Glass Beads and the African Past

By Peter Robertshaw

In the 1990s I conducted archaeological fieldwork in western Uganda with the goal of trying to understand how the precolonial kingdoms encountered by European travelers in the 19th century developed. One site I excavated had major earthworks surrounding a hill, on top of which were several features, including burials. In most burials, I found small numbers of glass beads, dating from about the 10th century A.D. onwards. I knew that glass and glass beads were not locally made, but imported to Africa from other parts of the world. Their presence in the burials indicated that the deceased were probably high-status individuals.

Intrigued, I wondered where the glass itself had been manufactured. Library research revealed that glass-making centers in different parts of the world often used different recipes to make glass and that their ingredients incorporated minor and trace elements of chemicals present in the local geology. Moreover, many samples of glass, particularly from the Middle East and Europe, dating to the same period as the Ugandan burials had been chemically analyzed and their results published. Fortuitously, just as I was about to embark on getting the Ugandan beads analyzed, the use of lasers linked to a mass spectrometer was becoming a standard analytical technique; the great advantages of this were that it was cheap and left only a microscopic scar on the bead. Thus inspired, I embarked on a much larger project – to analyze beads from all over Africa and dating between about A.D. 800 and 1500 in order to discover where the glass was manufactured and thereby reconstruct changing patterns of trade to and from Africa.

I now have chemical data on the composition of about 1,000 beads from Africa, thanks to grants from the National Science Foundation and CSUSB. These have revealed some surprises; for example, the main ingredient in many beads from a Moroccan site was lead, perhaps not the healthiest of jewelry to wear next to the skin. Some of the glass found in Uganda was made in India, which was the major source of beads found south of the Sahara from about A.D. 1000 onwards. Prior to that much of the glass that came to Africa was probably made in Iran, with very similar beads being found both in West Africa and at the southern end of the continent.

Farewell to Jim Pierson

All our alumni, students, staff and faculty thank Jim profusely for almost 40 years of service to Anthropology at CSUSB. We wish Jim (and his wife, Grace) a long, healthy and happy retirement!

Keep in touch, Jim!
**Anthropology Alumna Elected to Hall of Fame**

Sally Rivera, B.A. 1973, was among the inaugural class of the College of Social and Behavioral Sciences’ Hall of Fame. Sally is a retired higher education professional who also continues to be deeply involved in many activities as a leader of the Hispanic community in the Inland Empire. Sally was joined in the inaugural class by another anthropologist, Dr. Yolanda Moses, who earned a B.A. in sociology at CSUSB in 1968, prior to the founding of our anthropology department. Yolanda is a past-president of the American Anthropological Association and now serves as an associate vice chancellor at UC Riverside.

Jennifer Richards, anthropology major, wrote a book review, “Haunting the Korean Diaspora: Shame, secrecy, and the forgotten war,” which has been accepted for publication in the Journal of Contemporary Asia. She has also received an unconditional offer of acceptance into the master of arts program for archaeology at Durham University in the United Kingdom.

Collette Carnes, B.A. sociology 2007 & anthropology minor, has been working as at Loma Linda University Hospital. She was recently accepted into the nursing program at Marymount University, Washington, D.C.

Brandon Fryman, B.A. 2008, is a student in the master’s program in applied anthropology at Cal State Long Beach. After graduation from CSUSB, he spent time in Uganda, working with, and helping.

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20 different orphan-headed families. He is focusing his studies on development in East Africa, concentrating on clean water, disease, NGOs, infrastructure and sustainable living.

Colin M Tansey, B.A. 2001, has written a thesis “Anti-Radicalization Efforts Within the European Union: Spanish and Danish” for the Naval Postgraduate School. He is a captain in the United States Army.

Fernando Ocampo, B.A. 2005, completed his Ph.D. coursework at the University at Albany in May 2009 and returned home to San Bernardino to complete his thesis proposal. He has spent the last three years translating late colonial Nahuatl (Aztec) Passion play texts. Last April, Fernando had the opportunity to conduct research in Mexico City. His dissertation research is geared toward an in-depth analysis of the extant body of colonial Nahuatl Passion play dramas and their significance in Nahua Christianity.

