



Archeology Program

National Park Service
U.S. Department of the Interior



December 2010 Archeology E-Gram

Rodman Cannon Mounted At Fort Jefferson, Dry Tortugas NP

Archeologists, conservators, engineers, boat builders, metal workers, park maintenance staff, and reservists from the 482nd Civil Engineers Squadron (CES) of the Homestead Air Reserve Base were part of a team of over 50 NPS employees, cooperators, contractors, and volunteers that mounted a Civil War era Rodman gun at Fort Jefferson on a reproduction carriage. The project, which started two years ago, was completed in November 2010, as part of the celebration of the 75th anniversary of Dry Tortugas NP.

Fort Jefferson, a key feature of the park, houses a nationally significant collection of 19th century seacoast artillery. Six of the 25 surviving 15-inch smoothbore Rodmans and 4 of the 13 surviving 10-inch rifled Parrott guns are part of the park's museum collection. In 1900, the fort's armaments – including these ten large guns – were sold as scrap. Fortunately, the guns were too heavy to be removed from the fort and were left behind, but the gun carriages, however, were scrapped. For over 100 years the cannons lay directly in the salty sand on the fort's terreplein, the level space behind the parapet of a rampart where guns are mounted. In addition to leading to corrosion and deterioration, the haphazard display of cannon on top of the fort did not contribute to visitors' understanding of the park's history and significance.

“The biggest challenge of this project was logistics,” said museum curator Nancy Russell. Dry Tortugas is located 70 miles west of Key West, in the Strait of Florida. Without road access, everything has to be brought in by boat. The fort's location prevented use of the most obvious tool for accomplishing the job – a crane. The gun's weight and other concerns precluded the use of a helicopter. Russell researched historic military manuals and used the historic methods and equipment as inspiration for modern versions which could safely do the same tasks.

Conservators Ron Harvey and Jonathan Taggart of Tuckerbrook Conservation worked with boat builders and metal fabricators to create modern cannon moving and lifting tools, and carried out the cannon conservation. The cannon was suspended in the air with a gun lift inspired by a ca. 1876 Rodman lift and a modification created by staff at Gulf Islands National Seashore. The carriage was assembled underneath the gun from pieces weighing up to 1,000 pounds that were carried by hand to the top of the fort.

NPS staff working on the mounting project included Russell, who envisioned and managed the project; archeologists from the NPS Southeast Archeological Center, who excavated and documented the remains of an original *in situ* Rodman gun platform; the captain and crew of the *MV Fort Jefferson*, who transported materials and equipment to the park; park maintenance staff who facilitated aspects of the project; and other staff members at Dry Tortugas and Everglades NP.

A new gun platform, a necessary prerequisite to mounting the gun on its carriage, was made by the 482nd CES. The 482nd has conducted training at the park since the 1970s but, due to other commitments, had not worked in the park since 2005. Russell worked with Colonel (ret.) Jerry Cheeseman to assemble a team of 17 active duty and retired reservists, with the retired reservists serving as trainers and mentors to the active duty personnel, a first in the squadron's history. The project's success led to a renewed commitment from Homestead Air Reserve Base to conduct training exercises at the park that assist the NPS with maintenance and preservation projects.

To learn more about Dry Tortugas NP, go to www.nps.gov/drto/index.htm.

Indigenous Cultural Landscapes, Trail Planning, and Land Conservation in the Chesapeake Bay

The Chesapeake Bay Program, a unique regional partnership that has led and directed the restoration of the Chesapeake Bay since 1983, called together a focus group of partners to refine the concept of indigenous cultural landscapes and begin an evaluation process for the Captain John Smith Chesapeake National Historic Trail.

The trail's management plan recognizes indigenous cultural landscapes as a crucial trail-related resource and the importance of these landscapes to Chesapeake land conservation efforts. It specifies that cultural landscapes along the trail be identified, protected, and highlighted for trail visitor opportunities. Archeological research can contribute to the identification of cultural landscapes.

