



### **Point Reyes National Seashore**

2007 Business Plan

Produced by National Park Service Business Management Group Fall 2007

U.S. Department of the Interior Washington, DC



#### National Park Service Mission Statement

The National Park Service preserves unimpaired the natural and cultural resources and intrinsic values of the National Park System for the enjoyment, education, and inspiration of this and future generations. The National Park Service cooperates with partners to extend the benefits of natural and cultural resource conservation and outdoor recreation throughout this country and the world.



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# A Message From the Superintendent

... efficient use of resources will enable us to achieve the important priorities we have identified.

—POINT REYES NATIONAL SEASHORE SUPERINTENDENT DON NEUBACHER



Point Reyes Superintendent Don Neubacher PHOTO BY KRISTIN GILLISS

Below, left to right: Historic Lifesaving Station at Drakes Bay; Tule Elk Reserve at Tomales Point; park visitor at terminus of Tomales Point Trail, PHOTOS BY KRISTIN GILLISS

Opposite, left to right: endangered beach layia plant in bloom, PHOTO BY JANE RODGERS; female elephant seal barking, PHOTO BY SEAN CASE; California quail, NPS PHOTO

As we look forward to Point Reyes National Seashore's fiftieth birthday in 2012 and the one hundredth anniversary of the National Park System in 2016, we plan to be prepared to meet the critical challenges ahead of us. In response, we have developed this strategic plan to guide us. Point Reyes National Seashore completed a business plan in 1999 and an updated plan in 2004. Management successfully pursued and implemented the strategies outlined within those documents. Significant progress has been made over the last 10 years in developing scientific opportunities, upgrading park facilities and infrastructure, developing partnerships, and expanding learning opportunities for the public.

Point Reyes National Seashore is approaching the next five years with several goals that promote leadership and innovation in facility management; research, protection and restoration of natural and cultural resources; sustainable resource use; and public outreach partnerships. We have identified the priorities of each division at the national seashore and provided an overview of our work. Looking forward, we have developed a list of strategies to guide management's efforts to utilize resources more efficiently. We recognize that efficient use of resources will enable us to achieve the important priorities we have identified.

The 80 miles of coastline, dramatic coastal bluffs, myriad life forms, and abundant recreational opportunities contribute to make Point Reyes an outstanding national park with unique

natural resources. The park also contains an abundance of significant historic resources, with 27 cultural landscapes identified for future preservation and close to 300 historic structures. The park has made great strides in developing a historic preservation maintenance team and has done significant rehabilitation projects on the Point Reyes Lighthouse and Lifeboat Station.

Today, the national seashore serves more than two million visitors annually and last year received a 100 percent visitor satisfaction rating according to a Servicewide survey. The park's employees and cadre of many partners and volunteers carry out the mission of the National Park System to care for and preserve the places that Americans entrust to us.

The staff and volunteers of the park are very dedicated to the mission of the National Park Service and will work hard to pursue these strategies and to achieve these priorities.

Don Neubacher Superintendent Point Reyes National Seashore September 2007

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### **Executive Summary**

#### **Historical Context**

The Historical Context portion of this plan examines trends and fluctuations in Point Reyes National Seashore's funding, annual visitation, and volunteers.

- Point Reyes National Seashore's funding from all sources has increased from \$5.8 million in Fiscal Year 1996 to \$14.7 million in Fiscal Year 2006. Over the last five fiscal years, the seashore's appropriated base funding, the most stable source of funds allocated by Congress, has increased 15 percent in nominal dollars, but only 1 percent when adjusted for inflation.
- Current visitation is 2.23 million annually. Point Reyes National Seashore visitation trends are consistent with National Park Service trends in general. In 2005 Point Reyes National Seashore generated a total of \$71.8 million in direct, indirect, and induced revenues in Marin and Sonoma Counties and accounted for approximately 850 jobs.
- The national seashore enjoyed 35,028 volunteer hours in Fiscal Year 2006. The National Park Service hourly valuation rate for volunteers in Fiscal Year 2006 was \$18.04, which yielded a benefit of more than \$631,000 to Point Reyes National Seashore. The national seashore's ratio of volunteers to park staff is 0.17, which is on par with the National Park Service average of 0.16.

#### **Current Park Operations**

In Fiscal Year 2006 Point Reyes National Seashore operated with 115 full-time equivalent (FTE) employees, including seasonal employees. An FTE is equal to 2,080 hours of work per year. The national seashore was also supported by network-funded positions, grant-funded individuals, and volunteers. Point Reyes National Seashore spent \$14.7 million in Fiscal Year 2006 for labor and other expenditures. These expenditures are grouped into six functional areas: Management and Administration, Facilities Operations and Maintenance, Law Enforcement and Visitor Safety, Resource Management, Visitor Experience and Enjoyment, and Investment/Non-operations Activities.

#### **Future Park Operations**

Point Reyes National Seashore has developed 12 strategies for the future. These strategies are classified into three categories: Generating Revenue/Increasing Reimbursables, Increasing Efficiencies/Cost Avoidance, and Improving Services or Other. By generating revenue and increasing reimbursements, the park hopes to augment the amount of funding available for operations and investments. Increasing efficiencies and avoiding costs would allow the national seashore to focus its financial resources on areas that are most critical to the mission of Point Reyes National Seashore. Improving services would enable the national seashore to advance its goals of preservation and education.



### **National Parks Business Plan Process**



The purpose of business planning in the National Park Service is to improve the ability of parks to more clearly communicate their financial status with principal stakeholders. A business plan answers such questions as: What is the business of this park unit? How much money does this park need to be operated within appropriate standards? This plan demonstrates the functional responsibilities, operational standards, and financial picture of the park.

A common methodology is applied by all parks developing business plans. Park activities are organized into six functional areas, which describe all areas of business for which a park is responsible. This allows the park to move beyond the traditional National Park Service method of reporting expenditures in terms of fund sources, and instead report expenditures in terms of activities. As a result, the park can communicate its financial situation more clearly to external audiences.

Completing the business plan process not only enables a park to produce a powerful communication tool, but also provides park management with financial and operational baseline knowledge for future decision making.

Park visitors enjoy opportunities for renewal and reflection at Arch Rock in Point Reves National Seashore, PHOTO BY KRISTIN GILLISS

#### **Park Overview**

#### A Coastal Treasure

Point Reyes National Seashore is comprised of more than 71,000 acres, including 33,000 acres of wilderness area. The national seashore also manages another 21,000 acres of adjacent Golden Gate National Recreation Area lands. Estuaries, windswept beaches, coastal grasslands, salt marshes, and coniferous forests create a haven of 80 miles of unspoiled and undeveloped coastline. Located just an hour's drive from an urban area populated by seven million people, the park receives more than two million visitors annually. Abundant recreational opportunities include 147 miles of hiking trails, four backcountry campgrounds, and numerous beaches.

Point Reyes National Seashore is an exception to the development that has covered thousands of miles of U.S. coastline. Congress established this park in 1962 "to save and preserve, for the purposes of public recreation, benefit, and inspiration, a portion of the diminishing seashore of the United States that remains undeveloped."

Geologically, Point Reyes National Seashore is a land in motion. The great San Andreas Fault separates the Point Reyes Peninsula from the rest of the North American continent. Granite bedrock found here matches the bedrock in the Southern Sierra Nevada range. This granite indicates the peninsula has moved more than 300 miles northwest over a period of 100 million years. The park is an important link in a chain of protected areas, sharing boundaries with the Gulf of the Farallones and Cordell Bank National Marine Sanctuaries, Tomales Bay State Park, Marin Municipal Water District Lands, and Golden Gate National Recreation Area. Combined, these special places constitute one of the few remaining biologically diverse Mediterranean climate regions on earth.

As wild habitat is developed elsewhere in California, the relevance of the Point Reyes Peninsula as a protected area with notably rich biological diversity is more important than ever. More than 45 percent of North American avian species and nearly 18 percent of California's plant species are found at Point Reyes because of the variety of habitats and unique geology. In all, more than 1,000 plant and animal species inhabit the park, including 27 species that are federally listed as endangered or threatened. Point Reyes is the only unit of the National Park Service that is home to tule elk.

Point Reyes National Seashore contains examples of the world's major ecosystem types. For this reason the park was recognized in 1988 by the United Nations Educational, Scientific, and Cultural Organization (UNESCO) Man and the Biosphere program and named as part of the Central California Coast Biosphere Reserve. Tomales Bay, within the national seashore boundary, has been designated a Wetland of International Importance. Known as the "Ramsar Convention," the Convention on Wetlands, signed in Ramsar, Iran, in 1971, is an intergovernmental treaty that provides the framework for national action and international cooperation for the conservation and wise use of wetlands and their resources.

The cultural history of Point Reyes National Seashore extends more than 2,000 years ago to the Coast Miwok Indians who were the first human inhabitants of the peninsula. More than 100 known village sites exist within the national seashore. According to many experts, Sir Francis Drake landed here in 1579, the first European to do so. In response to the many shipwrecks in the treacherous coastal waters, important lighthouse and lifesaving stations were established by the United States government in the late 1800s and early 1900s. In the early 1800s, Mexican land grantees established ranchos. These were followed by a wave of American agricultural operations which continue to this day in the national seashore's cultural heritage zone.

### POINT REYES NATIONAL SEASHORE SIGNIFICANT DATES

- 1000 B.C.E. Evidence of Coast Miwok Indians
- 1579 Francis Drake's California landing
- 1595 First known shipwreck on California's coast; San Agustin
- 1850s Alphabet ranches established
- **1870** Point Reyes Lighthouse built
- 1889 Point Reyes Lifesaving Station built on Great Beach
- 1927 Point Reyes Lifesaving Station built at Chimney Rock
- **1935** Report recognizes Point Reyes for unsurpassed national values
- 1962 Legislation signed by President Kennedy establishing Point Reyes National Seashore
- 1976 Congress authorizes national seashore to be a site for preservation of tule elk
- **1976** Congress creates Point Reyes Wilderness area of 33,000 acres
- **1978** Tule elk reintroduced to Tomales Point
- 1988 Point Reyes National Seashore designated as part of the Central California Coast Biosphere Reserve
- 1995 Vision Fire burns more than 13,000 acres
- 2001 Establishment of Pacific Coast Science and Learning Center
- 2002 National Park Service designates Point Reyes National Seashore a Center for Environmental Innovation
- 2012 Point Reyes National Seashore celebrates fiftieth year

Tracks in the sand dunes lead to a world of natural discoveries near the end of Abbotts Lagoon Trail. PHOTO BY DAN UNGER



### **Point Reyes National Seashore**



#### **Historical Context**

# Adjusted Base Budget and Fund Source Analysis

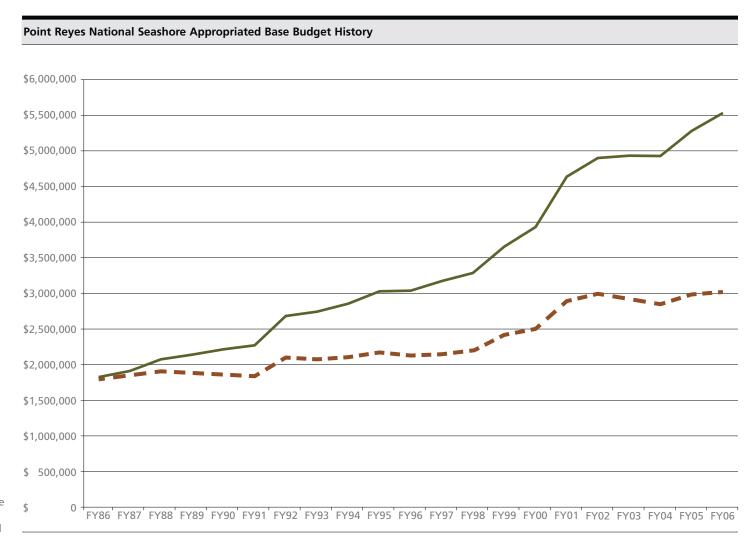
#### **Key Findings**

- Point Reyes National Seashore's funding from all sources has grown from \$5.8 million in Fiscal Year 1996 to \$14.7 million in Fiscal Year 2006.
- Over the last five fiscal years, Point Reyes National Seashore's appropriated base funding, the most stable source of funds allocated by Congress, has increased 15 percent in nominal dollars, but only 1 percent when adjusted for inflation.

#### **Appropriated Base Funding**

Fiscal Year 2006: \$5,528,326.66

Appropriated base funds are the most stable source of funding for national parks. Appropriated base funds are set by Congress each year to fund permanent staff and recurring operating expenses that the national seashore incurs on a day-to-day basis. The accompanying graph depicts the amount appropriated by Congress for Point Reyes National Seashore. Deductions for National Park Service initiatives and park-specific support assessed by the National Park Service as a whole and the Pacific



Appropriated BaseInflation Adjusted

West Regional Office may further reduce the base funds available for operations. In Fiscal Year 2006 appropriated base funds accounted for 38.7 percent of total funds.

#### **Historical Trends**

Over the last five fiscal years, the national seashore's appropriated base funding has grown 15 percent in nominal dollars, but only 1 percent when adjusted for inflation. As a benchmark, an April 2006 report issued by the United States Government Accountability Office reports that between Fiscal Year 2001 and Fiscal Year 2005, the National Park Service allocated an additional \$100 million to parks for daily operations. This amount represents an average annual increase of about 3 percent, but a decline of 0.3 percent per year when adjusted for inflation.

#### **Fixed Costs**

Fixed costs are required operational costs that remain constant for a fiscal year regardless of the number of visitors. These costs include salaries and benefits for permanent and other employees, selected supplies (such as personal protective equipment for staff or chlorine for water systems), required travel for mandatory trainings or park operations, utilities, and miscellaneous other costs such as those associated with office equipment lease agreements, law enforcement dispatch, or veterinary care for horses.

As the proportion of base appropriations allocated to fixed costs increases, the national seashore has less funding flexibility for other needs. For example, Point Reyes' base expenditures for utilities has increased 116.7 percent since Fiscal Year 1996 while total funding available for base expenditures, including non-recurring base increases, has increased at a slower rate of 76.2 percent over the past 10 years. Point Reyes National Seashore has continually lowered fixed costs when feasible. Travel costs, for instance, have been reduced through an increase in the use of satellite training for mandatory human resources sessions and a reduction in the national seashore's fleet of vehicles.

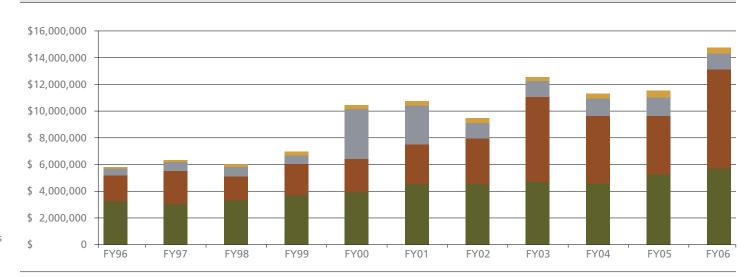
#### **Appropriated Non-Base Funding**

Fiscal Year 2006: \$7,354,798.29

Appropriated non-base funding is comprised of appropriations other than base funding provided for operation of the National Park Service. Parks often compete regionally or nationally for these non-operating funds for land acquisition, construction of new roads or trails, repair of recreation facilities, preservation of historic structures, or other projects.

Point Reyes National Seashore's appropriated non-base funding fluctuates significantly from year to year. In Fiscal Year 2006 these funds increased by 69.5 percent over the prior year to more than

#### Point Reyes National Seashore Historical Expenditures by Fund Source



Revenue Funds
Reimbursable Funds
Appropriated Non-base Funds
Appropriated Base Funds



A rare Franciscan thistle grows at a location overlooking Point Reyes Beach. Endemic to the San Francisco Bay region, this short-lived, perennial plant is found in some serpentine seeps, streamsides, slope wetlands, and coastal sites. PHOTO BY JANE RODGERS

\$7.3 million and accounted for 50 percent of total funds. Award of project money is not necessarily accompanied by a commensurate base increase for increased management and administration time spent on project management, contracting, personnel, and administration.

#### Reimbursable Fund Sources

Fiscal Year 2006: \$1,187,449.27

Point Reyes National Seashore cooperates with other federal agencies on select projects and programs, such as an exotic plant management project that spans multiple parks. Reimbursable funds include funds expended by the park during the year which are repaid by the project or program lead agency. Reimbursements to an appropriation also include amounts collected from outside sources for goods or services furnished by the national seashore with park resources. Point Reyes National Seashore reimbursable fund sources include special use permits for ranching operations, leasing of historic properties to partner agencies, and recovery of utility costs for services provided to concessioners, permittees or other users. In Fiscal Year 2006, reimbursable funds comprised 8.1 percent of total funding for the national seashore.

