THE CLOVIS- ARCHAIC INTERFACE

Wayne Tucker, University of Oregon student, operates the electronic distance measurer (EDM) which has been responsible for critically accurate recordings of the location and elevation of each lakeshore feature and artifact discovered in the basin. (Photo by D. Hunter)

An Update on the Dietz Site in Oregon

The Dietz site in the Alkali Basin area of southeast-central Oregon is a two component site containing materials from both the fluted and stemmed point traditions. Although mostly surficial, artifacts from this site, when placed in their correct geomorphic context, may help to articulate the nature of the change from Paleoindian to Archaic cultures in western North America. The period between the late Pleistocene and early Holocene (12,000-7,000 yr B.P.) is relatively obscure in terms of our knowledge of human cultural patterns.

IS THERE LIFE AFTER GRAMM-RUDMAN—SURVIVAL OF A MAJOR RADIOCARBON LABORATORY

After nearly twenty years of service to the archaeological community, the Smithsonian's radiocarbon laboratory, headed by Robert Stuckenrath, has been abolished. Due to the Gramm-Rudman law, closure of the lab was originally scheduled to take place by November 22. However, in late August the salary lines for the lab staff were discontinued.

Fortunately, the University of Pittsburgh has been able to offer a home for the entire laboratory, as well as for Stuckenrath and his assistant, John Williams. Stuckenrath will become a Research Professor in the Department of Anthropology. The laboratory will be moved in its entirety (including all the electronics, the chemical systems and 23 tons of shielding) to a research facility several miles from the University of Pittsburgh campus.

Stuckenrath will be working closely with James Adovasio and his colleagues in the Anthropology Department. Adovasio is Professor of Anthropology and Director of the Cultural Resource Management Program; he played an important role in arranging for the move to Pittsburgh.

The move will take place in November, with the expectation of commencing operations in mid to late spring, 1987. Stuckenrath expects to continue with his own research, providing radiocarbon dating expertise and dates as he has in the past; however, about half of his and his lab's resources will be devoted to in-house work.

As Stuckenrath and his colleagues look to the future, they are optimistic about the future of radiocarbon dating. Although other western sites have been uncovered in which the two traditions co-occurred, the investigators of the Dietz site believe it is unique in its potential to clarify and compare the relationship of these two traditions to each other.

In the Alkali Basin, the problem with most sites has been a lack of focus on proper interpretation of complex and subtle shorelines of prehistoric lakes due to great drop in lake levels. At the Dietz Site it has been possible to discern two separate shorelines and two corresponding zones of concentrated artifact finds.

The higher shoreline contains an abundance of sites which belong to the regional complex known as the Great Basin stemmed tradition. The lower shoreline, encircling a smaller, more shallow lake or marsh, has on its western shore large, discrete, entirely Clovis tool clusters. These shorelines overlap in one place and have between them an intermediate zone in which materials from the two traditions are found mixed.

The Dietz Site was discovered in 1982 by Dewey L. Dietz who contacted John Fagan, archaeologist with the Portand District Corps of Engineers. After a preliminary survey with local BLM archaeologist William Cannon which revealed more fluted point fragments, Fagan involved C. Melvin Aikens, ar-

(Continued on page 5)

CENTER MATCHES HALF-MILLION DOLLAR BINGHAM CHALLENGE

This past summer the Center for the Study of Early Man, University of Maine, was able to match the half-million dollar challenge from the William Bingham Trust for Charity and provide million dollar endowment for the Center. The match was accomplished through countless gifts from Center members as well as substantial gifts from severl private donors and $350,000 from the University of Maine Foundation.

The permanent endowment Center is intended to "extend the trust of the Center beyond the confines of the University. "It will be used to continue leadership and coordination for international scholarly research about the peopling of the Americas, as well as to "tell the story" of the first Americans to the public.

The Center will continue to focus research and public education programs on the earliest prehistoric peoples of the Americas. However, this focus is approached globally with the goal of understanding the dispersion of the human species. The understanding of the cultural and biological dynamics of the Ice Age peoples, of their activities and environments, involves the Quaternary sciences of archaeology, geology, ecology, and climatology, all of which are represented at the Institute for Quaternary Studies.

The Bingham Trust is providing an additional $500,000 in endowment for the Institute for Quaternary Studies at the University of Maine with which the

(Continued on page 8)
CRP CALL FOR PAPERS

Current Research in the Pleistocene is seeking papers for publication in the upcoming issue. This annual journal highlights the leading edge of the Quaternary sciences as they relate to the peopling of the Americas before 10,000 years ago. Topics covered include archaeology, lithic studies, taphonomy, physical anthropology, and paleoenvironments (plants, invertebrates, vertebrates, and geosciences). The regional focus section of invited papers in this issue will feature South America.