Participants began clarifying this concept and its attributes, and initiating the participation of American Indian descendent communities and implementation of the concept in trail planning. NPS Associate Director for Cultural Resources Stephanie Toothman, and Northeast Region Ethnography Program Manager Chuck Smythe participated in the meeting, led by Chesapeake Bay Gateways Network superintendent John Maounis. Group members included representatives from Maryland DNR, Pennsylvania Bureau of Recreation and Conservation, Maryland SHPO, Virginia Council on Indians, Piscataway Indian Nation, Maryland Commission on Indian Affairs, and John Smith Trail's Advisory Council chair John Reynolds.

For more information about the Captain John Smith Chesapeake NHT, go to www.smithtrail.net. To read the comprehensive management plan for the trail, visit <http://parkplanning.nps.gov/cajo>.

For more information about the Federal strategy addressing President Obama's executive order for the protection and restoration of the Chesapeake Bay, visit <http://executiveorder.chesapeakebay.net>.

NPS Intermountain Region Offers Resource Advising Training

The NPS Intermountain Region is offering Resource Advisor training at two locations in 2011: February 28 – March 1 in Tucson, AZ; and June 29 – 30, Glacier NP, MT. The course provides participants with the framework to serve as Resource Advisors (READs) during emergency responses, including wildland fires and oil spills. READs work with incident commanders and park staff to minimize immediate and short-term adverse impacts resulting from either the incident itself or activities associated with managing the incident. READs are critical as the starting point for identifying needs related to the repair of fire suppression impacts, Burned Area Emergency Response (BAER) and Burned Area Rehabilitation (BAR).

This course will focus on wildland fire events; course content will be applicable to non-fire emergency responses. Topics will include a wide range of potential impacts of incidents, associated management actions, and suggestions for anticipating post-incident environmental conditions related to natural and cultural resource management.

There is no tuition for this course; home units must cover travel costs. All applications for the Tucson class must be received by COB January 7, 2011. All applications for the Glacier N.P. class must be received by COB April 15, 2011.

Contact: Lisa Hanson, NPS VPR-Fire, 12795 West Alameda Pkwy, Lakewood, CO 80228. Fax: 303-969-2037.

National Park Service's 2011 Archeological Prospection Workshop

The National Park Service's 2011 workshop on archeological prospection techniques entitled *Current Archeological Prospection Advances for Non-Destructive Investigations in the 21st Century* will be held May 23-27, 2011, at the Palo Alto Battlefield NHP, Brownsville, Texas. This will be the twenty-first year of the workshop dedicated to the use of geophysical, aerial photography, and other remote sensing methods as they apply to the identification, evaluation, conservation, and protection of archeological resources across this nation. The workshop will present lectures on the theory of operation, methodology, processing, and interpretation with on-hands use of the equipment in the field.

The field exercises will take place at the site of Fort Brown on the University of Texas at Brownsville and Texas Southmost College campuses in Brownsville. Co-sponsors for the workshop include the Palo Alto Battlefield NHP and the NPS Midwest Archeological Center.

Application forms are available at www.nps.gov/history/mwac.

Contact: Steven L. DeVore, Archeologist, NPS, Midwest Archeological Center, Federal Building, Room 474, 100 Centennial Mall North, Lincoln, Nebraska 68508-3873; tel: (402) 437-5392, ext. 141.

New *Conserve O Gram* technical leaflets

The NPS Museum Management Program has published several new *Conserve O Gram* technical leaflets on the following topics that may be of interest to archeologists: How To Select Gloves: An Overview For Collections Staff; Care and Identification of Objects Made from Plastic; Preparing and Storing Geological Drill Cores; and Digital Storage Media.

The *Conserve O Gram* series is geared to collections management staff. Leaflets cover a range of collections types, such as archives and manuscripts, ceramics, digital media, fine arts, furniture, leatherwork, natural history collections, photographs, and textiles. The COGs also address specific procedures, techniques and materials on preservation, security, fire and curatorial safety, agents of deterioration, packing and shipping, storage, and disaster preparedness.

The *Conserve O Gram* series and other NPS museum publications are available for free download at <http://www.nps.gov/history/museum/>

Student Loan Repayment Program Available to NPS Archeologists

Did you know that the NPS has the ability to assist archeologists with student loan repayment? Since 2001, the NPS has had the authority to help staff pay back student loans. The program is intended to help the NPS recruit or retain high-caliber employees. Overall last year, 36 Federal agencies provided 8,454 employees with a total of more than \$61.8 million.