#### **Revenue Fund Sources**

Fiscal Year 2006: \$471,207.17

Point Reyes National Seashore's revenue has accounted for 2 percent to 5 percent of total expenditures since Fiscal Year 1996. Revenue includes donations, user fees implemented to offset the cost of providing services, and franchise fees from concessioners under contract to perform services at the national seashore, such as operating the horse concession or Drake's Beach Café. User fees and franchise fees are intended to compensate the park for the cost of providing services, managing contracts and maintaining the facilities in which concessions are housed. For example, the national seashore operates shuttle buses during whale watching and migration season and peak elephant seal season. It charges visitors \$5 per ride, and the fee is used to partially offset the cost of providing the shuttle bus service.

The national seashore also receives cash and non-monetary donations from the Point Reyes National Seashore Association (PRNSA). The association is the primary non-profit park partner working with the community to fund and implement preservation projects throughout the national seashore and to educate people about the environment.

#### **GOVERNMENT PERFORMANCE AND RESULTS ACT**

The Government Performance and Results Act (GPRA) was passed by Congress in 1993 to improve federal government management practices through increased accountability. The act requires agencies to adopt better performance management and to place greater emphasis on achieving results. By focusing on outcomes, GPRA provides parks with a tool to track the effectiveness of operational expenditures. The chart on the previous page displays Point Reyes National Seashore's historical expenditures by fund source. The majority of park funds go toward GPRA Goals I and II; GPRA Goals III and IV relate largely to Servicewide NPS goals.

#### Goal I - Preserve Park Resources

Approximately 40 percent of the park's expenditures are applied to GPRA Goal 1a—the maintenance, protection, and restoration of the park's cultural and natural resources. An additional 3 percent of the park's expenditures are applied to GPRA Goal 1b—the NPS contribution to knowledge about natural and cultural resources and their associated values. The majority of effort in this area goes toward the inventory and monitoring of park resources—both natural and cultural.

#### Goal II - Provide for Public Enjoyment and Visitor **Experience of Parks**

Approximately 47 percent of the park's expenditures go towards GPRA Goal IIa and 9 percent towards GPRA Goal IIb. This money ensures that visitors are able to safely enjoy the park's facilities, services, and recreational opportunities. Funds in this area also ensure that visitors understand and appreciate the unique resources and the significance of the park.

### **Visitation Analysis**

Beginning in 1980, Point Reyes National Seashore's visitation increased from 1.4 million annual visitors to about 2.6 million annual visitors in 1992. Visitation declined to 2.2 million in 1995 because of the Vision Fire, which burned over 12,000 acres of national seashore lands, equivalent to more than 9,000 football fields. Present visitation is about 2.23 million annually. Point Reyes National Seashore visitation trends are consistent with National Park Service trends in general.

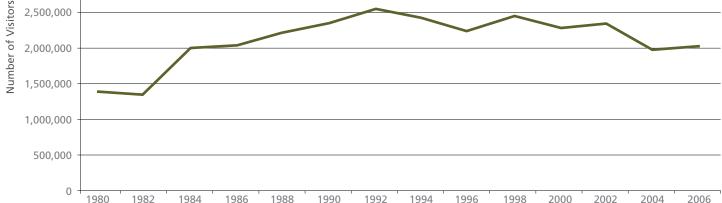
People visit the national seashore for a variety of reasons. The Point Reyes Lighthouse is a convenient spot for visitors to view whale migration and to experience other natural resources such as the national seashore's windswept beaches and elephant seals. Other people come to Point Reyes to experience the area's cultural resources such as Kule Loklo, a replicated village of the Coast Miwok people. Point Reyes National Seashore received an overall 100 percent visitor satisfaction rating for the past four years, and a 91 percent rating in 2006 for visitor knowledge of the national seashore's significance.

**Point Reyes National Seashore Annual Visitation** 

Four walk-in campgrounds and one hostel offer overnight lodging within Point Reyes National Seashore boundaries. There are also numerous lodging establishments and other businesses in the surrounding areas. Some of the business services related to the seashore include horse rentals and kayaking trips. The most recent economic impact report (*see following page*) shows the dollars Point Reyes National Seashore tourism generated in 2005.

According to a Sonoma State University survey, 70 percent of Point Reyes National Seashore visitors are from the San Francisco Bay Area. The remaining 30 percent are from out of the state or another country. Most visitors view the national seashore as a destination point, and spend between two to six hours on seashore lands, primarily during the summer months. This survey was conducted over an 18-month period during all four seasons to gather data and perform statistical analyses on visitation. Visitation is measured using seven pneumatic tube traffic counters located throughout the national seashore. Visits by kayak or other marine vessels are not included in visitation statistics.

# 3,000,000



Recreational Visits



#### **HEALTH AND RECREATION INITIATIVE**

Point Reyes National Seashore is partnering with Dominican University of California to address the role of national parks in promoting healthy recreational activities. This study is part of the National Park Service Health and Recreation Initiative, which seeks to identify how the NPS might increase public awareness of healthy recreational opportunities and to strengthen the National Park Service's commitment to outdoor recreational opportunities that are consistent with the agency's mission. The national seashore is an ideal location for hiking, bicycling, horseback riding, running, and other activities that promote a healthy lifestyle.

#### **ECONOMIC IMPACT OF VISITOR SPENDING IN 2005**

In 2005 Point Reyes National Seashore generated a total of \$71.8 million in direct, indirect, and induced economic impacts in Marin and Sonoma Counties and accounted for approximately 850 jobs.

Source: Bay Area Economics (See "Economic Impacts of Point Reyes National Seashore" section in this business plan.)

Sky Trail offers visitors the opportunity to enjoy broad vistas at the 1,000-foot elevation before terminating at remote Kelham Beach. PHOTO BY KRISTIN GILLISS

### **Volunteer Analysis**

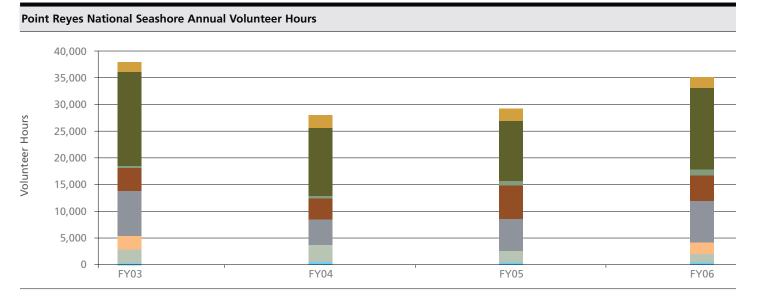
Volunteerism in the National Park Service is designed to be a mutually beneficial relationship. Volunteers allow full-time staff to concentrate on areas where staff expertise and experience can add the greatest value. In turn, volunteers receive experience in a field of interest and management feedback from national seashore staff. Interpretive volunteers staff the visitor center and conduct specific programs based on their interest and abilities. Natural resource volunteers help with projects such as invasive weed removal and installation of range fencing to protect riparian habitat. Cultural resource volunteers can assist with the stewardship of archeological sites. General management volunteers help with tasks such as filing and data management.

Volunteers are a critical component of Point Reyes National Seashore operations. The average hourly valuation rate for volunteers in Fiscal Year 2006 was \$18.04 according to NPS standards, which yielded a benefit of \$631,905 to Point Reves National Seashore. The national seashore's ratio of volunteers to park staff is 0.17, which is on par with the National Park Service average of 0.16. Total volunteer hours increased in Fiscal Year 2006 from the previous year, continuing a steady yearly increase since Fiscal Year 2004. However, Fiscal Year 2006 aggregate volunteer hours are still below Fiscal Year 2003 levels. Volunteer time declined by almost 9,800 hours, or 26 percent, from Fiscal Year 2003 to Fiscal Year 2004.

In Fiscal Year 2006, through the assistance of volunteers, Point Reyes National Seashore was able to produce numerous interpretive documents informing the public about topics such as whale migration and fire ecology and was able to monitor habitat and population health for species such as harbor and elephant seals. Training for supervisors on volunteer management will help improve the quality of Point Reves National Seashore volunteer programs and ensure that the current increase from Fiscal Year 2005 in total volunteer hours is maintained.

The national seashore facilitates volunteerism by several methods. Interested citizens can volunteer through the National Park Service Volunteers in Parks (VIP) program, which allows individuals to assist parks within the NPS. Each division within Point Reves National Seashore has offered VIP opportunities, underscoring the seashore's support for the VIP program. Volunteers are also identified by partner organizations, including groups such as the Student Conservation Association and Youth Conservation Corps, which help maintain trails, restore habitat, and administer operations. In addition to volunteering directly with Point Reyes, individuals can help through the park's cooperating organization, Point Reves National Seashore Association. The seashore would like to make a larger volunteer recruiting effort for under-represented members of the San Francisco Bay Area; however, current funding and staff levels do not yet allow for this type of outreach.





### **Current Operations**



While visitors are most likely to interact with staff at one of the seashore's visitor centers, there are many other employees at Point Reyes National Seashore who perform tasks critical to the park accomplishing its mission. A goal of the business plan is to evaluate the strategic allocation of resources in a manner that is comparable across parks nationwide. A universal list of six functional areas excluding investments and non-operations activities enables cross-park unit comparison. These functional areas are based on the grouping of various programs that are the responsibility of a park to perform, such as volunteer programs, contracting, and cultural resource management.

Functional areas do not necessarily match the organizational structure of the park, thus, the business plan process has enabled park management to fully capture the costs associated with program areas that span divisions. For example, volunteer programs are critical to the seashore's operations and are operated independently in multiple divisions. The business plan captures all labor and other expenditures related to management of volunteer programs-including development and announcement of volunteer opportunities, recognition programs, relationship management with partner organizations, and annual reporting—as expenses associated with Park Administration,

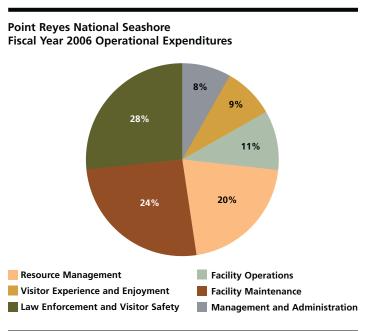


A volunteer sets up a viewing scope at the Tomales Point Elk Reserve. PHOTO BY KRISTIN GILLISS

Opposite: Sierra Club members work on a Point Reyes coastal dune restoration project. NPS PHOTO although staff performing these duties may work on the Trail Crew overseeing the Adopt-A-Trail program or in Interpretation managing the Snowy Plover Docent program.

Expenditures associated with the following functional areas exclude labor and other expenses connected to one-time projects or investments and external support services. Expenditures associated with projects such as the Giacomini Wetlands Restoration Project are significant one-time costs which parks incur in order to solve current problems or provide for future park development. Expenditures associated with support services provided to other parks and agencies are also excluded from this analysis. These are programs for which the national seashore receives network funding, such as the inventory and monitoring program for the San Francisco Bay Area Network.

In Fiscal Year 2006 Point Reyes National Seashore operated with 115 full-time equivalent (FTE) employees, including seasonal employees. An FTE is equal to 2,080 hours of work per year. The national seashore was also supported by network-funded positions, grant-funded individuals, and volunteers. The following pages detail the operating functions of the national seashore.



Management and Administration: Fiscal Year 2006 - \$782,739 Administration is responsible for facilitating park operations through functions such as finance, human resources, contracting, concessions and fee management, and information technology. Additionally, business management handles parkwide planning

and safety, volunteer programs, partnerships, and external affairs.

#### Facility Operations: Fiscal Year 2006 - \$1,116,430 Facility Maintenance: Fiscal Year 2006 - \$2,337,397

Point Reyes National Seashore operates and maintains 700 assets and asset features. Assets include buildings, historic structures, roads and trails, potable water systems, and wastewater systems. The park strives to be a leader in sustainable development and design. Facilities Operations includes tasks that are necessary for the immediate use of a resource. Facilities Maintenance includes activities required to prolong the life of an asset for continued use in the future.

#### Law Enforcement and Visitor Safety: Fiscal Year 2006 -\$1,056,082

### Wildland Fire Management: Fiscal Year 2006 - \$1,660,251

Law Enforcement includes front- and backcountry patrol, marine operations, and marijuana control. Law Enforcement rangers monitor buildings, campgrounds, trails, and parts of the Tomales Bay and Pacific Ocean shore. This function also includes Wildland Fire Management, which is responsible for emergency fire response and fire planning.

#### Resource Management: Fiscal Year 2006 - \$1,948,202

Point Reyes National Seashore preserves and protects both natural and cultural resources. Managing these resources includes activities such as monitoring special status species, restoring natural hydrologic and ecological processes, and archiving archeological discoveries. Point Reyes National Seashore also operates one of 17 Research Learning Centers and has a robust science program.

#### Visitor Experience and Enjoyment: Fiscal Year 2006 - \$827,759

This function is responsible for interacting with the public through interpretation, environmental education, and visitor center operations. As the most visible part of national seashore operations, this function is responsible for providing for visitor enjoyment and for helping people to make connections to the resources of Point Reyes National Seashore.

## Management and Administration

Management and Administration (M&A) at Point Reyes National Seashore is responsible for general management and administrative duties relating to all aspects of national seashore operations, planning, external relations, and resource stewardship.

#### Finance, Human Resources, and Contracting

Finance prepares the budget for Point Reyes National Seashore. This function also tracks reimbursable accounts, cross charges, and project money to ensure spending is in accordance with guidelines. In the future, Finance plans to hire a budget technician to help with budgeting at the national seashore. Human Resources is responsible for all activities related to recruitment, training, position classification, maintenance of official personnel records, and overall administration of employee benefit programs. Human Resources attempts to attend job fairs at universities to increase staff diversity. However, these activities are limited because of staff size and budget. Contracting is responsible for procurement activities and administration of the government charge card program.

#### Fee Collection and Concessions

Point Reyes National Seashore administers fees for campgrounds and shuttle bus operations, and issues special use permits for filming, events, ranching, residence, and right-of-way use. Point Reyes National Seashore issued 165 special use permits in Fiscal Year 2006. The national seashore currently has four walk-in campgrounds and allows camping on beaches at Tomales Bay. During winter, the national seashore offers a shuttle bus as a means of visitor transportation to view elephant seals and whales. This bus also alleviates traffic congestion and reduces overall carbon emissions.

Point Reyes National Seashore allows ranching and residence within park boundaries as a means of preserving the agricultural heritage of Marin County. Cost recovery amounts collected from ranching operations are used for purposes such as environmental impact monitoring of ranch operations, cattle fencing to protect riparian habitat, and historic ranch building improvements.

There are currently four concessions operating within the national seashore: Stewart Horse Camp, Drake's Beach Café, Hostelling International, and Five Brooks Stables. Additionally, the park's cooperating association, the Point Reyes National Seashore Association, sells convenience items in the bookstore.

Partnerships

The Point Reyes National Seashore Association (PRNSA) has been a long-standing partner of the national seashore since 1964. PRNSA partners with the national seashore to deliver educational content to visitors and school groups and to sponsor major projects. Past projects include building the Bear Valley Visitor Center, constructing the Clem Miller Environmental Education Center for school groups to use while at the park, running the summer camp program at Clem Miller, providing more than 40,000 children and adults with overnight educational experiences, and teaching more than 30,000 people about the natural history of Point Reyes through the award-winning Field Seminar programs.

In partnership with the park and the National Park Foundation, PRNSA has raised more than \$5.7 million in non-NPS funds for implementing the Giacomini Wetlands Restoration Project since 2004. In addition to financing the project, PRNSA is acting as the principal agent for all contractors working on this massive undertaking. By assuming this role, PRNSA is taking on new leadership responsibilities for national seashore projects.

#### **Volunteer Programs**

Point Reyes National Seashore relies on volunteers to provide additional support for all divisions. Volunteers are recruited from the local community, universities, and the internet. As mentioned in the Volunteer Analysis part of this business plan, individuals can assist the park through the National Park Service Volunteers in Parks (VIP) program. Additional funding and staff training would allow the national seashore to enhance this program and to recruit more volunteers.



The Point Reyes National Seashore Annual Volunteer Appreciation Dinner allows the park an opportunity to celebrate the accomplishments of many dedicated individuals. PHOTO BY KRISTIN GILLISS

#### MANAGEMENT AND ADMINISTRATION **OPERATIONAL PRIORITIES**

#### **Ensure that Point Reyes National Seashore is well** managed and funded.

Point Reves National Seashore currently administers operations and manages resources through eight divisions. Each division is staffed with highly trained and certified personnel. Retention and funding of these professionals is a top priority for the national seashore.