Linda Stockham, B.A. 1975 and M.A. special major 1987, former secretary for the departments of anthropology and geography/environmental studies who lives in West Virginia, will have her latest play – “Do Pigeons Cry?” – performed as a radio production by Shoestring Radio Theatre of San Francisco. It will air in 2010 on KUSF Radio, Lighthouse for the Blind, at their Web site, and the Public Radio Satellite System. In addition, Linda’s play, “Divorce Sale,” is to be produced as a Senior Show by the Mingus Union High School in Cottonwood, Ariz., in the spring of 2010. This play was first produced off-off-

Corey Ragsdale, B.A. 2009, is a student in the biological anthropology Ph.D. program at the University of New Mexico. He is working on several forensic research projects (such as facial reconstruction) and is studying a Moravian cemetery sample from the Czech Republic, looking for population admixture in what is thought to be a highly homogenous population.

Alyse Romero, anthropology major, participated in an archaeological field school last summer at the Eco Museo de Cap de Cavalleria in Menorca, Spain. With fellow students she excavated the Roman city of Saniser (dated 123 B.C. to 550 A.D.). During excavation she worked in a room that she believed was an animal enclosure due to the large amount of animal bone that was found. She also discovered a Roman coin dated approximately 500 A.D. Alyse says, “Overall it was a great experience and I also did some traveling throughout Europe before and after my course!”

News from the Laboratory for Ancient Materials Analysis

LAMA has analyzed a fascinating array of materials this last year in collaboration with colleagues in Mexico, France and England.

Chemical analyses of the adhesives from two important Classic Mayan funerary masks found both of them to consist of beeswax. This is interesting since museum curators usually consider beeswax to be used as a modern repair material on ancient artifacts; we now know that it was used anciently as a primary adhesive.

We have also been invited to join an international project to analyze three large Aztec idols made of some kind of resin and perhaps other materials – it’s our job to find out exactly what they used.

We also have been sent more samples from the lively Templo Mayor excavations in Mexico City: gooey adhesives from ceremonial knives and mosaic earspools.
The last year has been a busy one for The Anthropology Museum, both in terms of exhibits and donations. All of the activities listed below have been assisted and enriched by involvement of various students and alumni volunteers.

Handwriting, the exhibit on all aspects of writing, finished its run and was replaced in October of 2009 with The Ottoman Worldview: Piri Reis to Katip Celebi, an exhibit of Turkish maps from the 14th through 17th centuries. Prepared by the Civilization Studies Center at Bahcesehir University in Istanbul, Turkey, this traveling exhibit made its debut and only West Coast appearance at The Anthropology Museum. Later, its other North American showings were at the New York Public Library and Georgetown University; after that, it has a schedule including Paris, Rome, and Djarkarta. The exhibit presented high-quality reproductions of rare Turkish maps that have never been on public view before. These maps show the influence of European Renaissance ideas on Turkish cartography, shifting the emphasis from showing an elegant, geometrically-perfect model of the world to showing a representation of the real world with its irregularities. The exhibit was very well received with a high-profile reception for dignitaries from Turkey and the United States. The Ottoman Worldview was facilitated by the assistance of CSUSB’s Center for Islamic and Middle Eastern Studies.

In March 2010, Enduring Change: The Stuart Ellins Collection of Contemporary Native North American Art opened at The Anthropology Museum. This exhibit focuses on 20th century Native art from the American Southwest, including ceramic sculptures, sand paintings, jewelry, kachina dolls, musical instruments, and other classes of art. By the late 19th century, most Native Americans in the Southwest had abandoned traditional arts and crafts with a few exceptions, finding it more convenient to purchase necessary items from trading posts. With the coming of the railroads and the rise of tourism, however, the demand for Native art grew, and revivals took place. Some of this art is reinterpretation of traditional forms for selling to outsiders, some is brand-new in conception. Co-curated by Russell Barber (professor of anthropology and museum director) and Perry Kroh (anthropology major, class of 2010), this exhibit will remain open through at least the fall of 2010.

