



NCRI Report

NCRI Archaeologists Study Lava Beds and Crater Lake National Parks

Northwest Cultural Resources Institute (NCRI) archaeologists provided expertise to Crater Lake and Lava Beds this summer while giving valuable on-the-job experience to graduate students at Portland State University. The team included Dr. Doug Wilson, Dr. Robert Cromwell, Jacqueline Cheung, and Eric Gleason.

Given the obvious links between Vancouver and the Modoc War as well as the Fort Klamath military wagon road, Superintendent Tracy Fortmann generously provided funding from Fort Vancouver National Historic Site to cover Wilson's and Cromwell's salaries. Funding also allowed the participation of two Portland State University graduate students, Meris Mullaley and Stephanie Simmons. This greatly facilitated the project while exposing the students to the interesting and unique archaeology of Lava Beds and Crater Lake National Parks.

At Lava Beds the team used metal detectors to augment a pedestrian survey to search for artifacts and features related to the battle.

The Thomas-Wright battlefield was an excellent test case to determine if battlefield archaeology is appropriate for the Modoc War sites within the park. It was a fairly small, but deadly engagement. The battle was very one-sided with 23 killed and 19 wounded on the U.S. side



Fortification from the Modoc War era (1872-73) at Lava Beds (left) and Bob Cromwell resting on a ridge above Crater Lake (right).

and no casualties on the Modoc side. It is also a poorly understood battle and therefore ideal for the application of battlefield archaeology techniques. The team's pilot study at Thomas-Wright Battlefield confirmed that archaeological techniques applied to the battlefields at Lava Beds will yield valuable data that can be used to confirm and assess the historical record of the battles.

Work at Crater Lake consisted mainly of site condition assessments and some resurvey of the Fort Klamath wagon road.

The team identified two new sections of the military wagon road. A number of isolated

artifacts related to the trail were located, including tobacco tins, an oval keywound meat tin, a ca. 1930 tire, a "Viriden's Campfire" bottle, and a large amethyst colored bottle. An extensive quarry site was also found. A cursory inspection of the dump area identified hotelware china and a variety of cans, bottles and other debris. The team also worked closely with ethnographer Doug Duer.

Both of these projects allowed the NCRI to provide assistance to other parks and work with partners at Portland State University to provide valuable work and educational experience to graduate students.

Trace-Element Analysis of Ceramics from the Staffordshire Potteries

by Heidi Pierson, NPS Museum Technician

Transferprinted ceramics are an abundant artifact at Fort Vancouver. Ceramic sherds with identifiable patterns or maker's marks can help determine date of occupation, identify country of origin and possibly even determine the relationship between consumer choice behavior and goods consumption. On the other hand, undecorated and unmarked ceramic fragments are merely sorted by type (earthenware, porcelain, ironstone), functionally identified (if possible), and counted.

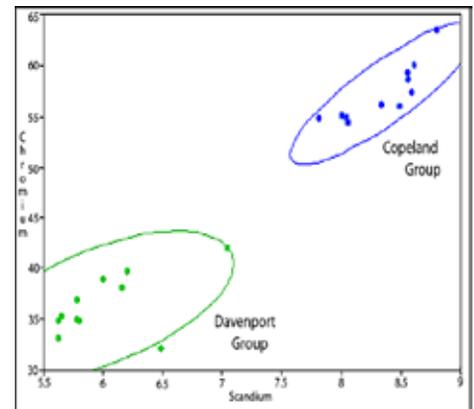
Oregon State University (OSU) graduate student Jessica Hale hopes the use of trace-element analysis will help to determine the origin of

unidentified sherds. She subjected one hundred and seventy four ceramic fragments attributed to six known British ceramic manufacturers to paste compositional analysis at the OSU TRIGA research reactor.

Jessica also conducted archival research, funded by Applied Archaeological Research, at Stoke-on-Trent, England. She came across pottery paste formulas, and it was evident that many companies were experimenting with their paste recipes—the successful ones were a closely guarded secret.

The results of this project have the potential to offer alternative analysis options for historical archaeologists working with post-industrial ceramics. Jessica's work could form the basis of a ceramic trace-element database, hopefully to be used by researchers all over the world.

The following figure shows how distinctive the relative concentrations of chromium and scandium are in the Copeland/Spode and Davenport groups, and illuminates the potential for this type of analysis.



Bivariate scatter plot of Sc and Cr showing that the Davenport and Copeland groups are very distinct from one another. All concentrations are shown in parts per million (ppm).