Under the program, the NPS can pay up to \$10,000 for an employee in a calendar year for an aggregate maximum of \$60,000 for any one individual. In return, the employee must agree to remain in the NPS for at least three years. Loans must be outstanding and federally insured or guaranteed in order to qualify. Payments are made directly to the lender, and the employee is taxed on the payment amount.

The 2010 Federal government Employee Viewpoint Survey results shows that NPS employee satisfaction with pay and benefits is lower than the government-wide average; the Student Loan Repayment Program could help change this.

To learn more about the program and how it works, you can find the policy, application, and sample agreement at <http://inside.nps.gov/waso/custommenu.cfm?lv=3&prg=532&id=1243>.

Contact: Your local HR official or Jeffrey Davies in the Washington Office's Division of Labor and Employee Relations at (202) 354-1994.

From news report by Jennifer Treutelaar

Message from Editorial and Production Staff of *Archeology E-Gram*

For the past six years the *Archeology E-Gram* has provided timely and useful information about training, educational resources, research, and archeological events to archeologists in the NPS, other Federal agencies, and the wider archeological community. This year we welcomed our new Associate Director for Cultural Resources, Stephanie Toothman.

In 2010, we developed nine Projects in Parks reports, and continue to give you profiles of national monuments celebrating their centennials and, occasionally, reviews of Federal archeological publications. We encourage you to submit news items, training announcements, reports for Projects in Parks, report titles and summaries for "New Federal Publications," and suggestions about other topics or resources to feature.

We have thoroughly enjoyed working with everyone who contributed to the *Archeology E-Gram*. The production and editorial staff of the *Archeology E-Gram* wish you and your families all the best for the holidays and for the coming year.

Projects in Parks: List of 2010 PiP Reports

"Projects in Parks" was inaugurated in the *Archeology E-Gram* in July 2005. These reports are written by archeologists and help to bring archeology to the public and generate support for Federal archeology. E-Gram staff promote archeological park outreach by helping to develop ideas, edit text, and upload finished stories and images to the NPS Archeology Program website that parks can link to through their own webpages. To date, a total of 54 "Projects in Parks" reports have been presented through the *Archeology E-Gram*. To access the entire PiP List, go to <http://www.nps.gov/archeology/sites/npsites/index.htm>.

Congratulations and thanks to the authors who worked with us to bring information about NPS archeology projects to our readers during 2010!

Alaska Regional Office *Archeology in Alaska Park Science*

Alaska Park Science is a semi-annual journal that shares the results of research in Alaska's 15 national parks and preserves. The attractive crisp photos and straightforward text make the research accessible to the general reader, and communicates to the public the importance of the archeology that is conducted in the parks. Since the first volume was published in 2002, *Alaska Park Science* has published over 14 articles about archeology and prehistory in 10 parks.
by Karen Mudar, Archeology E-Gram editor

El Moro NM *Before the Signatures: A New Coronado Site at the El Morro NM*

Engravings along the base of El Morro National Monument's Inscription Rock range from prehistoric petroglyphs to the earliest known European inscription, Don Juan de

Oñate's engraved memorial, dated 1605. Dramatic new evidence — a range of metal artifacts — has emerged linking El Morro with the earliest major Spanish *entrada* in the desert Southwest – the 1540-1542 expedition of Capitan General Francisco Vázquez de Coronado.

by *Clay Mathers, Executive Director, The Coronado Institute, Albuquerque, NM, and Charles Haecker, Archeologist, NPS – Heritage Partnerships Program, Santa Fe, NM*

Hot Springs NP **Revelation in the Woods: Undocumented Cemeteries in Hot Springs National Park**

In 2009, Midwest Archeological Center archeologists inventoried two abandoned cemeteries in the wooded backcountry of Hot Springs NP. The smaller cemetery contains 27 internments marked by field stones and depressions. Genealogical research suggests that this was an African American cemetery. Comparison of data for it and the larger Euroamerican cemetery show significant physical and cultural differences.