Finally, the museum was donated a major collection of prehistoric and early 20th century pottery from the Four Corners district of the Southwest. The Webb Collection had been part of the Webb Museum in Claremont, but its mission is paleontology, and these items were given to The Anthropology Museum last fall, with the generous permission of the descendants of the original donors. The collection includes a variety of ceramic forms, many from the Navajo, some from the Anasazi, and a few from other groups, as well.
Between jobs, family, mid-terms and research papers, ALPACA members still find time to hang out and enjoy the local culture. Schedules have been hectic as many are going through the daunting process of applying for grad school, while others are applying for summer internships.

At the beginning of the fall quarter, the annual Pow-Wow at CSUSB brought together old and new club members to enjoy Native American dance, music, food and arts and crafts. Since many club members went to field school this past summer, our next event was a night of pizza, soda and sharing field school experiences. We looked at pictures from Bulgaria, Spain, Peru and Poland while each student shared the ups and downs of attending an archaeological dig in a foreign country. In November, CSUSB’s Anthropology Museum was honored to be the first to host the traveling exhibit of seventeenth-century Turkish cartographer, Kâtip Çelebi. Though replicas, these maps have never been viewed outside of Turkey, so this was a real treat. Many volunteers helped set up the exhibit with Dr. Barber and the visiting Turkish museum designers from Bahçeşehir University.

Our final excursion was a cabin trip up to Big Bear. It was a relaxing weekend filled with movies, hiking and a visit to an excavation site. We also got to experience Oktoberfest where ex-president Natalie Kahn and new president Alyse Romero tested their strength in a log sawing contest. Sadly, they lost, but they gave it a good fight.

The winter quarter began with an ethnic dinner night at Casa Maya in Mentone featuring the foods of the Yucatan. In March we had 15 club members signed up to participate in the Walk and Roll: a three-mile walk to help raise scholarship funds for the College of Social and Behavioral Sciences. On March 1 we attended the much anticipated unveiling of the Stuart Ellins Collection of Contemporary Native North American Art, in our Anthropology Museum. Many of us helped Dr. Barber and co-curator Perry Kroh in setting up the exhibit. Also in the works for this quarter is a visit to the Riverside Metropolitan Museum to see the new exhibit, “Adornment,” which features the history of self-expression whether it be clothing, jewelry, hairstyle, surgical enhancement, branding or tattooing. Plans for the spring quarter include: a trip to San Diego’s Museum of Man, a vivid cultural experience in Thai Town for Thai New Year in April, The Malki Museum Agave Roast in Banning and an ethnic dinner night at Banig Filipino Restaurant in Moreno Valley for an end of the year celebration.
Russell Barber

As usual in the last few years, I have been occupied primarily with museum activities. I traveled to Istanbul last summer to facilitate the loan of The Ottoman Worldview exhibit, arranged for the Turkish team to mount the exhibit, and handled the myriad details that surrounded that project. With the assistance of Perry Kroh (class of 2010), I designed and mounted the Enduring Change exhibit. And finally, I found time for a bit of academic work: finishing an article on numerical place names in California for submission to Names: The Journal of the Onomastics Society and working further on the second edition of my Doing Historical Archaeology.

Kathy Nadeau

I have been working with a group of Filipino American alumni to form a Filipino American Community Partnership Council. While still very new, we already have formed an executive board with a clear mission statement. As part of our mission, board members plan to form a big brother and big sister like relationship with the students in the Filipino Student Organization (Lubos P.A.S.O.) in support of their cultural and educational activities. Lubos P.A.S.O. will hold the annual Celebration of Filipino Culture (CPC) at the Sturges Center in San Bernardino, tentatively, on Saturday, May 8, 2010. Please e-mail knadeau@csusb.edu if you are interested in attending. CPC has become a rite of passage for the Filipino youth culture, and evokes great pride in the community. It celebrates cultural identity through dance and a musical theatrical performance and is open to the general public.