Historical Fragment

In 1947, National Park Service archaeologist Louis Caywood was tasked with discovering the site of the Hudson's Bay Company's Fort Vancouver. Above-ground traces of the fur trading post's original location had been obliterated by fire and consequent construction. Using old maps and other documentation, Caywood began the arduous task of locating buried footings, sills, and other surviving architectural features. This excerpt from his field journal records the defining moment when Fort Vancouver resurfaced after almost one hundred years.

9/17/47 - Started excavation with 3 laborers sent by Franzwa. Made two trenches in NW area. No walls or evidence found.

9/18/47 - Neasham and I shifted crew to SE corner where considerable iron showed on surface. Trenched here and found traces of building. Possibly Iron Store.

9/19/47 - Think we worked out north and south boundaries of stockade. Located powder magazine and one storeroom area where beads are plentiful. Last day for Neasham.

NCRI Director's Letter

What is past is prologue. Those of you who have visited the research area of the National Archives in Washington D.C. probably remember this classic quote from Shakespeare's *The Tempest*, engraved on the base of "The Future" statue that flanks the entrance to the research area. In early November, I had the pleasure of doing research in the archives for the first time. For the past several years, as part of the field school, we have tested portions of the Vancouver Arsenal, erected just prior to the Civil War and utilized up until the 1880s. The Arsenal produced cartridges during the Civil War and conflicts with American Indians. Previous work has produced many diverse artifacts from the Arsenal, which was a substantial part of the U.S. military's Fort Vancouver/Vancouver Barracks post. The Arsenal sat on the east side of the park about at the location of the Visitor Center and National Park Headquarters buildings. The Visitor Center renovation is the impetus for exploring this poorly-known area, as the designs are likely to impact a portion of the site.

It was a pleasure to pour over the old letters sent to the Chief of Ordnance from the Ordnance Officers who commanded the Depot and Arsenal, starting with Joshua W. Sill. As I sat in the quiet research room of the archives, I became both intellectually and emotionally engrossed with the story. This young lieutenant, who struggled with General Harney, the Commander of the Post at the time, would serve a few years later under his friend Philip Sheridan during the Civil War, and die as a Brigadier General, leading his troops in the Battle of Stone's River. The documentary story is continuing to be explored by our Historian Greg Shine and the archaeology will be synthesized by Archaeologist Bob Cromwell. My hope is that the two lines of evidence, archaeology and history, will shed a new and synthetic light on this dimly known part of the park. I feel sure that we will provide new insights on these important Civil War leaders during their formative period and tie it to this very special place.

Doug Wilson

Archaeology South of State Route 14

by Alex Gall, Owner, Archaeological Services of Clark County (ASCC)

Archaeological data recovery was carried out by ASCC in October 2006 at a portion of the historical Hudson's Bay Company Kanaka Village site. The archaeological investigations were triggered by the construction of the Landbridge over State Route 14 (SR 14), connecting the Columbia River water front with Fort Vancouver National Historic Site.

The archaeology yielded two primary conclusions. The upper deposits were thoroughly mixed, and characterized by historic artifacts representative of every era of Fort Vancouver's occupation. Further, the upper deposits showed evidence of repeated major episodes of ground disturbance likely beginning in the mid-19th century and increasing in scope during the early part of the 20th century. This upper deposit also contains prehistoric artifacts related to pre-contact human occupation. Beneath these mixed deposits there exists a truncated remnant of a



Embossed pipe fragment showing ivy stem decoration, recovered from Level 3, Unit 1s 2w.

seemingly intact prehistoric site.

Charcoal samples taken from the prehistoric component and submitted for radio-carbon analysis resulted in an age range of 590 to 960 years before present. Sample 1 was taken from Unit 1s 17w, Level 5. This represented the transition zone from the mixed upper deposits to the intact lower deposits and was considered the top of the intact prehistoric deposit. The date for the charcoal sample

collected from this level was 590 +/- 40 years BP (ca. 1400 AD). Sample 2 was taken from Unit 1s 18w, Level 5.

Sample 2 was only slightly deeper than Sample 1; however, due to the west-trending up-slope of the subsoil transition, it represents the middle of the intact stratum. The date for the charcoal sample collected from this provenience was 640 +/- 40 BP (ca. 1360 AD).

Sample 3 was taken from Unit 1s 17w, Level 6. The elevation of this sample represented the bottom of the intact stratum. The date for this provenience was 960 +/- 40 (ca. 1040AD).