by *William J. Hunt, Jr., Archeologist, Midwest Archeological Center*

Isle Royale NP **NPS Investigates Sunken Ships in Isle Royale NP**

At least 10 wrecks of large ships, dating from 1870s to the 1950s, lie within the boundaries of Isle Royale NP. These sites comprise one of the most intact collections of shipwrecks in the National Park System. Preserved by the cold, fresh waters of Lake Superior, shipwrecks and submerged terrestrial sites offer amazing insights into Great Lakes shipping, commercial fishing, and the early settlement of Isle Royale.

by *Karen Mudar, Archeology E-Gram Editor and Dave Conlin, Chief, Submerged Resources Center*

Mesa Verde NP **Tree Ring Dating at Mesa Verde National Park**

Tree-ring dating, or dendrochronology, has been an integral part of archeological research at Mesa Verde NP since 1923, when members of the National Geographic Society's First Beam Expedition collected samples from Cliff Palace, Spruce Tree House, and other sites. The full dendrochronological potential of the park, however, has not yet been tapped.

by *Stephen E. Nash, the Denver Museum of Nature & Science*

Mesa Verde NP **An Ancestral Puebloan Community in Morefield Canyon**

Archeological studies of the formation of large pueblo villages in Mesa Verde NP suggest that populations moved from dispersed homesteads and hamlets into larger aggregated communities. Researchers found evidence that public architecture and infrastructure had the potential to greatly enhance the agricultural productivity and population carrying capacity in one area of the park, Morefield Canyon, sowing the seeds for the later massive cliff dwellings that give Mesa Verde its fame.

by *Charles Reed, Ryan Lash, and R. Kyle Bocinsky*

Midwest Archeology Center **Exploring the Fire and Archeology Interface**

The Midwest Archeological Center (MWAC) worked with Midwest Region Fire Program to design and carry out experiments to collect information about the effects of fire on various classes of archeological materials. The goals of this project were to

assess the fire/archeology interface to provide managers of Midwestern parks with information that will aid in decision-making concerning the stewardship of archeological and natural resources.

by *Jay Sturtevant Midwest Archeological Center*

Timucuan
Ecological and
Historic Preserve

The Ceramics from the Kingsley Plantation Slave Quarters

A four-year archeological exploration of Timucuan Ecological and Historic Preserve's Kingsley Plantation focuses on the slave quarters from the early nineteenth-century. This analysis of the ceramics assemblage compared to that of the archetypal antebellum plantation of Cannon's Point Plantation, GA is a fundamental first step to interpreting the role of material objects in the slaves' daily lives.

by *Karen E. McIlvoy, University of Florida*

Valley Forge
NHP

Meeting at Headquarters: Public Archeology at Valley Forge

One of the primary destinations for visitors to Valley Forge National Historical Park is the modest stone house that served as General George Washington's Headquarters during the Revolutionary War winter encampment of 1777-1778. In 2009, Washington's Headquarters was re-opened following a series of repairs and renovations that provided the perfect opportunity to gather significant archeological data in a manner that was highly visible to park visitors.

by *Joseph R. Blondino, Temple University*

Projects in Parks is a feature of the *Archeology E-Gram* that informs others about archeology-related projects in national parks. The full reports are available on the *Research in the Parks* web page www.nps.gov/archeology/sites/npSites/index.htm or through individual issues of the *Archeology E-Gram*. Prospective authors should review information about submitting photographs on the *Projects in Parks* web page on InsideNPS.

Archeology E-Gram, distributed via e-mail on a regular basis, includes announcements about news, new publications, training opportunities, national and regional meetings, and other important goings-on related to public archeology in the NPS and other public agencies. Recipients are encouraged to forward *Archeology E-Grams* to colleagues and relevant mailing lists. The *Archeology E-Gram* is available on the *News and Links* page www.nps.gov/archeology/public/news.htm on the NPS Archeology Program web site.

Contact: Karen Mudar at dca@nps.gov to contribute news items, stories for *Projects in Parks*, submit citations and a brief abstract for your peer-reviewed publications, and to subscribe.