Also, as one of two co-editors, I have been working on the Asian American Folklore and Folk Life Encyclopedia to be published by Greenwood Press. We enter the production stage later this spring and the encyclopedia should be out at the end of this year. Three articles I wrote last year on Marxist Anthropology, Peasant Societies and Ideology and Anthropology will appear this year in the 21st Century Anthropology Reference Research Handbook, published by Sage Publications.

Frannie Berdan

During this past year I continued to write the seemingly endless book, Aztec Archaeology and Ethnohistory, for Cambridge University Press. In connection with that project, I worked in the store-rooms of the Field Museum in Chicago and the Smithsonian Institution in Washington, D.C., examining, documenting and photographing a truly fascinating array of Aztec objects. These ranged from goblets for drinking pulque and chocolate (both surprisingly large!) to thin copper axes used for money to magnificent mosaics of turquoise and shells. Research on these turquoise mosaics has led to a larger project that will continue for the next year at least. In December, I was invited to present a paper on "Turquoise in the Aztec Imperial World" at a British Museum conference. I also presented a paper, "Featherworking in the Aztec Provinces" in a symposium at the annual meeting of the Society for American Archaeology in Atlanta, where I also served as a discussant for a symposium on "Recent Investigations on the Sacred Precinct of Tenochtitlan." I continue close research ties with the Templo Mayor project in Mexico City (see section on LAMA). Three articles saw the light of day this past year, two on the Aztec ruler Mo-tecuilhoma, and one on the ancient use of orchids as adhesives (co-authored with two former CSUSB students, Jeff Sahagún and Ed Stark).

Anne Bennett

In the past year, I started a new research project that focuses on Arab-Americans in the Inland Empire. I received a grant from our college to initiate my research in summer 2009. The current focus of this new research is on "heritage learners" of Arabic – that is, students with Arab heritage but whose native language is English. CSUSB has been steadily expanding its Arabic program in the past several years, including offering a summer intensive Arabic language institute, which is proving to be a very rich field site. I have thus officially dusted off my ethnographic toolkit and started doing "participant observation" again. I also have a chapter coming out in June 2010 in 21st Century Anthropology: A Reference Handbook, published by SAGE. The chapter, "Women in Anthropology, Linguistic Anthropology, and Middle East Anthropology," traces the history of women practitioners in the discipline as well as the changing trends of their scholarly contributions to the discipline.

Wes Niewoechner

Last year, I presented my research on Neandertal and modern human finger bones at the Paleoanthropology Society meetings in Chicago. This research was spurred by the recent discovery of probable Neandertal hand remains in Siberia's Okladnikov cave (in the northern
Jim Pierson
My participation in the Faculty Early Retirement Program will be over at the end of the spring quarter. I am therefore really going to retire this time. I hope to remain active in departmental activities in one way or another. While I quite successfully avoided membership on campus-wide committees as a full-time faculty member, I am now involved in some that will help me maintain contact with campus after June. I am going to try to avoid any sentimental rambling here, but I am very fortunate to have been a member of an outstanding department with a truly collegial faculty and students who make teaching very rewarding. There were years in which Frannie and I were the only anthropology faculty, but I believe we now offer a substantial perspective of all four fields in anthropology since we have been joined over the years by Russell, Pete, Kathy, Wes and Anne. Patricia and her predecessor, Linda Stockham, also made life here very pleasant. I hope that the budgetary problems that have increased student fees and decreased faculty-student contact hours and faculty and staff salaries lessen; furlough days and campus closures make retirement seem an easy way out.

My most substantial plans are to spend some time in Australia later this year. It has been more than 40 years since I first went there! It must be time to retire.