#### Reassess fees for current market conditions.

Point Reves National Seashore is working to reassess fees charged to ranches and residents of the national seashore. By doing this, the park hopes to determine appropriate market rates for rent, services, and support provided by Point Reyes National Seashore.

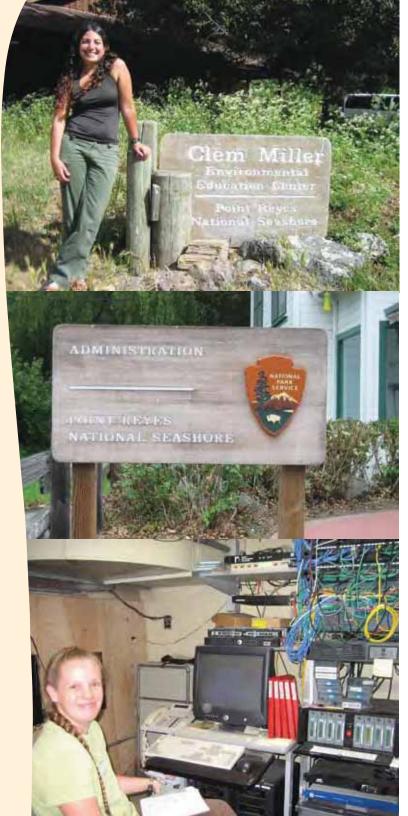
#### Bring administration staffing and systems up to modern standards.

Point Reyes National Seashore hopes to bring administrative support up to standard in terms of staffing and systems.

#### SO CLOSE, YET SO FAR AWAY

Although located near the Silicon Valley, the San Francisco Bay Area National Park network is in serious need of information technology (IT) resources. Point Reyes National Seashore, Golden Gate National Recreation Area, San Francisco Maritime National Historical Park, John Muir National Historic Site, Eugene O'Neill National Historic Site, Rosie the Riveter National Historical Park, and Pinnacles National Monument all share four information technology professionals. Point Reyes National Seashore alone has 143 users, 147 computers, six servers, and three separate telephone systems, which are maintained by one shared IT professional. Simple information technology requests can take months to resolve.

Top: Fiona O'Kelly of Point Reyes National Seashore Association helps operate the Clem Miller Environmental Education Center, РНОТО ВУ DAVID MIYAKO Center: Point Reves National Seashore Administration Sign, PHOTO BY DAVID MIYAKO Bottom: Information Technology Specialist Aimee Davis—one of four people, seven parks, PHOTO BY DAVID MIYAKO Far right: Point Reyes National Seashore Association logo



"I love that we can support the park in their goals while at the same time exposing children to environmental education, stewardship, and care for Point Reves."

> —FIONA O'KELLY POINT REYES NATIONAL SEASHORE ASSOCIATION



### **Facility Operations** and Maintenance

From smoothing the surface of the road to Limantour Beach to mitigating erosion on Coast Trail, the operations and maintenance activities of Point Reyes National Seashore ensure the built environment is managed to optimize operational efficiencies while providing stakeholder access and reducing degradation of the seashore's assets. Achieving this goal entails routine custodial services, monitoring, preventative maintenance, and repair. For example, as a park ranger leads a program at the Point Reves Lighthouse, the operations and maintenance staff's work ensures that the restrooms are clean, the water in the drinking fountain meets public health requirements, the building is welllit, and the roof is maintained despite wind speeds as high as 130 miles per hour. The Facility Operations and Maintenance administrative team manages more than 700 park assets and asset features, including buildings, residences, roads, trails, and water and wastewater systems through the National Park Service Facility Management Software System (FMMS). In addition to planning, budgeting, operating, and evaluating needs of assets, the administrative team coordinates data management with branch managers to track and record workload and project planning, work site supervision, and routine safety inspections. Staff also compiles utility costs and sets water and sanitation rates for non-National Park Service customers.

In all of these activities, Facility Operations and Maintenance management and staff act as resource stewards. The national seashore employs sustainable practices and works to conserve energy and water whenever possible. In addition, Point Reyes National Seashore was selected by the National Park Service as a Center for Environmental Innovation in 2002 (see profile "A Showcase of Sustainable Practices"). The national seashore is committed to not only educating the public on sustainable practices, but also to utilizing such practices and becoming a leader in the area of environmental innovation. Sustainable design and engineering are primary considerations in all park planning efforts to ensure resources are preserved for future generations. From using "green" cleaning products to installing solar energy systems, environmental stewardship also guides daily operations and maintenance decisions.

#### **Buildings, Grounds, and Utilities Maintenance**

The Buildings, Grounds, and Utilities team assures that statutory, regulatory, and procedural controls are met regarding the maintenance of all the buildings, grounds, and utilities within

#### **FACILITIES OPERATIONS AND MAINTENANCE OPERATIONAL PRIORITIES**

#### Upgrade water system infrastructure.

The provision of safe drinking water for visitors, staff, and residents is an important responsibility of the seashore. An initial capital outlay to install regional water systems designed for low operations and maintenance would enable the seashore to save on labor costs associated with daily monitoring of water quality in the future.

#### Conserve energy and reduce consumption.

As a Center for Environmental Innovation, Point Reyes National Seashore is committed to identifying creative approaches to environmental stewardship, such as implementing new solar energy systems, seeking alternative fuel vehicles, and utilizing recycled building materials and green cleaning supplies.

#### Reduce total number of assets and implement preventive maintenance plan for remaining assets.

Management is evaluating the condition of all seashore facilities and the priority assigned to each asset. The park asset management plan developed will be used to ensure future resource allocations target maintaining high-priority assets in good condition. Management will evaluate demolishing low-priority assets in poor condition.

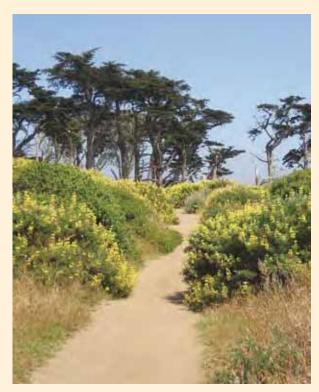
#### Identify operational efficiencies and opportunities for knowledge sharing between branches.

Staff will invest time and resources to share technical knowledge internally to build long-term capacity.

#### **DEFERRED MAINTENANCE BACKLOG** (OPERATIONS VERSUS MAINTENANCE)

The National Park Service distinguishes between operations and maintenance to better quantify the deferred maintenance backlog of a given park unit. To meet operational needs, many parks have deferred maintenance of structures over time. This deferral has led to rapidly deteriorating assets within the National Park Service, which need to be addressed before they become unsalvageable.

Facilities Operations includes activities such as removing hazardous trees, stocking restroom supplies, and changing light bulbs. These types of tasks are necessary for the immediate use of a resource. Facilities Maintenance includes activities such as repairing roofs, fixing wastewater systems, and replacing broken windows. These kinds of duties are required to prolong the life of an asset for continued use in the future.



Tomales Point Trail, PHOTO BY KRISTIN GILLISS

Point Reves National Seashore, including normal repairs of buildings, painting, plumbing, and roof maintenance. This oversight includes 39 housing units, 64 wastewater systems, five public water systems, 29 private water systems, 16 actively used administrative buildings, four backcountry campgrounds, two bayside campgrounds, three major visitor complexes, one research center, and two environmental education centers. The Buildings, Grounds, and Utilities staff responds to 95 percent of all work orders submitted at the national seashore, and staff is responsible for planning and completing the repair of systems and structures. Emergency repair needs, such as those caused by floods or fire, limit staff's ability to allocate time to preventative maintenance and inspections.

#### **Buildings, Grounds, and Utilities Operations**

From changing light bulbs in the Bear Valley Visitor Center to collecting litter or monitoring water from backcountry campgrounds, the day-to-day activities that comprise Buildings, Grounds, and Utilities operations impact the national seashore's resources and public health. In addition to routine cleaning and custodial work at buildings and campgrounds, staff inspects and adjusts utility components daily to maintain full-service to seashore facilities. For example, public water systems require daily monitoring to ensure water quality, yet some systems, such as that at Glen Camp, are only reached after a two-hour journey on a winding, unpaved road. The logistics of monitoring these systems has limited staff time available for preventative maintenance.

#### **Trails Maintenance**

The Trails Branch maintains and repairs more than 113 miles of former ranch and logging roads that comprise Point Reyes National Seashore's trail system. A visitor survey conducted by the national seashore revealed that a majority of park visitors include a hike along the seashore's trail system during their visit. Maintaining these popular trails to ensure visitor access and safety entails cleaning more than 1,500 drainage devices each year, routine maintenance of almost 350 trail signs, and removal of vegetation such as poison oak and stinging nettles along trail sides. The national seashore relies substantially on partnership and volunteer programs to perform trail maintenance. The seashore's partnership with Youth Conservation Corps is in its twentythird year, and the annual crew of 10-15 enrollees accounts for maintenance of 50 miles of trails. In addition, in 2006, the Adopt-A-Trail program boasted more than 370 volunteers, ranging



Facilities Management team members install a new sign for the Resource Management Division. With only one staff person, the sign shop at Point Reyes creates approximately 70 new signs each year for projects, public health and safety, and visitor information. In addition to maintaining and repairing existing signs, the sign shop completed more than 100 work orders in FY 2006, including upgrading stop signs with reflective material, detailing law enforcement ranger vehicles and boats, painting roadside curbs, designing safety decals, and installing wayside road signs and interpretive exhibits. PHOTO BY KRISTIN GILLISS



A historic preservation crew member performs delicate work to restore a window on the historic Lifesaving Station, a national historic landmark. PHOTO BY KRISTIN GILLISS

Opposite: National Park Service carpenters proudly pose next to a carriage house dating to the 1920s at Home Ranch. The historic preservation crew removed rotten wood and installed a historically accurate timber sill foundation. PHOTO BY KRISTIN GILLISS

from local school groups to returned Peace Corps volunteers, who maintained approximately 10 miles of trails. Management of these programs requires significant staff time. While staff members perform some maintenance, such as mowing, on all trails each year, they typically are able to perform more intensive cyclic maintenance, including drainage and tread repair, on only 50 miles, or one-third of trails, annually. The Trails Branch gives highest priority to maintenance of Point Reyes National Seashore's most popular trails, such as the Coast Trail.

The ranching and logging legacy of Point Reyes poses unique challenges for the Trails Branch staff, Rather than narrow handbuilt trails, the trails at the seashore are 30- to 45-foot-wide former road beds constructed with heavy equipment. Almost 96 trail miles, or 85 percent of the national seashore's trails, are located in congressionally designated wilderness areas where the use of mechanical devices is prohibited. Maintenance of these wide trails is time-consuming and difficult. Often, though, maintenance is critical as these former roads were designed and constructed based on utilitarian, not environmental, considerations. Where trails lead directly uphill rather than following the topography of the land, erosion and resultant pollutant and sediment runoff to local water sources can be mitigated by maintenance. However, without labor- and supply-intensive rerouting or redesign projects, these former roads will continue to be high-maintenance and high-environmental impact assets. Management remains committed to leveraging all new trail construction project money, such as the rerouting of Estero Trail in conjunction with the Coastal Watershed Restoration Project, to ensure the construction of low-maintenance, resource-friendly trails.

#### **Roads Maintenance**

The Roads Branch maintains and repairs almost 37 miles of paved roads, 60 miles of unpaved roads, 21 paved parking lots, 37 unpaved parking lots, and all associated fencing and vehicle barriers. Similar to trail maintenance, keeping these former ranching roads in good condition requires a sophisticated understanding of drainage devices and erosion control. In Fiscal Year 2006 a crew of six employees maintained these assets by cleaning ditches and culverts, grading roads, doing asphalt overlays, patching potholes, filling cracks, and striping. An additional staff person was dedicated to sign repair and replacement for the more than 660 signs at Point Reyes National Seashore.

#### HISTORIC STRUCTURES MAINTENANCE

A historic preservation crew works on restoring, repairing and stabilizing the almost 300 historic structures maintained by the national seashore, including historic ranch buildings, the 130-year-old Point Reyes Lighthouse, and Point Reves Lifeboat Station, which is a national historic landmark. The historic preservation crew's projects fuse maintenance and craftsmanship, and these projects are more expensive in terms of both labor and material expenditures. For example, restoring one window in the Lifeboat Station based on the guidance in the "Secretary of the Interior's Standards for the Treatment of Historic Properties" may require up to 40 hours of labor between scraping, sanding, patching a frame to preserve the original wood, repainting, and reinstallation. To stabilize the floor of the barn at Teixeira Ranch in Olema Valley in 2006, this team of talented cultural resource stewards hand-hewed timbers with historic hand tools—a broad axe, felling axe, adze, and slick—to match the original timbers being replaced. Increased material costs reflect the additional expense incurred by requirements unique to historic structure maintenance, such as the need to have lumber milled to be 2 x 4 inches instead of the modern 1.5 x 3.5 inches.

The Point Reyes National Seashore team is one of only three historic preservation crews in the Pacific West Region of the National Park Service. Team members frequently travel at the invitation of other parks to contribute to preservation projects, but there continues to be increased demand for their services at the national seashore. In 1995 the number of structures at the seashore listed by the National Register of Historic Structures was 190; today, the number has increased to 279. As these assets age, increased cultural cyclic maintenance funding will be needed. In Fiscal Year 2006 the budget was \$282,259. In addition, management expects increased need for repair and rehabilitation projects.

#### Priority: Maintain 127 of 297 historic structures listed in "good" condition and increase to 137.

The agricultural history at Point Reyes includes a large number of historic ranch buildings. Additional funding for preventive maintenance would enable the historic preservation crew to maintain those structures already listed in "good" condition. Project funding is required to improve the status of additional structures.





A member of the park roads crew maintains a trailhead sign area. PHOTOS BY KRISTIN GILLISS

Drivers, cyclists, and hikers depend on Roads Branch staff for safe, timely access to resources, facilities, and residences. Drivers on the national seashore's roads include visitors, staff, concessioners, and residents. Lack of maintenance not only makes roads more dangerous, it also makes transportation more time-consuming. Well-maintained roads increase the efficiency of staff members who are required to utilize them for daily operations, such as monitoring water quality at Wildcat Campground. The campground is accessible only by a dirt road which is also frequently used by visitors exploring the seashore on horseback. This road is difficult to maintain, particularly during the rainy season, but the Roads Branch staff members work to ensure that it and other roads are safe and accessible. One of the greatest challenges to completing maintenance faced by the Roads Branch is frequent requests from other branches for equipment and staff support for other services. For example, the Roads Branch is comprised of skilled workers familiar with operating the heavy equipment often required by other park programs. Staff frequently hauls rock and materials for natural resource management projects or operates a backhoe in support of repairing a broken water line for the utilities team.

#### **Trails and Roads Operations**

Trails and Roads Operations also include hazardous and downed tree removal. Downed trees often block trail or roadside ditches and prevent water from flowing though culverts installed beneath trails or roads. The result of overflowing ditches can be erosion of the trail or road surface. The Roads Branch presently depends on equipment loans from the U.S. Coast Guard to perform some of these activities.

In addition, Point Reves National Seashore has 140 mowable road shoulders that are routinely moved to improve fire protection and increase sight distance along winding, cliffside roads. Clearing vegetation from roadsides requires both mowing with heavy equipment and hand operation of weed trimmers for areas that are more difficult to access. The Roads Branch endeavors to mow and clear vegetation from roadsides at least four times each year. In recent years, the Roads Branch has partnered with the natural resources management team to adjust its mowing schedule to respect the breeding and nesting seasons of native species.



#### ON THE PATH TO ENVIRONMENTAL WORK

#### Sarah Shimizu, Trail Crew

"I love being outside—to work out here and be in the field five days a week—I couldn't ask for anything more. When I was at Point Reyes Summer Camp, I wished that I could be out here all of the time. I got my wish."

After eight years at PRNSA's environmental education summer camp, Sarah joined the Youth Conservation Corps (YCC) in 2001 when she was 17. She returned the following year as a YCC youth leader. Since then, she worked at the seashore five consecutive years as a seasonal trail crew member, and is now a crew leader for the YCC. "We work really hard," she said. "It teaches kids to have a really good work ethic." When asked what keeps bringing her back, Sarah replied, "The seashore it's beauty, and the people. I have great co-workers."