The deeper, intact prehistoric component has the potential to yield new and important information regarding the prehistoric inhabitants of the project area and, as such, should be considered a significant cultural resource. The landbridge will not adversely affect these deposits.



National Park Service
U.S. Department of the Interior

The Vancouver National Historic Reserve is a partnership of the National Park Service, the City of Vancouver, the State of Washington, and the U.S. Army. It includes Fort Vancouver and its village, Vancouver Barracks and Officer's Row, Pearson Field and Air Museum, portions of the Columbia River waterfront, the Water Resources Education Center, and the McLoughlin House unit in Oregon City, Oregon.

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The National Park Service cares for the special places saved by the American people so that all may experience our heritage.

Under the Microscope: John Edwards

John Edwards is originally from Buckeye, Arizona and got his degree in entomology from the University of Arizona. John spent 33 years working for the U.S. Department of Agriculture (USDA) Bee Lab in Tucson. One of his duties for the USDA was to survey southwest of Arizona for Africanized bees, otherwise known as killer bees, and yes, they are scary!

John has been a photographer since the age of eleven. During his career he photographed many insects, honing his close-up photography skills. John moved to the Portland/Vancouver area to work on insect pheromone research, mainly for the creation of insect traps. Apparently, he and his wife (an orchestra teacher) moved here for the weather!

John Edwards has been volunteering here at Fort Vancouver for the past three years. He started working at the site photographing the costume collection for our catalog system. It was through costume director Eileen Trestain that John came to work for the NCRI. He has been using his skills to photograph some of our artifacts. His photography is also being used for the 2008 Museum Collection Calendar and some of our upcoming anniversary publications. You can see some of his photos in this edition of the NCRI Report on pages 4 and 5.



Announcements

Curator **Tessa Langford** recently joined a team of National Park Service curators to write a Museum Management Plan for the McLoughlin House unit of Fort Vancouver National Historic Site. The plan—which addresses such issues as documentation, security, and collections use—will guide museum operations at the site for the next 5-7 years.

The costume program at Fort Vancouver, coordinated by **Eileen Trestain**, recently received a grant from the Clark County Historical Promotion Grant Program in the amount of \$19,690. The grant will fund the purchase of reproduction military and civilian clothing from four key periods in the history of Vancouver Barracks, in time for interpretive events celebrating the post's 160th anniversary in 2009.

Lab Director **Martin Adams**—a graduate student at Portland State University—won an Outstanding Research medal and a monetary award for his poster *Late Pleistocene and Holocene Climate Change Reconstructed from a Willamette Valley Fossil Beetle Assemblage*, at the annual meeting for Sigma-Xi, the international science honor society.



Martin contemplates his new medal.

Park Turns Sixty Years Old

by Tessa Langford, NPS Curator

This year is a very special one for Fort Vancouver National Historic site, because in 2008 we celebrate 60 years as a unit of the National Park System. In honor of the occasion we are producing several publications, including a calendar featuring our nationally significant museum collection. We curate over two million artifacts here, representing the Native American, fur trade and military periods of the area, as well as several thousand historic items. These authentic pieces of the past are the site's primary resource and greatly inform our education programs.

The calendar highlights 24 objects in all, some of the most memorable from the collection. Several of the photographs are shown here, all of which were taken by John Edwards, our amazing volunteer featured on page 2. We hope you will join us as we celebrate 60 years—stay tuned for more information!



This handpainted Japanese porcelain teapot was used by a military family at Vancouver Barracks, and dates to circa 1890.



This shell brooch was recovered from a Vancouver Barracks privy.



John McLoughlin, longtime Chief Factor of Fort Vancouver, was made a Knight of the Order of St. Gregory to recognize his service to the Roman Catholic Church. This insignia was reportedly his most treasured possession.



Many projectile points like these have been found in the fort's village area.

Current Research

Dr. Kate Duncan

A Professor of Art History at Arizona State University, Dr. Duncan is completing a beadwork study for Fort Vancouver. The report will provide an overview of beadwork traditions associated with cultural groups historically at Fort Vancouver, make a critical judgment about which of those traditions could have traveled to the post, and discuss techniques and materials. She will also be including images of finished pieces the park could consider replicating for interpretive use.