Peter Robertshaw
I have focused my attention this last year on publishing my research on the chemistry of glass beads found on African archaeological sites. Happily this has resulted in three articles: one on beads from a site in Burkina Faso, was published in an edited volume on the archaeology of the Sahel; another, published in a German museum journal, examined beads collected during the course of the 20th century by ethnographers working in Nupe, Nigeria, which is the only place in sub-Saharan Africa where glass was made from raw materials as a local craft industry in the 19th and 20th centuries; and the last, published in the International Journal of Mass Spectrometry, compared results obtained from two different labs and examined the effects of corrosion of glass on the interpretation of the data. Two other papers, one on Moroccan glass and the other on Southern African beads, are also in press in international journals. However, I can’t claim all the credit since I have benefited from collaboration with several colleagues around the world.

Another paper I wrote a long time ago also saw the light of day late: “African archaeology in world perspective” was published by the University of Arizona Press in an edited book on Polities and Power: Archaeological Perspectives on the Landscapes of Early States. However, I am most proud of my second children’s book, coauthored with Jill Rubalcaba and published at the beginning of this year by Charlesbridge. Every Bone Tells a Story: Hominin Discoveries, Deductions, and Debates, aimed at a middle school readership, has been chosen as a Junior Library Guild selection.

Ellen Gruenbaum
A former member of the anthropology faculty from 1986 to 1994 and acting dean of the College of Social and Behavioral Science from 1994 to 1996, has left CSU Fresno and is now the head of the anthropology department at Purdue University in Indiana.

Jennifer Miller-Thayer
I have been busy teaching and writing since the last newsletter. This past summer I helped to write a grant with UC Riverside’s Survey Research Center that is building on my dissertation research on cross-border healthcare access at the U.S.-Mexican border. If it gets funded, I will have a post-doctoral fellowship at UCR. In January 2010 I gave a presentation called “Using U.S. Culture to Teach Cultural Anthropology” as the invited guest speaker at the Annual Gathering of Community College Professors in Paso Robles, Calif. This talk was based on my textbook “ Cultures of the United States” which I co-authored with Lauren Arenson.
Gustatory Corner: Only in a Month with an R …

An old New England maxim tells you to eat shellfish only in a month with an r. Why? The answer lies in filter feeders, duonic acid and epilepsy.

The summer months – May, June, July and August – are the months that have no r, and they are the months when various marine algae form blooms, massive growth spurts of marine algae that normally maintain far more modest numbers. The bloom of the brown-red algae is called red tide because of the marked pink color it lends to ocean water. These brown-red algae produce duonic acid in minute quantities, but the huge number of producers in a bloom elevate the concentration of duonic acid in sea water. Clams, mussels and many other molluscs are filter feeders, so each individual passes hundreds of gallons of sea water over its gills each day, filtering out its planktonic food, like brown-red algae. So, these molluscs concentrate the duonic acid even further. It doesn’t harm the molluscs at all, but creatures further up the food chain that eat them can be poisoned.

Duonic acid poisoning is more commonly known as paralytic shellfish poisoning, and it produces some pretty unpleasant symptoms. These include fever, stomach cramps, muscular paralysis and – in the most extreme cases – death. Recently another result of paralytic shellfish poisoning has been discovered: brain damage that leads to epilepsy. An outbreak of paralytic shellfish poisoning on Prince Edward Island in 2004 affected nearly 100 people, of whom two died. Amazingly, within a year, about 30 percent of the survivors began suffering epileptic convulsions. Over the next few years, similar outbreaks of epilepsy have been recognized in dolphins (which eat a lot of shellfish and regularly suffer from paralytic shellfish poisoning).

Most prehistoric shell middens in New England were formed in the fall or spring, a few in the winter. Native Americans in New England during the contact period avoided too much shellfish eating during the summer, too. They apparently had recognized the hazard and arranged their subsistence accordingly. So, the moral of the story is to do what my grandmother always told me: avoid eating shellfish in a month with an r.