Sarah is entering her senior year at Humboldt State University where she is studying botany, anthropology, and appropriate technology in the environmental resource engineering department. Her senior project focuses on the native garden at Kule Loklo, the seashore's replica Coast Miwok village. "I'm going to be doing something like this the rest of my life, work that engages my body and my mind; YCC and the trail crew are what started me on that path. I'm really grateful."

#### MAKING A DIFFERENCE NOW AND FOR THE FUTURE

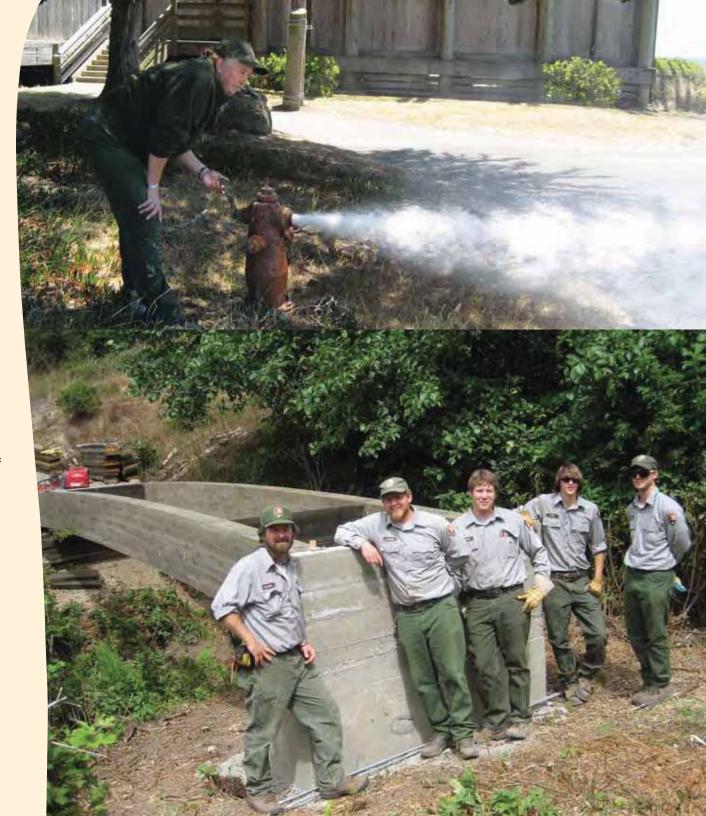
Karen McKey, Utility System Operator and Repairer "I get to help care for and protect this beautiful, incredible place and assure the impact that we leave on it is healthy. As long as we're providing safe drinking water and good facilities that operate and function to the best ability, then we're making sure we're taking care of the park for both visitors today and future generations."

#### **ENHANCING NATURAL PASSAGES**

The Point Reyes trail crew constructs a new bridge as part of the Coastal Watershed Restoration Project.

At this site, the project involves removal of an existing road crossing within an official wilderness area and the reroute of the Estero Trail. The bridge will allow for natural hydrological process and fish passage. It will ultimately allow for the reintroduction and enhancement of endangered fish populations, including federally threatened steelhead trout and federally endangered coho salmon.

PHOTO BY KRISTIN GILLISS



# Law Enforcement and Visitor Safety

#### **Law Enforcement**

Law Enforcement and Visitor Safety (LE) is responsible for investigating crimes against the United States and for monitoring activities and enforcing regulations on the national seashore's 71,000 acres of land, surrounding water areas, and 21,000 acres of other National Park Service lands in the San Francisco Bay Area. Law Enforcement accomplishes this with six patrol rangers and two LE supervisors (eight rangers in total). Point Reyes National Seashore coordinates with other law enforcement agencies such as the U.S. Coast Guard and the Marin County Sheriff's Department. Ensuring visitor safety and protecting resources requires a variety of activities including front- and backcountry patrol, marijuana cultivation control, search and rescue, and marine operations along the coast of the Pacific Ocean and in Tomales Bay.

Frontcountry patrol focuses on more accessible areas within the national seashore including parking lots, beaches, and areas prone to illegal camping, vandalism, and resource violations. Back-country patrol focuses on areas that are less accessible, including trails and walk-in campgrounds. Eight rangers patrol these areas and conduct all other law enforcement activities. Present staffing levels allow for adequate frontcountry patrol for minor resource violations such as off-leash dogs, off-trail bicycling, and driving infractions. Major incidents such as drowning, assaults, domestic violence, and vehicle accidents can consume all available staff time. The national seashore would like to increase its back-country patrol efforts to educate campers about safety, expand resource-based protection, and to monitor trail use.

In addition to ensuring visitor safety, LE is responsible for protecting the seashore's abundant natural and cultural resources. Activities include the deterrence of poaching, as well as the enforcement of camping and marine equipment regulations. Abalone and elk antler poaching are areas of concern. Rangers frequently encounter individuals that collect more abalone than permitted and divers that do not follow regulations. Antler poaching has decreased since the 1990s because of intensive monitoring in recent years. Given additional staff, LE would like to increase efforts to monitor poaching activities and to educate visitors about the effects of poaching on the natural environment.

Deterring marijuana cultivation is the largest area of concern. Point Reyes National Seashore is one of the top four illegal marijuana growing sites of the national parks within California.

### LAW ENFORCEMENT AND VISITOR SAFETY OPERATIONAL PRIORITIES

### Protect Point Reyes National Seashore visitors and resources in a safe manner.

Law Enforcement and Visitor Safety (LE) is responsible for protecting visitors and resources through patrol activities. LE would like to respond to a greater percentage of visitor safety and resource protection issues in a way that ensures ranger safety. Law Enforcement and Visitor Safety would also like to increase efforts to deter marijuana cultivation within the national seashore.

#### Increase marine operations.

Law Enforcement and Visitor Safety would like to decrease the number of incidents and fatalities in Tomales Bay. Many accidents and fatalities occur along the opening of the Bay. Abalone poaching is also of concern. Increased marine operations would allow LE rangers to enforce boating safety regulations and to monitor poaching more closely.



A Point Reyes National Seashore Law Enforcement and Visitor Safety ranger inspects a beached vessel. PHOTO BY DAVID MIYAKO

#### LAW ENFORCEMENT AND VISITOR SAFETY **OPERATIONAL PRIORITIES (continued)**

Implement the strategies of the fire management plan. Wildland Fire will continue to implement the objectives of the fire management plan (FMP) by strategically reducing acres of highly flammable vegetation that threaten key resources, public safety, and nearby communities. The division is charged with clearing areas of defensible space around structures and creating zones of reduced vegetation that would slow the progress of wildfires and increase the effectiveness of firefighters as they work to suppress wildfires. The division would like to enhance efforts to use prescribed burning and mechanized vegetation management to continue to create areas with less flammable vegetation where strategically needed and maintain areas that were previously treated. The objective of these efforts is to reduce the potential reoccurrence of a catastrophic fire such as the 1995 "Vision Fire," which destroyed 44 homes in a subdivision adjacent to the national seashore. The division will be mindful of the need to reduce impacts to air quality and global warming by following the emissions reduction measures for prescribed burns adopted in the FMP.

#### Continue to support the fire management programs within the San Francisco Bay Area Parks Network.

Wildland Fire Management provides planning, emergency response, and training for other national parks in the San Francisco Bay Area and works cooperatively with other Seashore divisions to achieve shared goals. Wildland Fire also builds working relationships with local agencies and organizations to reduce fire hazards, improve fire prevention, and enhance natural and cultural resources both in the Bay Area Network parks and in the wildland urban interface. The division would like to enhance efforts to develop fire hazard reduction projects, provide regulatory compliance support, and provide expertise in the preparation of education, interpretation, research, and monitoring strategies for the Bay Area Network of national parks.

Law Enforcement works to monitor activities related to marijuana cultivation and to catch drug trafficking organization leaders operating within the national seashore. Law Enforcement also works to eradicate marijuana fields upon discovery, which can consume multiple days and require extensive labor. In 2006 Point Reyes National Seashore confiscated and destroyed 45,000 marijuana plants, worth about \$110 million. Law Enforcement would like to continue deterring marijuana cultivation in a manner that is safe for the seashore's rangers. Any effort to discover and eradicate marijuana gardens requires all eight patrol rangers, staff from Golden Gate National Recreation Area, and nearby law enforcement agencies for safety purposes.

Search and rescue encompasses all activities related to assisting lost or injured visitors. All law enforcement personnel are certified first responders for injuries. Most incidents occur in backcountry areas, which require rangers to hike long distances. Incidents include occurrences such as visitors falling off horses, lost and injured hikers, missing bicyclists, and boat accidents.

Law Enforcement rangers patrol around Tomales Bay and the coast of the Pacific Ocean on an infrequent basis. Rangers need to be certified in water operations, and boat maintenance is laborintensive because of the saltwater environment of the seashore. Incidents such as boating safety violations occur frequently in Tomales Bay. Marine patrol would be used primarily for poaching abatement and search and rescue if staff time was made available. Law Enforcement also works with the U.S. Coast Guard when necessary and when legal jurisdiction permits. Point Reyes National Seashore would like to increase marine operations to reduce the number of visitor safety incidents on the water, to reduce poaching, and to build relations with the U.S. Coast Guard.

Law Enforcement maintains and monitors dispatch and security alarm systems. Members of the LE staff also issue keys and alarm codes to individuals. The national seashore presently has two separate transponder stations that are not linked with each other. Additionally, Law Enforcement is required to carry a separate radio system to communicate with the Marin County Sheriff's Department. Point Reyes National Seashore radios need repair or replacement more frequently than other national park units because of the corrosive saltwater environment.



Point Reyes National Seashore LE rangers conduct a search and rescue operation. PHOTO BY DAVID MIYAKO

"There's no more slow season at Point Reyes National Seashore. Every season has its own unique problems. We've found that anything that can happen in San Francisco can happen here. And pretty much has."

> -BRUCE DOMBROWSKI POINT REYES LE RANGER

#### Wildland Fire Management

Wildland Fire Management provides emergency suppression response to all national seashore wildfires, plans and implements fire prevention and education programs, and works closely with local agencies to ensure coordination of efforts in all facets of wildland fire management. Additionally, the division provides emergency fire suppression response for other units of the San Francisco Bay Area Network including Golden Gate National Recreation Area, Muir Woods National Monument, Pinnacles National Monument, John Muir National Historic Site, and Eugene O'Neill National Historic Site. Wildland Fire also provides training to the Presidio of San Francisco Fire Department. Wildland Fire is not responsible for structural fire response.

Wildfires threaten the safety of visitors, staff, and adjacent communities, and could destroy important natural and cultural resources. Wildland Fire implements the fire management plans (FMPs) adopted for the seashore and for each of the Bay Area Network parks. The FMPs detail hazard reduction projects, which reduce the risk of catastrophic wildfires occurring in the national parks. Examples of hazard reduction projects include creating and maintaining areas of defensible space around national seashore structures, constructing shaded fuel breaks in strategic areas that would aid firefighters in suppressing wildfires, and conducting prescribed burns to reduce highly flammable vegetation along heavily traveled highways. During the Vision Fire of 1995, 44 homes were destroyed and 12,000 acres were burned. Wildland Fire would like to ensure that such a fire does not occur again.

Fire crews, planners, and ecologists work closely with the Natural and Cultural Resource divisions on many FMP projects. Certain invasive plants are widespread throughout the national seashore and grow very densely. These plants could outcompete native plants for space and nutrients and create areas of high fire hazard.

Wildland Fire develops plans to reduce ignition materials through prescribed burns and other means. The division ensures that its actions comply with all federal environmental regulations, develops post-burn reports, studies the effects of fire, seeks to educate the public about the effects of fire, and consistently strives to improve the safety of visitors, residents, and staff by reducing the risk of wildfires. Wildland Fire monitors fire behavior and the long-term outcomes of prescribed burns and other hazard reduction projects that do not involve burning. Fire ecologists and

fire planners use this data to determine if past projects perform as expected. The division continually researches new strategies for improving methods employed in prescribed burns and other treatments.

The division is charged with implementing the Federal Wildland Fire Policy. The national seashore works closely with neighboring Fire Safe Councils and fire departments in developing community wildfire protection plans that promote the safety and protection of areas in the federal wildland urban interface. The division consults with local entities throughout the state that have received grants from the National Park Service and need assistance in developing effective project plans and completing regulatory requirements.



Firefighters work in an amber atmosphere of heat and smoke. NPS PHOTO

#### **MARIJUANA ERADICATION AT POINT REYES**

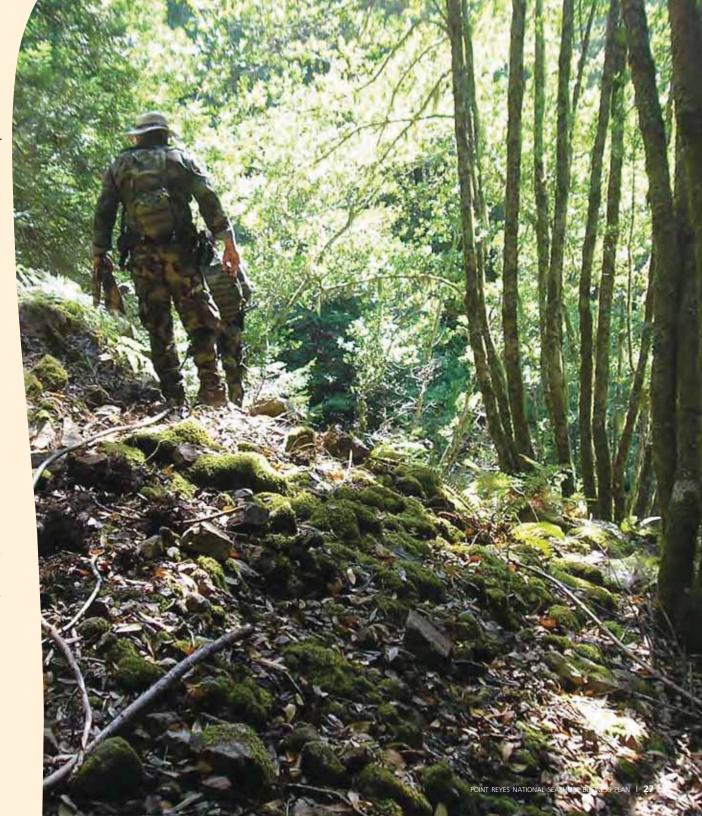
In 2006 Point Reyes National Seashore eradicated 45,000 marijuana plants from park lands. Federal lands are preferred growing spots for many marijuana producers because of laws that require individuals convicted of cultivating marijuana to forfeit the land upon which their plants are grown. In the past, law enforcement rangers would fly around the park to spot marijuana gardens from the air. Some marijuana growers have learned from these past efforts and have set up infrastructure under tree canopies to hide from air patrol. Air operations are still helpful to spot gardens that are not under tree canopies.

Growers will smuggle individuals from neighboring countries to work in the fields. Often, these smuggled individuals will not know where they are or be able to discuss the greater trafficking organization. Growers will till the land and set up infrastructure such as propane tanks and other equipment, which ruin the natural environment.

Given the substantial street value these plants have, growers will also set up defenses around their gardens. Law Enforcement and Visitor Safety rangers have found firearms in the past. For safety reasons, all eight patrol rangers must work together to monitor fields.

Marijuana eradication consumes all protection staff time when fields are discovered. Plants must be destroyed the day they are found because growers will collect the remaining plants if they are not destroyed in a timely manner. This involves heavy manual labor to hack plants, often requiring many volunteer hours. Eradication efforts are expensive because of increased labor needs and the use of helicopters to transport plants away from the garden site. The national seashore would like to continue deterring marijuana cultivation on park lands.

Law Enforcement and Visitor Safety rangers patrol park lands that are vulnerable to marijuana growing operations. NPS PHOTO





### Resource Management

Point Reyes National Seashore and the surrounding marine sanctuaries protect and support a diverse array of cultural and natural treasures. From the Coast Miwok people who shared the land with elk and mountain lions for more than 2,000 years to the courageous crew of the Point Reyes Lifeboat Station who shared the sea with migrating Pacific gray whales 100 years ago, the natural abundance of the Point Reyes region has attracted and supported people for thousands of years, creating a tapestry of stories, interactions and experiences that continue to shape cultures and to affect the land. Managing the entwined cultural and natural landscape of Point Reyes National Seashore is a balancing act as complex as the web of life it seeks to preserve.