Greg Shine

The Columbian newspaper published a series of articles Greg wrote on the history of holiday celebrations at Fort Vancouver. Building on a study compiled last year by WSU-V public history intern Keri Conway, Greg added several accounts, including that of Dr. McLoughlin's conversion to Catholicism on Christmas Eve of 1842. For those who think shopping during the holiday season is a relatively new tradition, think again: Greg found a description of HBC employees and their families passing the day "shopping and strolling through the town" of Oregon City in December of 1849. The study is available on the park website.

Greg also recently traveled to San Diego to give a presentation at the International Maritime Heritage Conference. No stuffy conference room for the presentations, though! Greg gave his talk in the main hold of the *Star of India*, the world's oldest active ship and a national historic landmark. Greg recounts, "It was a thrilling and novel way to talk about the history of the British and American naval vessels at Fort Vancouver, and the site, sound, smell, and motion effects could not have been scripted any better. What a setting!"

Kristin Converse

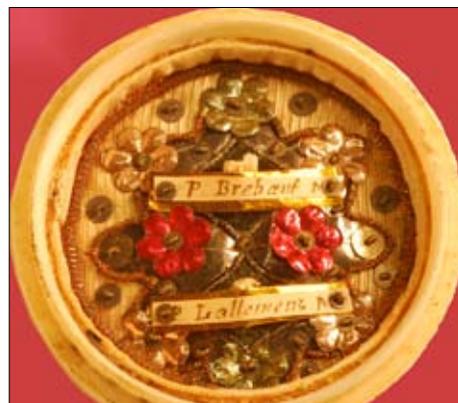
Kristin, a graduate student from Sonoma State University, is working at the Oregon State University TRIGA facility to do trace-element analysis on brick from the Fort Vancouver collection. This preliminary research will be used to provide a baseline for future analyses of brick from Fort Vancouver and the Willamette Valley, and hopefully create a database with which the source of unidentified brick could be easily determined.

Material Culture Notes: Religious Items

by Tessa Langford, NPS Curator

Similar to the differences in their cultural backgrounds, the employees of Fort Vancouver had diverse religious beliefs. Though company officers were sometimes Protestant or Anglican, the majority of working class employees were Roman Catholic. Others were Methodist or maintained native animistic beliefs. The first clergyman to come to the post was an Anglican, the Reverend Beaver. Despite having a very appropriate name for work in the fur trade, he and his wife continually crossed Chief Factor John McLoughlin and left amidst complaints on both sides.

In response to a plea from many of the fort's employees, Catholic missionaries came in 1839. Fathers Blanchet and Demers first held services in a small chapel inside the fort, but later established St. James Mission on a tract of land just to the northwest. Once the priests were joined by Mother Joseph and the Sisters of Providence, the complex grew to include an orphanage, school, asylum, hospital, and many support buildings.



Relics given to John McLoughlin in appreciation of his service to the Roman Catholic Church.



Crucifix (right) and rosary (below) recovered during archaeological excavations

In the 1840s, William Kaulehelehe and his wife were brought to Fort Vancouver to serve as teachers for the growing Hawaiian population. Though he was not ordained, William became a spiritual guide for his fellow islanders. Other individuals stopped at the post before moving on to establish missions in outlying areas, including Marcus and Narcissa Whitman, Henry and Eliza Spalding, and Jason Lee.

In the museum collection, it is the Catholicism, so widespread among the employees and the religion to which John McLoughlin converted, that is best represented. Some of the items recovered during archaeological excavations include rosaries, crucifixes, and medals. Among the historic objects that were donated to the park are heirlooms of the McLoughlin family: a diploma and insignia of the Order of St. Gregory, bestowed on John McLoughlin by the Pope, relics from two martyred priests, Jean de Brébeuf and Gabrielle Lallemand, and a mother-of-pearl crucifix belonging to his wife Margeurite.



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A partner in the
Vancouver National Historic Reserve

EXPERIENCE YOUR AMERICA

The Northwest Cultural Resources Institute

is a cooperative partnership based at Fort Vancouver National Historic Site, dedicated to fostering cultural resources research, education, and stewardship in the Pacific Northwest. The NCRI brings together National Park Service staff, university professors, and subject matter experts to facilitate research and training, provide expertise, and support other innovative educational endeavors using national parks as laboratories.

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Heidi Pierson

Archaeological Technicians

Eric Gleason, Jacqueline Cheung,
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MYSTERY ARTIFACT

This issue's mystery artifact is from our historic collection. It measures about 4 inches in length and is 1 inch wide at its widest.

The mystery artifact in the last issue was a Quartermaster's Depot-issue gravy boat.

