marine Science, and Manager, Chesapeake Bay-Virginia National Estuarine Research Reserve

Carl Hershner, College of William and Mary, Virginia Institute of Marine Science

Lyle, Varnell, College of William and Mary, Virginia Institute of Marine Science

Marcia Berman, College of William and Mary, Virginia Institute of Marine Science

Scott Hardaway, College of William and Mary, Virginia Institute of Marine Science

Mark Luckenbach, College of William and Mary, Virginia Institute of Marine Science

Bob Orth, College of William and Mary, Virginia Institute of Marine Science

Bryan Watts, College of William and Mary, Center for Conservation Biology

Greg Garman, Virginia Commonwealth University

Will Shuart, Virginia Commonwealth University

### Other Organizations and Representatives

Andrew Barbour, Northampton County

Barry Truitt, The Nature Conservancy

Dave Harris, The Nature Conservancy

Richard Ayers, Virginia Eastern ShoreKeeper

Jane Kafigian, Willis Wharf Task Force

Dr. Urara Takashima, Japan Zoological Society

Dave Burden, SE Expeditions Harry Ruth, Friends of Lake Anna Dennis Schaible, Friends of Lake Anna Ken Remmers, Civic Association Water Quality Monitoring Tony Banks, Dominion Power Company

## Appendix D. Persons Attending the Public Meeting

The public meeting was held Monday, May 15, 2006, at 4:00 p.m. at the Department of Environmental Quality, First Floor Conference Room, 629 East Main Street, Richmond, Virginia.

No members of the public attended the public meeting.

# **Appendix E. NOAA's Response to Written Comments**

No written comments were received regarding the management or administration of the Virginia CZMP.