#### Natural Resource Management

When Congress established Point Reyes National Seashore in 1962, the enabling legislation cited the importance to save and preserve "a portion of the diminishing seashore of the United States that remains undeveloped" in the public interest and to administer the Seashore "without impairment of its natural values . . . in a manner supportive of the maximum protection, restoration, and preservation of the natural environment." Congress identified Point Reyes as a seashore of national importance because it was accessible to a large urban population center, relatively unspoiled, and because of the "great variety of scenery within a relatively small compass—ocean beaches, arid high cliffs, sand dunes and low but rugged mountains, forested areas and expanses of pasturelands, small fresh water lakes and ponds, and that delight of the geologist, the San Andreas Fault." The great variety of natural resources continues to make Point Reyes a unique haven 30 miles northwest of San Francisco. Resource management staff work to preserve the natural ecosystems which Congress set aside for the benefit of future generations.

Today, the seashore has the largest active agricultural acreage of any national park. Two large historic ranching districts, comprising more than 28,000 acres, or about one-third of national seashore-administered lands, are active beef and dairy ranches. The seashore also contains almost 33,000 acres of former agricultural land now officially designated as wilderness under public law. This ranching legacy means that, even in areas designated as wilderness, there are existing dams, culverts, roads, and water infrastructure. The Natural Resource team employs science-based management to ensure that natural ecosystems

and native species—such as the northern spotted owl, purple needle grass, and steelhead trout—are identified, protected, and perpetuated in this unique environment with a complex history of use. It accomplishes this goal in part by preserving lands, waters, and watersheds with natural processes and cycles, mitigating the environmental impact of current uses, and restoring lands and waters altered by past uses to more natural conditions wherever possible. Restoration of ecological and hydrological processes to a more naturally functioning state encompasses rehabilitating watersheds, native plant communities, native wildlife species, natural geomorphic processes, and coastal waters.

#### Science-informed Decision Making

In addition to preserving and restoring habitat, staff conducts inventory, monitoring, and research of the national seashore's natural resources and associated processes. Over 45 percent of North American avian species and nearly 18 percent of California's plant species are found in the park. The Biological Resource Management Division of the National Park Service reported that in Fiscal Year 2006 Point Reyes National Seashore contained 27 federally protected endangered and threatened species. Staff develops and implements recovery plans for the 50 federal, state, and locally listed species that occur in grasslands, forests, scrub, dunes, and wetlands throughout the seashore. The NPS calculates the percentage of threatened and endangered species improving at each park as a measure of effective natural resource management. In Fiscal Year 2006, the national seashore reported 14.81 percent of special status species as improving, while the national average was 43.68 percent. However, the seashore's 27 special status species in Fiscal Year 2006 ranked sixth highest in the National Park Service, and the seashore may have more species improving than parks with a smaller number of special status species. Point Reyes National Seashore has led efforts to focus on a more institutionalized approach to data collection and inventory and monitoring at local parks. It hosts a team focused on the San Francisco Bay Area parks that has established protocols for monitoring species such as the Myrtle's silverspot butterfly and the western snowy plover.

The establishment of an inventory and monitoring program has provided park managers with critical data on which to base decisions for listed fish species, western snowy plovers, and northern spotted owls. The national seashore also has an active internal monitoring program. For example, tule elk are a special

Park staff and volunteers perform daily monitoring of fish populations at Point Reyes National Seashore. PHOTO BY KRISTIN GILLISS



An NPS range technician discusses a head cut repair with the Point Reyes roads foreman. Point Reyes National Seashore has partnered with ranch operators, community organizations, and state and federal regulatory agencies to study the effectiveness of 10 demonstration best management practices at reducing non-point source pollutant delivery from the pastoral lands administered by the seashore to the Tomales Bay watershed as part of a cooperative effort to improve water quality on NPS rangelands. PHOTO BY KRISTIN GILLISS

status species reintroduced to Point Reyes National Seashore in 1978. Since then, elk numbers have increased from 10 animals to more than 500, one of the largest populations in California, with a free-ranging population of about 50 animals in the Limantour Wilderness area of the seashore. The reintroduction of this freeranging herd is an important step in the ecological restoration of the park, but both herds require adaptive management based on constant monitoring of population dynamics and disease. The population's success to date is an indicator of the positive impact of staff and volunteer monitoring efforts. Program managers at the national seashore actively seek to mitigate threats to special status species and believe some species may be improving. Additional data and active management is needed to fully understand whether populations are stable or increasing. Staff would like to increase documentation and analysis efforts with additional resources. For example, while rare plant species have comprehensive baseline data, staff members lack the ability to collect data to determine status and trends of populations.

Maintaining the diversity and resilience of native species includes detecting, controlling, and mitigating or eradicating non-native plant and animal species to promote naturally functioning ecosystems. Scientists at the national seashore have identified non-native axis and fallow deer and non-native plants such as Cape ivy, broom, beachgrass, iceplant, and jubata grass as priority species to target for control or eradication. National Park Service funding spent on invasive species control is second only to wildfire management. The presence of these invasive species threatens native flora and fauna at Point Reyes National Seashore, and time spent minimizing the impacts of non-native species limits staff's ability to focus on recovery plans for rare animal and plant species. The NPS's California Exotic Plant Management Team provides support to the seashore's vegetation team to control and eradicate invasive plant species. In Fiscal Year 2007, the seashore will initiate an ambitious 15-year effort to remove all non-native deer within seashore boundaries.

#### A Holistic Approach to Managing Natural Resources

Natural Resource Management staff members often work closely with Facility Management staff to ensure the built environment at the seashore protects native resources. For example, the seashore's hydrologist will review a proposed culvert replacement to ensure the new design will allow fish passage. When possible, Resource Management staff seeks to improve rather than

maintain existing design. In this example, the hydrologist might suggest replacing a failed culvert with a bridge if it would greatly enhance fish habitat and passage.

Natural Resource staff is eager to collaborate with other national seashore divisions to identify innovative solutions to address human-caused resource degradation. This commitment to improving resources necessitates significant time dedicated to planning and compliance for projects ranging from small-scale soil mitigation to large habitat restoration projects. While an increased project budget has enabled staff to accomplish goals related to resource stewardship, staff has spent increasingly more time on the administrative aspects of compliance related to projects. This time limits the ability of personnel to focus on program-related work. Staff would like to work more closely with other divisions, but they have limited project availability due to resource constraints as well. For example, the range program might save time if the Roads Branch used the auger on the back of its heavy equipment to bore holes in the ground for fence posts rather than the range manager digging them manually, but the Roads Branch may not have staff available to support outside projects in addition to regular operational duties. Project completion for other resource management projects may depend upon hiring an outside contractor, ultimately increasing the cost of projects, versus having work performed by seashore personnel.

The national seashore's commitment to both protecting water resources and restoring native vegetation converge in the Natural Resources Division's range management program. Commercial agricultural activities, such as livestock grazing, dairy farming, and horse ranching, operated by private tenants on ranching lands under special use permits and reservations of use from the seashore have a great impact on the native species and local watersheds. Point Reyes National Seashore's ranching zone is administered in a manner that preserves the seashore's cultural landscape and natural resources by incorporating best management practices into ranching activities. This includes demonstration projects and the creation of customized ranch unit plans. These plans will include steps to minimize soil erosion, protect surface water from increased sediment loads, and restore deteriorated rangeland resources when feasible. For example, in Fiscal Year 2006 the seashore supported a project at Kehoe Ranch to restore a polluted natural spring by relocating a drinking trough to a better location and introducing solar pumps to supply it. The

#### **NATURAL RESOURCE MANAGEMENT OPERATIONAL PRIORITIES**

#### Preserve and Protect natural resources to restore natural hydrologic and ecological processes.

The Giacomini Wetlands, Coastal Habitat, and Drakes Estero Coastal Watershed Restoration Projects and Non-Native Deer Management Project demonstrate the national seashore's commitment to restoring ecological and hydrological processes to a more naturally functioning state. These projects include restoration of watersheds, native plant communities, native wildlife species, and natural geomorphic processes.

#### Manage, control, and remove non-native invasive plant and animal species to promote naturally functioning ecological systems.

Invasive plant and animal species threaten native flora and fauna at the national seashore. Staff has identified non-native deer and non-native plants such as Cape ivy, broom, beachgrass, iceplant, and jubata grass as priority species to target for control or eradication.

#### Manage special use permits in the Ranching Zone to promote stewardship and improve resource condition. Staff will manage ongoing agricultural activities in a

manner that employs planning and best practices to improve resource condition. This entails development of ranch unit plans, resource condition and water quality monitoring, permit oversight, and identification of improvement projects.

#### **CULTURAL RESOURCE MANAGEMENT OPERATIONAL PRIORITIES**

#### Build a more robust archeology program.

Point Reyes National Seashore is the site of a rich prehistoric and maritime history that has yet to be fully explored. Increased resources would enable staff to inventory and find new archeological sites, including locating and recovering artifacts from the wreck of San Agustin.

#### Increase access to museum collection.

The creation of finding tools and website aids will enable staff to make the seashore's museum and archive collection accessible to staff, researchers, and the public.

area was also seeded with native plants by a volunteer team. The rancher reports that the relocated trough is much healthier for the cows, and the range manager believes the spring and range are in greatly improved condition.

#### **Funding Mechanisms and Future Challenges**

Increased professionalization of the Natural Resource staff has benefited the program areas dramatically, but it has also increased salary costs in the division and therefore limited hiring flexibility for additional non-permanent staff. In Fiscal Year 2000, 84 percent of the Natural Resource Management Division's appropriated base budget was allocated to salaries for permanent full-time staff. In Fiscal Year 2006, 99 percent of base funding expenditures were salaries for six permanent employees. One consequence of limited funding flexibility has been an increased need for program managers to identify alternative fund sources for projects and additional staff. Natural Resource staff has excelled at competing successfully for outside grants and project funds within the National Park Service. While the Natural Resource Management Division has only six staff whose salaries are supported by appropriated base funds, more than 30 employees comprise the division. In addition to positions supported through outside grants and federal project money, the division manages regionally and network-funded positions hosted by Point Reyes National Seashore focused on exotic plant management, fire planning and management, aquatic ecology, and inventory and monitoring.

Natural Resource Management staff members believe past projects have increased the level of knowledge about the park's resources dramatically, but maintaining current staffing levels will be difficult without additional base funding. Many non-base-funded staff perform tasks critical to the seashore's present operations. For example, preservation of the national seashore's water resources includes habitat enhancement and restoration projects; water quality monitoring and restoration; and monitoring and management related to fisheries. Staff also collaborates on watershed-scale planning and restoration within and adjacent to the seashore's boundaries. Currently, however, there is only one base-funded position in the Natural Resource Management Division focused on the seashore's extensive water resources. Supporting positions dedicated to these activities have been funded by grants, partner organizations, or regional funding for the portion of time allocated to Point Reyes National Seashore. However, implementation of large-scale wetland and



"We preserve history and facilitate the research needs of the park and the public. I feel strongly that the museum program can work with the park and partners to facilitate modern research needs. People want to see change over time. It's one of the places where researchers can see change over time by studying specimens, objects, and documents. I love working here because I can connect people to resources. To be able to connect any type of researcher, from a person researching their genealogy, to PhDs to park staff. It's our mission to preserve history, but it's also important to allow people to use the resources."

> —Carola DeRooy, Archivist PHOTO BY DAVID MIYAKO

riparian projects is an ongoing need to preserve and protect native aquatic resources, and water quality is an overarching issue for the ecological health of the seashore. In addition, the national seashore will continue to manage special use permits in the ranching zone to promote stewardship and improve resource condition. The range manager is presently funded by fees received for special use permits; however, the range technician is only a

two-year position funded by grants from the state of California and PRNSA, even though the position is critical to the completion of projects and ranch unit plans. As senior program managers in water resources, vegetation, and wildlife are increasingly obligated to identify and compete for external funding for both staff and projects, their expertise is diverted from managing and preserving the natural resources at the national seashore.



Student interns collect data in the field at Point Reyes National Seashore. NPS PHOTO



Instilling the role of science in decision making to the next generation and the public is a primary role of the Pacific Coast Science and Learning Center. NPS PHOTO

#### PACIFIC COAST SCIENCE AND LEARNING CENTER

The Pacific Coast Science and Learning Center (PCSLC) is one of 17 research learning centers at national parks. It was established at Point Reyes National Seashore in 2001 to increase the scope and effectiveness of research toward science-based management and preservation of coastal resources. The PCSLC promotes research partnerships with universities and research groups and informs a wide range of audiences about new research pertaining to the resources of coastal parks.

The Pacific Coast Science and Learning Center connects scientists with national parks and science with people. The PCSLC combines existing facilities with the skills of researchers and education specialists to develop and share scientific information for park management and public learning. These efforts help to reduce the backlog of high-priority research needs. From 2002 to 2007, non-federal funds raised for research, management, and education by the PCSLC totaled \$1,053,000. The research enabled by the PCSLC has expanded the national seashore's ability to inventory, monitor, and care for the historical and natural resources under its care. The PCSLC also oversees several of the inventory and monitoring program's marine and coastal projects. With the help of volunteers and partners, this program provides scientists and managers with baseline information and long-term trends within Point Reyes National Seashore ecosystems.

PCSLC facilitates research at the national seashore by overseeing processing, permitting, and documentation of researchers. Research projects at Point Reves more than doubled from 53 in 2002 to 113 in 2006. Researchers are provided with support to assist the National Park Service with understanding, managing, and preserving coastal ecosystems. The PCSLC is a field station for collaborative research activities, providing researchers with laboratory, office, and dormitory facilities and access to park's extensive biological and cultural datasets. Since 2005 the PCSLC has provided more than 2,000 researcher-nights to scientists working on resource management questions at the seashore. Access to park data and other amenities enables researchers to make maximum use of their time and project funds. The PCSLC works to ensure a high rate of interaction exists between researchers and park staff. The PCSLC also connects researchers with high school and college students seeking high-quality internships and exposure to scientific research. For example, more than 40 interns have worked one on one with researchers since 2003.

While the PCSLC serves the needs of all national park sites within the San Francisco Bay Area including Golden Gate National Recreation Area, John Muir National Historic Site, Pinnacles National Monument, Eugene O'Neill National Historic Site, the Presidio of San Francisco, Fort Point National Historic Site and Muir Woods National Monument, most effort is focused on marine and coastal projects and programs. For example, in 2006, the PCSLC provided logistical, financial, planning, or permitting support to 100 percent of researchers at Point Reyes National Seashore and 66 percent of researchers working at Bay Area national parks.

#### PACIFIC COAST SCIENCE AND LEARNING CENTER **OPERATIONAL PRIORITIES**

Prioritize research needs of the park based on park planning, management, and restoration activities and promote access/provide inducements (housing, interns, seed funds) for researchers in those areas.

The PCSLC will identify emerging research needs at the national seashore and facilitate the use of national parks for scientific inquiry, particularly in high-priority research areas.

#### Engage in the state of California's Marine Life Protected Area Act planning process.

Scientists and staff at Point Reyes National Seashore remain committed to ocean and coastal stewardship. They will continue to collaborate with federal, state, and local stakeholders to support the science-based identification, assessment, and establishment of marine protected areas off the coast of Point Reves National Seashore and Golden Gate National Recreation Area and promote research and monitoring programs to assess their efficacy.

#### Develop a science communication plan.

To support science-informed decision making, PCSLC will increase access to research information, including inventory and monitoring of natural resources, to the public, the scientific community, and Point Reyes National Seashore managers. This may be done through science communication interns, stronger ties to National Marine Sanctuaries and the Point Reves Interpretation Division, science seminars, development of research briefs, and more.



### RECENT AND UPCOMING HABITAT RESTORATION PROJECTS

#### **Giacomini Wetlands Restoration Project**

The project is the largest restoration project in Point Reyes National Seashore history. It is designed to restore 550 acres of a historic salt marsh that was diked in the 1940s to allow for a dairy ranch.

#### **Coastal Habitat Restoration**

Restoration of the national seashore's coastal habitat and processes will protect numerous listed plant species and the federally threatened western snowy plover which nests on seashore beaches. Line item construction will restore 300 acres; National Park Service funds will restore 80 acres near the Point Reyes Headlands; other grants are pending for additional acres parkwide.

Left: Gumplant is native to the coastal dunes and salt marshes of the national seashore, PHOTO ©KATE PETERLEIN; Below, left to right: ocean run steelhead at Pine Gulch Creek; park biologist examines elephant seals; newborn tule elk calf after radio collaring. NPS PHOTOS



# RECENT AND UPCOMING HABITAT RESTORATION PROJECTS (continued)

**Drakes Estero Coastal Watershed Restoration Project** 

The project includes a number of specific physical treatments within five coastal watersheds, all draining into the Drakes Estero system, the centerpiece of Point Reyes National Seashore and one of the most ecologically significant estuarine areas in the state of California. The project will remove or replace nine facilities (culverts and dams) currently in various states of disrepair and restore natural conditions and increase estuarine habitat. The project will reduce the maintenance demands at Point Reyes, eliminate the risk of catastrophic failure of culverts and dams, and increase sustainability, both operationally and ecologically, within these small coastal watersheds. Overall, the project will restore fish access to 20 miles of streams.

Right: Mudflats at Drakes Estero, PHOTO @SUSAN VAN DER WAL; Below, left to right: California red-legged frog, NPS PHOTO; male western snowy plover with chicks, PHOTO @CALLIE BOWDISH; Showy Indian clover, thought to be extinct until 1993 when it was rediscovered in Sonoma County, one of only two experimental populations in the world grows within the national seashore where an experimental population was reintroduced and is monitored by vegetation staff, NPS PHOTO BY JANE RODGERS; coho salmon smolts at Redwood Creek NPSP PHOTO.













#### **Cultural Resource Management**

The national seashore's cultural resources reflect more than 2,000 years of human history and interaction with the land, including archeological sites, historic structures, ethnographic resources, cultural landscapes, and historic objects and archives. A team comprised of an archivist, curator, and archeologist researches, collects, and preserves other park history ranging from European exploration to wireless communication. The national seashore museum collection includes an archive of almost 500,000 items such as documents, photographs, and maps related to park administrative and resource management records and 14,000 objects related to cultural and natural history. The museum also manages the seashore's library. Point Reyes National Seashore has received excellent ratings from the National Park Service for the percentage of museum standards being met. In Fiscal Year 2006, the national seashore met 81.37

percent of museum facility standards compared to the national average in the NPS of 69.72 percent. The establishment of a museum and the professionalization of cultural resource staff over recent years have enabled the seashore to expand its focus from archiving items and objects to providing access to those items for researchers, staff, and visitors. In the future, staff plans to create finding aids and provide web access to the national seashore's collection. While staff manages Coast Miwok archeological sites and catalogs the physical remnants of the indigenous culture, the seashore itself is a living history to be experienced by visitors. Kule Loklo, a recreated village, provides a place for seasonal tribal events, and operating beef and dairy ranches capture California's rich agricultural history.

The development of a more robust terrestrial and maritime archeological presence is a chief priority of the Cultural Resources

Kule Loklo, near park headquarters at Bear Valley, is a replica of a Coast Miwok village that features a sweat lodge, a dance house, tepee-shaped structures, and shade arbors, used by local Indians for religious ceremonies and reunions. NPS РНОТО



Division. Coast Miwok archeological sites and artifacts, the 1595 wreck of the Manila Galleon San Agustin, and sites believed to be related to the landing of Sir Francis Drake in 1579 are considered fundamental resources of Point Reyes National Seashore. Currently, an archeologist is on staff at the national seashore fewer than two days each week. This deficiency is reflected in the seashore's Fiscal Year 2006 Budget Scorecard result: 14.61 percent of the seashore's archeological sites were listed in good condition compared to the national average of 63.75 percent of sites. The very below average score is partly a result of staff's efforts to document and address the sites in worst condition first; however, management believes its present archeological capacity makes it difficult to improve this score significantly. The majority of identified archeological sites at the national seashore are not in stable condition, either because of erosion along coastal bluffs or because they are located in active agricultural zones where

there is a higher potential for destruction. Preservation efforts are limited by resource constraints and data recovery efforts at sites is usually not possible. An enhanced archeological presence at the seashore could dramatically augment knowledge of maritime and prehistoric history at Point Reyes National Seashore by increasing staff's ability to preserve sites and recover data.

As cultural resources are identified, protected, and preserved, staff works closely with the Natural Resource Management team to ensure cultural resources and landscapes are managed in a manner that protects or improves the health and integrity of natural resources. Cultural and Natural Resource Management staff are currently developing a comprehensive resource stewardship strategy to provide science- and scholarship-based strategies to achieve and maintain the desired conditions of the national seashore's natural and cultural resources.

Some of national seashore's dairy and beef producers in the "Ranching Zone" are fourth-generation farmers and ranchers. Today, park managers are also interested in exploring how livestock might be managed to reduce weeds and enhance native species in the national seashore. NPS PHOTO



# Visitor Experience and Enjoyment

Interpretive rangers are responsible for interacting with visitors and for helping people make a connection to the resources of Point Reyes National Seashore. The function does this through three primary methods: visitor center operations, interpretation, and education.

#### **Visitor Center Operations**

The national seashore's three visitor centers provide the primary means for individuals entering Point Reyes National Seashore to obtain both essential and enriching information that enables them to have a safe, enjoyable, and educational experience at the park. All interpretive facilities offer opportunities for visitors to obtain in-depth information on natural and cultural resources found in the park and to become familiar with ecological and environmental principles.

Point Reyes National Seashore has received a 100 percent visitor satisfaction rating for the past four years, despite staffing challenges that cause the main visitor center to close at 5:00 p.m. amidst a steady stream of visitors arriving well past closing hours in the summer. Additional staffing would allow the national seashore to better meet visitor demand.

Interactions with staff help protect the national seashore's resources as well. For example, Point Reyes National Seashore is a nesting area for the endangered western snowy plover. The seashore found that visitors were bringing their dogs to the beach nesting areas of these birds despite posted signs informing individuals of dog restrictions. After implementing a docent program to educate visitors, 46 percent of chicks fledged from nests as opposed to 22 percent before the program existed.

Visitor centers provide valuable safety information. By interacting with visitor center staff, visitors are more likely to encounter warnings about potentially dangerous areas of the park including the area's attractive, yet dangerous, shoreline.

#### Interpretation

Interpretation at Point Reyes National Seashore consists of formal and informal interpretation and media development. Formal interpretation comprises all ranger-conducted, scheduled interpretive activities at the seashore. Informal interpretation allows for spontaneous interpretive contacts on trails or at facilities and other areas of the seashore. Interpretive media

include all seashore-produced publications, exhibits, bulletin boards, audio/visual programs, and the Point Reyes National Seashore website. Interpretive rangers also conduct special events such as the "Big Time" festival celebrating the Coast Miwok Indian culture.

Point Reyes National Seashore uses interpretation to foster public understanding and appreciation of national parks and their significant cultural, natural, and recreational resources, and to support preservation of these resources. The national seashore uses four interpretive themes to accomplish these objectives:

- Point Reyes National Seashore and the surrounding marine sanctuaries protect and support an abundance and diversity of species and their essential habitats in a wild and natural state. These resources are a benchmark for monitoring environmental change.
- 2. The natural abundance of the Point Reyes region has attracted and supported people for thousands of years, creating a tapestry of stories, interactions, and experiences that continues to shape cultures and affect the land.
- Point Reyes National Seashore provides an outdoor classroom and laboratory for the study of geological and ecological processes and changing land use values that will foster a greater understanding of and caring for America's public lands.
- Point Reyes National Seashore is a land in motion where geologic processes continue to define the landscape and influence our lives.

Each employee is required to submit an interpretive competency certification as part of his or her performance appraisal. This certification is part of the National Park Service *Interpretive Renaissance*, which seeks to develop and implement professional standards, among other things. Current staffing levels do not allow for program auditing, which is a structured method for feedback relating to an interpretive program.

#### Education

The education program at Point Reyes National Seashore provides opportunities for students to experience and appreciate the natural and cultural resources of the park and the region. All programs and materials foster park stewardship and introduce students to a wide range of environmentally responsible outdoor activities. The education program is interdisciplinary, using

A Point Reyes National Seashore interpretive ranger leads visitors on the Earthquake Trail walk.
PHOTO BY KRISTIN GILLISS

"For us interpretation is the voice of the resource. We have a chance to help visitors experience the cool stuff we have here and to connect to the world around them."

> — JOHN GOLDA POINT REYES INTERPRETIVE RANGER

science, art, and history as tools for cognitive and behavioral learning in topics that support park goals as well as local, state, and national curricula. Teams consisting of teachers, resource specialists, park partners, and park interpreters develop all materials and programs. During Fiscal Year 2006, the seashore reached over 6,000 school children with educational programs.

Point Reyes National Seashore also relies on partner organizations to provide educational programs to people of all ages. For example, the Point Reves National Seashore Association runs the Clem Miller Environmental Education Center, which hosts overnight science camp programs. However, even with help from partners, the seashore must turn away a number of school programs each year due to the lack of staffing capacity.

Point Reyes National Seashore also provides curriculum and facilities to teachers who wish to use the seashore for science education purposes. The seashore would like to give funding assistance to schools for buses and other expenses so that teachers can bring their students to the area for hands-on education. These buses would be especially helpful in reaching underprivileged groups in more remote school areas. This type of funding is currently unavailable.



The Bear Valley Visitor Center offers opportunities for visitors to obtain in-depth information on natural and cultural resources within Point Reyes National Seashore and to become familiar with ecological principles. PHOTO BY DAVID MIYAKO

#### **VISITOR EXPERIENCE AND ENJOYMENT OPERATIONAL PRIORITIES**

Maintain and increase visitor center operation levels. Point Reves National Seashore has three visitor centers. which close in the early evening. The seashore would like to increase the operating hours of the visitor centers to accommodate user demand in the evening.

#### Incorporate technology into interpretation.

Point Reyes National Seashore would like to acquire portable electronic devices to use in conjunction with interpretive programs. This would allow interpreters to reach a younger, technology-oriented demographic. The national seashore would also like to produce podcasts and to acquire additional bandwidth to enable a live webcam from the Point Reyes Lighthouse.

#### Continue producing high-quality publications and website content.

The national seashore presently self-produces numerous publications. Multiple duties and time constraints challenge the abilities of the Visitor Experience and Enjoyment (VEE) staff to fully support this type of duty. Staff would like to continue producing high-quality publications and website content as their time allows. Additional time would allow for development of an increased number of educational and informative publications.

#### **INTERPRETING WHICH LANGUAGE?**

Though the title "interpreter" is not well known, interpretive rangers are among the most recognizable staff within the National Park Service. Interpreters operate the visitor centers, conduct ranger-led programs, and administer special events. Encounters with interpretive rangers are among the highlights of most visitors' park experiences. In contrast, environmental education at the national seashore is responsible for developing school curriculum related to park resources. The purpose of interpretation and education in the National Park Service is to provide memorable, meaningful, and inspirational experiences related to the parks and to strengthen public understanding of the full meaning and relevance of the nation's natural and cultural resources. The sight of a ranger directing a group of people on a trail was once common. Mounting fiscal pressures have diminished this aspect of the national park landscape. Interpreters translate the language of the rocks, trees, animals, and cultures within an area. Environmental educators develop curricula for schools to use when teaching the next generation of environmental stewards.



The duties of an interpretive ranger at Bear Valley Visitor Center include visitor center operations, interpretation, and education.

PHOTO BY DAVID MIYAKO

Right: Point Reyes National Seashore visitors enjoy birdwatching at Chimney Rock. Photo BY JANE RODGERS



### **Required Resources**



As part of the NPS business plan process, the national seashore's senior management evaluated the resources that would be required to fully meet the operational goals and priorities of each functional area as discussed in the Current Operations section. Changes and additions to personnel comprised almost the entirety of additional resources that the seashore management indicated was necessary to fully meet their mission. Based on these needs, a new organizational chart was developed, which reflected a more ideal vision of the national seashore's organization. This new organizational chart showed a total increase in new staff of 31.2 FTE. Although this seems high, fully thirty percent (10.2 FTE) of this amount was to convert less than full-time or temporary positions to full-time or permanent positions. These conversions reflect the financial reality of the park—the seashore has had to conserve funds by hiring positions at less than full-time for tasks with a workload that would best be met by a full-time employee.

In addition to these new FTE, national seashore management identified six FTE which are currently paid from grants, fees, or project funds that would more ideally be stable positions paid from base appropriations. Were these positions able to convert to base appropriations funds, it would free staff time to pursue operational tasks that are currently spent seeking funds to support these FTE.

The organizational structure developed through the business plan process is not one which the Point Reyes National Seashore will be able to achieve with current operational funds. However, it provides a decision-making guide for the seashore to use if and when funding becomes available to hire additional staff. Successful implementation of the strategies outlined in the following section of the business plan will also help the seashore move forward in achieving its operational goals.

Alamere Falls flows into the Pacific at Point Reyes National Seashore. PHOTO BY KRISTIN GILLISS

### **Strategies**

In an effort to improve upon existing achievements, Point Reyes National Seashore has developed 12 strategies for the future. These strategies are divided into three categories:

#### 1. Generating Revenue/Increasing Reimbursables

By generating revenue and increasing reimbursements, the seashore hopes to augment the amount of funding available for operations and investments. Strategies in this section focus on fees and donations.

#### 2. Increasing Efficiencies/Cost Avoidance

Increasing efficiencies and avoiding costs would allow the park to focus its financial resources on areas that are most critical to the mission of Point Reyes National Seashore. This section examines assets, sustainability, and organizational structure.

#### 3. Improving Services or Other

Improving services would enable the seashore to advance its goals of preservation and education. As such, strategies in this part examine restoration projects, education, volunteerism, and working with other national parks.

While not all of the following strategies are financial in nature, each of these strategies will allow the national seashore to deliver the highest value possible to visitors while simultaneously working to preserve and protect the park's natural and cultural resources. The following is a brief overview of each strategy.

#### 1. Generating Revenue/ Increasing Reimbursables

#### **Examine Fee Structure for Special Use Permits**

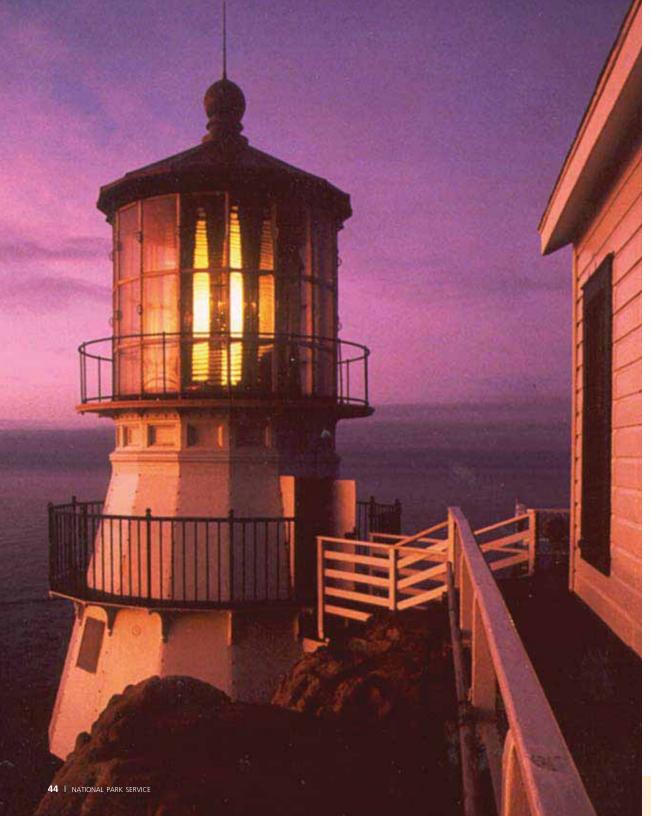
The national seashore would like to examine special use permits related to ranching and nonranching operations. Income from special use permits related to agricultural operations in Fiscal Year 2006 was \$577,539. Expenditures, including labor, nonlabor, and indirect expenses, related to ranching operations was \$625,772 in Fiscal Year 2006. This difference means that the park did not recover all costs associated with ranching operations at the seashore in Fiscal Year 2006. The seashore also issues nonranch special use permits for filming, photography, weddings, races, picnics, nonranch residences, and other purposes. The fees for these permits are intended to recover costs incurred by the seashore due to special uses. The seashore would like to evaluate and monitor these costs to determine whether all associated expenses incurred as a result of these uses are being recovered.

The following example illustrates a nonranch related analysis. A typical wedding at the seashore requires a \$50 application fee and requires staff time for phone calls, site visits, resource impact review, and other ancillary duties. The staff time, vehicle use, supplies, and utilities for a typical wedding would cost the seashore \$81 using Fiscal Year 2006 rates, which would result in a loss of \$31 per wedding to the seashore. Point Reyes National Seashore plans to conduct similar analyses for other non-ranch special use permits.

Special use permits related to ranching operations are distinct from other permits at the seashore. In February 2006 the United States Government Accountability Office reviewed grazing fees in the National Park Service. National Park Service guidance provides direction to park units on setting fees for special uses, including grazing. Director's Order 53 states that the fee should consist of two amounts: (1) the value of the land or facility, plus (2) the costs for managing or supporting the use. This fee structure establishes a premium for grazing on National Park Service lands by recovering costs in addition to a market fee charged for the lands and facilities used for grazing. The national seashore already charges a fee for grazing based on market rates. The seashore recovers its costs from the grazing receipts generated and does not charge an additional fee. If the seashore were to add a costrecovery amount to the current market-based fee, the total fee would exceed the market value for grazing in the area. This directive may conflict with the seashore's mandate to work with local ranchers to maintain grazing.

Historically, the national seashore has evaluated the market value for ranching fees, including the rate for animal unit months (the amount of forage needed by an "animal unit" grazing for one month), every five years based on an independent appraisal. In September 2002 the animal unit month market-based rate of \$7.00 on Point Reyes National Seashore land was established based on an appraisal. This fee should be evaluated in Fiscal Year 2007. Further, rather than instituting a costrecovery fee in addition to the marketbased rate for grazing, management will consider indexing the marketbased rates to inflation each year.

The benefit of analyzing both ranch and nonranch special use permits is to recover all costs so that special uses are neutral to the national seashore's fiscal operations. Special use permits are not designed to make a profit.



#### **Increase Association Membership**

In an effort to increase membership in the Point Reyes National Seashore Association (PRNSA), the seashore plans to increase its assistance with PRNSA recruitment. The association will operate a mobile information and recruitment center that will take an active role in soliciting memberships. Until recently, the national seashore has conducted passive recruitment, relying upon visitors to notice PRNSA publications and join at a later date. Future efforts would provide a volunteer to inform visitors about the benefits of association membership. This volunteer would operate in high traffic areas and at times when visitation is at its greatest.

In Fiscal Year 2006, 272,944 individuals visited Bear Valley Visitor Center. Of the visitor center guests, 35 people signed up for a new PRNSA membership during their visit. In addition to the Bear Valley Visitor Center, 33,584 people visited the Ken Patrick Visitor Center and 106,694 people visited the Lighthouse Visitor Center in Fiscal Year 2006. One person signed up for a new membership at the Ken Patrick Visitor Center during the year. Average memberships are \$50 for the "supporter" level. These amounts do not reflect new memberships activated online or by mail.

While recognizing the overwhelmingly substantial benefit of existing membership renewals, the national seashore would also like to increase the number of new members of PRNSA.

#### 2. Increasing Efficiencies/Cost Avoidance

#### **Focus on High-Priority Assets**

The park will focus on those assets that contribute most to the mission of Point Reyes National Seashore and the National Park Service. The seashore has identified 28 assets for deconstruction to reduce long-term operations and maintenance costs. The number of historic structures has already been reduced from 297 to 279 by eliminating low-priority assets in poor condition and recycling building materials. Management will continue to evaluate FMSS data and the results of the park asset management plan being produced Fiscal Year 2007 to reduce the overall number of assets.

#### Improve Energy Efficiency

The national seashore is committed to environmental stewardship, and reduced energy consumption is directly linked with preserving resources for future generations. The seashore will pursue increased energy efficiency though the use of renewable energy systems, alternative fuels, and day-to-day sustainable practices.

The national seashore will actively compete for outside sources of revenue to install renewable energy systems because they provide an immediate reduction of operating costs and advance the seashore's goal of reducing its carbon footprint. Each of the seashore's solar energy systems produces a cost savings to the park of approximately \$1,000 annually based on the cost of electricity. In addition, these systems provide an environmental benefit that is aligned with the National Park Service mission to preserve the seashore's resources. In Fiscal Year 2006, the Bear Valley Visitor Center photovoltaic system generated 6.74 megawatts of power. According to the Environmental Protection Agency's estimates, the seashore's use of this renewable energy source at this location prevented the release of up to 5,922 pounds of carbon dioxide in Fiscal Year 2006.

In addition to pursuing the acquisition and installation of additional renewable energy sources for facilities, the seashore is evaluating alternative fuel options for vehicles. Management remains committed to partnering with the U.S. General Services Administration (GSA) to increase the percentage of its fleet powered by alternative fuel. The seashore is also evaluating the fiscal and environmental benefits of a biodiesel tank at Point Reyes National Seashore.

The seashore's day-to-day operations target reduced consumption of energy. From converting the type of lights used to managing how office machinery such as copiers and computer monitors consume power, the national seashore will improve its energy efficiency and reduce intensity of energy use.

#### **Improve Fleet Efficiency**

The national seashore is committed to fulfilling transportation needs with the minimum possible environmental impact at the lowest cost possible. The seashore will improve fleet efficiency by three methods: (1) utilizing more fuel efficient vehicles, (2) right-sizing the fleet, and (3) centralizing management of its fleet.

In the NPS Pacific West Region, the U.S. General Services Administration, the federal government's premier acquisition agency, is the mandatory source for vehicles. However, the seashore has successfully pursued and secured donated vehicles from Toyota and Ford in the past. In pursuit of goals related to environmental stewardship, management and staff at the seashore would like to shift to more energy-efficient vehicles powered by alternative fuels such as biodiesel or propane. The seashore's present fleet of alternative fuel vehicles has demonstrated that in addition to reduced environmental impact, the use of these vehicles represents a potential cost savings. For example, in Fiscal Year 2006 the average cost per mile associated with one of the seashore's donated hybrid vehicles used by the Interpretation Division was \$0.06 per mile. In contrast, the cost per mile for the use of a comparable-sized gasoline-powered sedan used for similar functions by the same division was \$0.57 per mile.

General Services Administration vehicles are leased, not owned, and are replaced in accordance with GSA year and mileage parameters. Point Reyes National seashore can reduce petroleum consumption by pursuing donated alternative fuel vehicles and by leasing alternative fuel vehicles from GSA. To reduce costs in addition to reducing environmental impact, however, the seashore can also evaluate the size of its fleet by assessing current vehicle utilization rates and right-sizing the fleet before replacing vehicles. In Fiscal Year 2006, 38 GSA-leased vehicles, which represents approximately 60 percent of the seashore's average GSA fleet, were under the mileage utilization target set by GSA of 1,000 miles per month for passenger-carrying vehicles and light trucks and 833 miles per month for full-size trucks. As part of the business plan process, the national seashore has identified vehicles with low-mileage utilization and will evaluate whether these vehicles should be replaced.

Finally, the national seashore could implement periodic assessment of vehicle utilization, cost, and quality in the course of normal operations. The information management system related to fleet management at the seashore is largely decentralized. While some data is tracked, it is not necessarily used as the basis for decision making, and performance measures for owned and GSA-leased vehicles have not been established. Ensuring access for decision makers to information such as the average cost per mile for vehicles will guarantee that transportation decisions target the lowest cost and environmental impact possible.

#### **Examine Organizational Structure**

The seashore will evaluate its current organizational structure to ensure resources are being used efficiently and overhead expenses

Opposite: Sunset at Point Reyes Lighthouse PHOTO ©BRUCE FARNSWORTH



An NPS range manager inspects the condition of grasses at a vegetation restoration site. PHOTO BY KRISTIN GILLISS

Opposite: Caspian terns at Abbotts Lagoon NPS PHOTO

are minimized. For example, the seashore may evaluate whether consolidating staff focused on parkwide information management is appropriate. An Information Management Branch might include geographical information system staff and information technology staff who would maintain the integrity of the seashore's data, software, and hardware.

#### 3. Improving Services or Other

#### Partner with PRNSA on Strategic Point Reyes NS Projects

Point Reyes National Seashore Association (PRNSA) is an extremely valuable partner of the seashore. By conducting both educational programs and fundraising activities, PRNSA, a 501(c)(3) non-profit organization, has been supporting the seashore since 1964. See the Management and Administration section of this business plan for more information about the association. The association is currently leading the Giacomini Wetlands Restoration project. The seashore would like to discuss other possible strategic projects with the PRNSA board for the next 10 years. To accomplish this objective, the seashore and the association are planning to develop a process of regular strategic goal setting and review with the association's board and management. This process would allow PRNSA to conduct proactive fundraising for projects that will begin in later years. Additionally, this strategy will allow PRNSA and the seashore to have more unified communications with donors and other supporters of the seashore.

Possible projects would include the restoration of Point Reves National Seashore dunes, and other NPS Centennial Initiative projects listed in the Centennial Initiative section of this business plan. The nine Centennial projects are estimated to cost over \$25 million in total. Point Reyes National Seashore will need help from PRNSA and others willing to donate time and money to help the seashore. These projects will benefit both Point Reyes National Seashore and other national parks within the San Francisco Bay Area.

#### **Develop Partnerships for Delivering Critical Outreach and Education Services Not Done by Park Staff**

The national seashore currently uses 21 partners to deliver critical outreach and education services not performed by park staff, and is planning to expand these partnerships. Current partnerships include the Point Reyes Bird Observatory Conservation Science,

California State Parks, local schools, the Miwok Archeological Preserve of Marin, and many others. Point Reves National Seashore would like to expand this list of 21 partners by finding educational niches that are not filled by staff, which could be occupied by partners.

An example of such an educational niche and related partnership would be the seashore's relationship with the Salmon Protection and Watershed Network (SPAWN). This organization works to protect endangered coho salmon and steelhead trout. In addition to habitat restoration and policy development, the organization accomplishes its mission through environmental education. The seashore relies on SPAWN to conduct high-quality environmental education related to coho salmon, which compliments the efforts of the national seashore's staff.

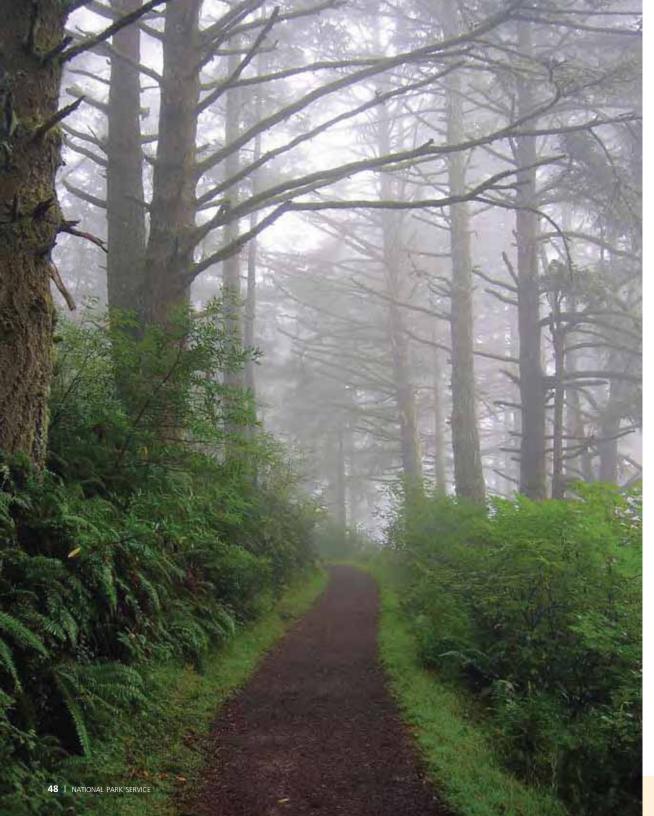
Another example of a potential educational partner is the Pacific Coast Research Learning Center. The national seashore hosts one of 17 Science Learning Centers in the country. These facilities promote science in national parks. The seashore would like to establish a formal method by which the research of visiting scientists is made available to the public at large. This could be through scheduled information sessions at the seashore or through publications produced for public audiences.

The seashore's strategy to increase partners such as the ones mentioned here is to examine current educational and interpretive offerings and identify areas the park is unable to address at current staffing levels. By using partners, the seashore hopes to fill those educational needs without incurring additional cost. This effort would expand the seashore's role in educating the public about the natural and cultural resources of the Bay Area and would engage more people to help the National Park Service through education.

#### Coordinate Field Seminars and Other Presentations With **Bookstore Merchandising/Examine Further Uses of Bookstores**

The role of the bookstore operation at Point Reyes National Seashore is to further the interpretive and educational aims of the seashore, and to provide some visitor convenience items. The seashore furthers interpretation and education primarily through book sales. Visitor convenience items include souvenirs, sweatshirts, water, postcards, and other similar items. Visitor convenience items carry the highest profit margin. Books provide





the greatest educational value. The seashore operates three bookstores in each of the main visitor center locations: Bear Valley, Lighthouse, and Ken Patrick. The Lighthouse and Ken Patrick are not open as often as Bear Valley.

The national seashore has two types of bookstore customers: summer and winter visitors. Summer visitors generally purchase souvenirs such as magnets and postcards. Summer visitors also purchase sweatshirts because of the rapidly changing climate of the seashore. Winter visitors are generally more interested in books and educational materials.

In the future, the national seashore and the Point Reyes National Seashore Association plan to coordinate items sold in the bookstores with topics of current field seminars and presentations to maximize the educational benefits of the bookstores and to provide additional income. Book sales of a particular subject are greatest after people have attended a field seminar about the same subject. For example, a field seminar about birds will usually lead to increased sales of books related to birds.

Additionally, PRNSA would like to consider sales items that enable visitors to experience the park more broadly. For example, selling windbreakers and pre-packaged nutrition bars would allow visitors to hike spontaneously on one of the seashore's trails. In the distant future, PRNSA would like to explore the possibility of opening satellite retail and educational outlets in other parts of the Bay Area. This strategy would allow Point Reyes National Seashore to educate people that live farther away from the seashore and would provide some extra income for critical projects.

The Point Reyes National Seashore Association does not currently monitor item-by-item sales activity. However, total sales are highest in the summer months. If the seashore would like to increase revenue in the future, it could consider evaluating a different product mix, changing the configuration of the stores, and offering different types of items at different seasons according to the two visitor types. In Fiscal Year 2006 the Bear Valley bookstore, which is the most active of the three bookstores, generated \$1.06 per guest of that particular visitor center. In previous years, this rate was closer to \$1.38 per visitor. Total sales of the three bookstores are expected to increase five percent from Fiscal Year 2006. The total operating margin of the three bookstores is projected to be 14.2 percent in Fiscal Year 2007.

#### **Evaluate Volunteer Management**

Point Reyes National Seashore has proposed to receive funds for a volunteer coordinator in Fiscal Year 2008 as part of the National Park Service Centennial Challenge. This funding would allow for a seasonal position nine months out of the year. The seashore would like to determine how this position can best add to the volunteer management and recruiting already performed by existing staff. As mentioned in the volunteer section of this business plan, volunteerism in the National Park Service is designed to be a mutually beneficial relationship. As such, the seashore spends staff time recruiting, training, and managing individuals and groups willing to donate their time to help Point Reyes National Seashore. A volunteer coordinator would help the seashore recruit additional potential volunteers.

For example, Point Reyes National Seashore uses volunteer groups to help maintain trails. Without these volunteers, the seashore would close many of the trails presently open to the public. High school groups are the largest source of volunteers for trail maintenance. The seashore instructs these students on equipment safety and trail maintenance techniques and provides supervision when students are using tools to dig trails and clear brush. For safety purposes, the seashore accommodates 10 trail volunteers for every one staff person. An increase in volunteers would also require a commensurate increase in staff time.

Staff at the seashore would like the volunteer coordinator to centralize outreach efforts, data management, and budgeting. Volunteer recruitment is currently a passive process, requiring people to search the Point Reyes National Seashore website for volunteer information. Often, the website will contain outdated projects. Volunteer contact information and statistics about hours worked are not maintained consistently once volunteers sign up for projects. The new volunteer coordinator would be responsible for these duties. Additionally, the new volunteer coordinator would handle budgeting tasks related to volunteers for expenses such as recognition gifts, gloves for trail work, vehicle use, and other expenditures.

According to the terms of the Centennial Challenge, the national seashore will receive funding for a volunteer coordinator for an undetermined amount of time without subsequent increases in latter years. Any cost of living or step increases will need to be covered by the seashore, which would be around 3 percent per

year. To cover the costs of this new federally mandated position, the new volunteer coordinator will need to generate more than 2,000 hours of volunteer work each year in addition to the number of hours presently donated to the seashore. Over five years, this would translate to an estimated \$254,839 of benefit, not including additional costs of volunteers.

#### **Identify Efficiencies Through Using the Park Network**

Point Reyes National Seashore is part of the Bay Area Network. As part of a network of national parks, the seashore would like to increase efficiencies between park units. The seashore is commencing this type of activity with the Wildland Fire Division. As stated in the current operations section of this business plan, one of the goals of Wildland Fire is to continue supporting network parks. The fire management officer of Point Reyes National Seashore has written the fire management plan for Pinnacles National Monument, and is currently writing the fire management plan for John Muir National Historic Site, Eugene O'Neill National Historic Site, and Golden Gate National Recreation Area.

By managing fire planning centrally, Wildland Fire plans to capture efficiencies in terms of operation, communication, and interagency coordination. For example, Pinnacles National Monument was unable to conduct any prescribed burns for fire abatement purposes in the past few years. With the help of Point Reyes National Seashore, Pinnacles National Monument treated five acres with prescribed burning this past year. The seashore would like to identify efficiencies in other functions similar to those led by Wildland Fire.

#### Communicate Results of Science-based Inquiry to Park and Public

The management of Point Reyes National Seashore is committed to science-based decision making. Development of a science communication plan will enable the seashore to ensure that park managers and the public are well-informed about the scientific rationale for management decisions. Point Reyes National Seashore will continue to encourage research at the seashore targeting high-priority needs of park managers. Critical data, trends, and decisions based on this research will be better communicated to visitors through interpretation and by other means identified in the science communication plan.

Opposite: Fog encompasses the forest along Sky Trail near Sky Camp. PHOTO BY DAN UNGER



### **Special Profiles**

#### **Giacomini Wetland Restoration**

The Giacomini Wetland Restoration Project is designed to restore 563 acres (project area) of a historic salt marsh that was diked in the 1940s to allow for a dairy ranch. The ranch includes 550 acres of "lowlands" and 13 acres of "uplands" on the mesa above the former wetlands. The project focuses on enhancing the quality and functionality of wetlands within the Waldo Giacomini Ranch and Olema Marsh by restoring

natural hydrologic and ecological processes. This hydrologic reconnection is expected to decrease flooding within the local community and improve water quality within the project area and Tomales Bay.

Point Reyes National Seashore partnered with nonprofits Point Reyes National Seashore Association and the National Park Foundation to raise funds for the project through a combination of mitigation settlement funds, federal and state funds, and large grants from a small number of foundation sources.

The largest loss of hydrologically connected wetlands occurred with diking of the Waldo Giacomini Ranch and pastures in 1946. The levees constructed at the southern end of Tomales Bay for roads and dairy farms have served to hydrologically disconnect Lagunitas Creek and its tributaries from their floodplains. Twothirds of the freshwater inflow—and potentially the principal sediment, nutrient, and pathogen sources—to Tomales Bay flows through the project area. By restoring natural hydrologic processes through removal of levees, tidegates, and culverts, floodwaters of Lagunitas Creek carrying sediment, nutrients, and other pollutants will be able to flood onto its historic floodplains to be filtered and transformed by the restored wetlands, thereby improving downstream water quality. These restored wetlands would not only benefit water quality and increase habitat and food resources for wildlife within the watershed, but would provide opportunities for public enjoyment and education through inclusion of public access trails, viewing overlooks and platforms, and interpretive exhibits.

Tomales Bay is ranked as one of the top six most biologically diverse areas in the United States and one of the top 100 shorebird-watching areas in the world. It also supports the southern-

most stable coho salmon population. Once restored, the Giacomini Ranch will constitute the largest tidal wetland complex in the Tomales Bay Estuary and will increase the amount of hydrologically connected coastal wetlands by as much as 12 percent along the central California coast.

The total project cost, including land acquisition, project planning and design, construction, construction contingencies

and project supervision, is estimated to be \$10.5 million, which has been secured from private, state, and federal sources. The initial funding component for the project was \$1.55 million in congressional appropriations through the Land and Water Conservation Fund and more than \$4.2 million from the California Department of Transportation to mitigate for impacts to natural aquatic habitat resources associated with repair of Highway 1 in the vicinity of Lone Tree Creek after landslide damage in early 1990. The majority of those funds were used to acquire the Waldo Giacomini Ranch property for \$4.5 million in 2000. Other monies funded planning, feasibility analysis, and preparation of construction specifications for the restoration project. Point Reyes National Seashore Association has now raised \$5.2 million for this project. Funding sources include the Gordon and Betty Moore Foundation, North American Wetlands Conservation Act, Watershed Council of the State of California Water Control Board (Proposition 50), and the National Fish and Wildlife Foundation-Northern California Restoration Grant.

Following construction, most of the long-term park operations costs will be associated with the public access facilities, as the restoration component of the proposed project has been designed specifically to not require future maintenance actions. Lifecycle costs to maintain the public access facilities are not anticipated to exceed \$50,000.

The seashore has identified partnership with PRNSA on future projects as a strategy to pursue over the next three to five years. The Giacomini Wetland Restoration Project is one of many projects identified by Point Reyes National Seashore in efforts to protect and preserve resources. Additional projects promoting resource stewardship and education are included as part of the park's National Park Centennial Initiative proposed project list.

Above, right: An NPS hydrologist indicates the wetlands restoration project boundary while NPS staff monitor transects that will allow researchers to perform vegetation analysis on the restoration project's impact. PHOTO BY KRISTIN GILLISS

Left: Giacomini Wetland Restoration Area PHOTO ©ROBERT CAMPBELL



Drakes Estero and wild irises PHOTO @SUSAN VAN DER WAI

#### **National Park Service Centennial Initiative**

In preparation for the one hundredth anniversary of the National Park Service in 2016, the NPS has launched the National Park Centennial Initiative. The National Park Centennial Initiative advances the National Park Service's role as the world leader in natural and cultural resource stewardship. It provides opportunities for people to enjoy the resources entrusted to the National Park Service's care and challenges America's leaders to achieve even greater conservation and education success in the future. The National Park Service will engage community partners to reach young people and new audiences as part of the Centennial Challenge with hopes of enriching people's lives and protecting America's treasures for future generations.

In response to the Centennial, Point Reyes National Seashore has planned a series of projects to deepen what is already an immense commitment to natural and cultural resource stewardship and public education.

#### Restore Stream and Coastal Marsh at Drakes Beach Complex to **Demonstrate Ecological Sustainability**

Partners and the seashore will restore a coastal stream and marsh near Drakes Beach Visitor Center. The area receives 300,000 visitors annually.

#### Enhance an Ocean Stewardship Research and Education Center on Tomales Bay

Point Reyes National Seashore would like to create workspace for researchers and to enhance marine education, and augment public access and safety. The research station will help meet the mission of the NPS Ocean Stewardship Strategy, providing a place where a seamless network of agencies can study, monitor, and manage marine ecosystems. The site will be used by the National Marine Sanctuaries Program, California State Parks, universities, and the National Park Service.

#### Restore Tomales Bay Water Quality and Preserve Critical Salmonid Habitat

Point Reyes National Seashore would like to enhance protection of aquatic habitat to support coho salmon and steelhead trout. This project would include redevelopment of seashore road crossings and infrastructure to minimize impacts on sensitive riparian habitat and floodplains vital to maintaining natural stream processes.

#### **Develop Research Learning Center Academy**

This proposal seeks to build capacity across several research learning centers and inventory and monitoring networks. High school and college students will enroll competitively in a four-year Research Learning Center Academy (RLCA) to gain real world experience in preservation of NPS resources through science and science education careers. Ideally students will serve their last two years of high school and college.

#### Rehabilitate Camping Area for Sustainable Campground Experience

Developing a showcase of ecologically responsible frontcountry camping would allow visitors to experience Point Reyes National Seashore while minimizing their carbon footprint. This campground would provide the same level of experience as the ecotourism destinations found worldwide. Responsible ecotourism includes programs and infrastructure that minimize the adverse effects of traditional tourism on the natural environment.

#### Restore the Historic Point Reyes Lighthouse, a Signature Feature at Point Reyes National Seashore

This project would repair damaged structural elements and correct life safety and structural deficiencies threatening the historic Point Reyes Lighthouse, related historic structures, and landscape features. The historic Point Reyes Lighthouse is one of the finest examples of iron plate lighthouses in the country. The lighthouse has a 16-sided pyramidal tower and a large, original first order Fresnel lens powered by a brass clockwork mechanism. The property is listed on the National Register of Historic Places and is located in one of the foggiest, windiest places in the continental United States.

#### Research the Health of the Pacific Ocean as a Result of Climate Change

Researchers will gather baseline data from 2009 to 2011, modeled after data gathered by the Channel Islands Marine Protected Area (MPA) Network evaluation program, using the same collaborators and benefiting from the lessons learned on the Channel Islands project. Data gleaned from the Channel Islands fish survey project has proven critical to managing and sustaining Channel Islands Marine Protected Areas. Similar data will be essential to managing MPAs successfully at Point Reyes National Seashore and Golden Gate National Recreation Area. A subcomponent of the baseline



Centennial Initiative funding would help researchers gather baseline data on the health of marine environments as a result of climate change. PHOTO BY KATE PETERLEIN

surveys will be to assess the presence of invasive nonnative aquatic species and habitats at risk.

#### Restore Limantour Beach Native Dune and Estuarine System for **Endangered Species**

This Centennial project will restore 300 acres of coastal dune habitat for federally endangered bird and plant species. Upon completion, the seashore will celebrate this restoration with a rededication of the national seashore. Point Reyes National Seashore ranked sixth in Fiscal Year 2006 for the highest number of federally listed species in the country.

#### **Establish Landscape Restoration Field Station at Historic Wilkins** Ranch

This project would establish an integrated cultural and natural landscape restoration field station at the historic Wilkins Ranch in Point Reyes National Seashore. Interdisciplinary research would focus on critical issues related to western landscape preservation, where cultural and natural resources are intertwined and cannot be managed separately. Visitors will be able to use a new trail that would extend the heavily used Olema Valley Trail south to the Seashore's boundary.

#### **Economic Impacts of Point Reyes National Seashore**

In December of 2006, Bay Area Economics, an independent company focused on sustainable communities, completed an economic impact study for Point Reyes National Seashore. The purpose of this study was "to identify and quantify impacts of Point Reyes National Seashore on the local economy (defined as Marin and Sonoma Counties) as well as the overall California economy." Following are some highlights from their economic study:

- In 2005 Point Reves National Seashore generated a total of \$71.8 million in direct, indirect, and induced revenues in Marin and Sonoma Counties and accounted for approximately 850 jobs.
- Viewed as part of the broader Marin and Sonoma economy, the [seashore] accounts for approximately 0.163 percent of total economic activity in 2005.
- The [seashore's] impact on the California economy totaled \$45.2 million in total economic impacts and 432 jobs.

 Economic activity by the [seashore] generates approximately \$5.3 million in annual taxes for Marin and Sonoma Counties and \$2.9 million for California.

All national parks are sources of economic activity. From lodging to postcard sales, all national parks contribute to the local economy by providing jobs and promoting tourism. Point Reves National Seashore further advances the economy of Marin and Sonoma Counties by allowing agricultural activity to be conducted on park lands and by allowing independent businesses such as kayak touring companies to operate within seashore boarders.

The seashore currently has 2,562 beef production animal units and 3,451 dairy animal units (AU). A non-organic beef cow translates to \$393 per AU, and an organic beef cow equals \$3,019 per AU. A non-organic dairy cow is worth \$1,450, and an organic dairy cow is worth \$3,356 per AU. According to Bay Area Economics, the park generates \$6.3 million in agricultural value.

As mentioned in the Management and Administration section of this business plan, the seashore issued 165 nonranch special use permits in Fiscal Year 2006. As part of these permits, the seashore issued 27 incidental business permits (IBP). Such business permits allow businesses and other organizations to use the seashore for private enterprise. The special park uses coordinator evaluates these permits for their relation to the mission of the seashore and their impact to Point Reyes National Seashore resources.

An example of an IBP is the seashore's kayak operators. In 2005 kayak operators generated \$230,768 of revenue according to the Bay Area economics report. These kayak operators benefit the seashore through their education about water safety and by allowing visitors to experience the seashore from the water, which is a significantly different experience than viewing the seashore from land. The seashore allows sea kayakers to camp along the Tomales Bay beach, which is a unique experience.

Other IBPs include bus tour groups, hiking treks, environmental education excursions, photography outings, American Indian interpretation, and other organizations that allow visitors to experience the seashore in different ways. While some of these IBPs are for profitable business and others are not-for-profit groups, both provide educational and inspirational experiences that promote the responsible use of the seashore.

#### **Point Reves National Seashore:** A Showcase of Sustainable Practices

Sustainability has been an integral part of America's national parks since the National Park Service was established in 1916. Point Reyes National Seashore was one of only 20 national park units selected to be a Center for Environmental Innovation in 2002 to showcase sustainable technologies in the National Park Service. This designation reinforced the seashore's commitment to be a place where research, development, visitor education, and appreciation of sustainable practices occur. Point Reyes National seashore strives to lead sustainable practices by procuring green products, purchasing post consumer recycled products, and providing environmental education to visitors and park partners.

The national seashore's commitment to sustainable practices can be found across divisions. The Interpretation Division produces all printed materials on recycled paper using soy-based ink; the Trails Branch uses biodegradable bar oil and two-cycle fuel in all chainsaws; and the sign shop uses recycled aluminum from previous signs for 30 percent of new signs. The seashore also uses green custodial products, recycled plastic lumber for deck treads and picnic tables, and recycled paper on a regular basis. Beyond using environmentally preferable materials, the Facilities Management Division ensures that sustainable design is incorporated into all projects. For example, unpaved roads areas are designed for proper drainage and erosion control using either crowned, in-sloped, or out-sloped construction, depending on the terrain. All design and engineering functions related to park planning are focused on energy and water conservation.

Point Reyes National Seashore has also embraced solar technology. In Fiscal Year 2006, the seashore's photovoltaic systems produced 24,295.9 total kilowatt hours. Eight compact solar generating power systems have been installed at high energyuse areas in the park. At four of these sites, the seashore has installed electric vehicle charging stations for visitor and staff use. These new systems generate energy, which reduces the seashore's outside energy needs, reduces air pollution, and contributes to mitigating future energy shortages.

In Fiscal Year 2005 the seashore secured a long-term loan of five Toyota RAV4-EV electric vehicles through partnerships with Toyota Motor Sales U.S.A., Inc., and the Department of Energy Clean Cities Program. In addition to the RAV4-EVs, the seashore

recently increased its fleet of alternate fuel vehicles by adding three hybrid gas-electric vehicles. Excluding six electric utility carts used to travel short distances, 11 percent of the seashore's fleet is comprised of alternative fuel vehicles.

Other sustainable facilities include a wash station where water is recycled through a three-phase filter system, recycling centers at campgrounds, parking lots, and offices with 90,000 pounds of recyclable material collected annually, and a reclaimed soil mycoremediation project for the bioremediation of hydrocarbons. The technique uses *mycelium*, the vegetative part of a fungus, to break down contaminants.

The seashore's commitment to sustainable practices includes the formation of a global climate change workgroup and an environmental management team. Members are committed to the goal of reducing the carbon footprint of Point Reyes National seashore through conservation, innovation, partnership, and leading by example. Future projects, such as the development of a frontcountry campground focused on responsible ecotourism, will continue to employ sustainable design practices.



Point Reves National Seashore plans to seek additional alternative fuel vehicles to improve energy efficiency. PHOTO BY DAVID MIYAKO

# BEAR VALLEY RESTROOM: A GREEN DEMONSTRATION PROJECT

The Facilities Management staff rehabilitated the Point Reyes Bear Valley restroom with green materials and practices at the forefront of design and construction. The national seashore identified four environmental goals for the project: energy efficiency, life cycle costs, environmental and air quality, and low operating and maintenance costs.

Durable materials are imperative in the seashore's corrosive marine environment. Some of the sustainable building practices and materials that were utilized include Forest Stewardship Council<sup>©</sup>-certified sustainable lumber, metal roofing, skylights, low water consumption urinals and toilets, Greenspec<sup>®</sup>-approved hand dryers, energy efficient and motion detected lighting, tile and countertops made of over 55 percent recycled materials, a roof-mounted 1-kilowatt photovoltaic system, and one solar hot water heating panel.



The Bear Valley restroom features two skylights to maximize use of ambient light and minimize artificial lighting. PHOTO BY DAVID MIYAKO

Tomales Point, PHOTO BY KRISTIN GILLISS



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Inside Back Cover: View From Arch Rock, PHOTO BY KRISTIN GILLISS

Back Cover: Illustration of Coast Miwok dancer, @EDWARD WILLIE

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### National Park Service Organic Act, 1916

"... to promote and regulate the use of the ... national parks ... which purpose is to conserve the scenery and the natural and historic objects and the wild life therein and to provide for the enjoyment of the same in such manner and by such means as will leave them unimpaired for the enjoyment of future generations."





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