This journal has a worldwide circulation, and subscriptions by libraries and other institutions continue to increase steadily. CRP presents researchers a unique opportunity to keep abreast with the latest developments in the multidisciplinary field of Quaternary sciences. Papers should be no more than three pages in length and may be accompanied by one figure. For further information and guidelines for contributors, write to Jim I. Mead, editor, Department of Geology, University of Northern Arizona, Flagstaff, AZ 86011. Deadline for submissions is January 31, 1987.

AND THE WINNER IS...

The limerick contest elicited quite a range of responses from the last Mammoth Trumpet. It made opening the mail great fun! Most entries fell into one of three general categories: limericks about the Trumpet (flatterers!), limericks about the Pleistocene, and limericks about research on the Pleistocene. We have printed some of each.

Judging them was more difficult than we had thought possible. Our criteria in selecting the winners were: 1) the entry had to actually be a limerick; 2) humor counted; 3) scientific or historical information, if included, should be accurate; and 4) no disparaging limericks would be printed. A separate kids' category was added after we received many excellent limericks—several illustrated—from Rod Lark's class in Saratoga, Wyoming. Their artwork accompanied this article.

Although the contest is officially over, we always welcome literary efforts of all kinds and will print them when appropriate, with permission of the author. Many thanks to all who took the time to send us your imaginative efforts.

It's so gneiss to read your Trumpet,
Folks praise it o'er tea and crumpet.
Sure when Aud is said and done
There is really only one;
For 'tis top of the stack I plunk it.

—Michael Murphy

The huge woolly mammoth of yore
Met extinction along with his roar.
But he died not in vain
Among the forests of Maine
His trumpet sounds loudly once more!

—Loetha Curtis Musgrave

First Prize

There once was a digger named Ada
Who probed deeper into her strata
She was unequaling a plan
For a new Early Man
But was foiled for lack of real data

—Robert Jarvenpa

Runners-Up

A Pleistocene fellow named Fritz
At mammoth-hunting never said "quits"
He followed one far
Till the ground turned to tar
And he's down there still in the pits

—J. Richard Greenwell

A young archaeologist named Dave
Went off to dig in a cave.
An interest in taphonomy
Won't bolster the economy
What an un-YUPPIE-like way to behave!

—Jeanne Nash

First Prize

Once there was a mammoth named Marshallino
Who wanted to play the cello
So she got on a bus
With some people who cuss and off she rode to Pocatello

—Heidi Orde, age 9

The mothers decided to cook.
They said, "Go wash up in the brook."
Mom then called to Tyson
To come eat his bison
"Watch out, the gravy turned to gook."

—Nina Vecchio, age 10

Once there was a mammoth named Gus
Who wanted to go to Peru
So he got on his bike
And met his friend Mike
And broke all his spokes and chain too!

—Scott Forbes, age 9

Opportunities for Donors

Our thanks to all of you who have donated gifts for the Center's endowment. However, as you will have read (starting on page 1), the endowment is not yet complete. In order to fund normal operating expenses (as opposed to project expenses), we estimate needing $1.3 million dollars to generate adequate interest income. The University of Maine has agreed to help us out until we can raise the additional $300,000, but we need your help for the coming year.

We have submitted a proposal to the NationalEndowment for the Humanities Challenge Matching Grant Program for the purpose of strengthening the humanities component of the Center's work. We hope, for example, to establish a National Publisher's Resource Center to aid major publishers of social studies textbooks in improving their coverage of the Americas' earliest human heritage for primary and secondary education. Those of you who are particularly interested in the humanities are encouraged to let us know when you make your donations. If NEH funds us, we can use your donation to match theirs. There are also specific projects for which we are seeking donor support. We welcome contributions for the following:

Mammoth Trumpet Junior—To develop a newspaper similar to the Mammoth Trumpet, for school children grades 6-8, and related curriculum aids for teachers. The focus is on the early prehistory of North and South America. Major donors would be acknowledged in each issue, if desired.

CNDM Library and Resource Center—To renovate one of the large rooms of the Center building into a library and conference room. The goal is to improve scholarly and public access to the Center's resources, to provide study areas for visiting scholars, and room for special conferences. We will, of course, accept small contributions, but would also consider naming the library for a major donor.

Basic Research on Pleistocene Peoples of the Americas—To support (1) radiocarbon dating of human skeletal material of probable Pleistocene age from North and South America; (2) the collection of archaeological sites along the flanks of the Rocky Mountains in southwestern Montana; (3) analysis of early stone tool industries from Maine, Montana, and possibly China; and (4) support visiting scholars from Asia, North America, and South America who participate in Center research.

More details on above projects are available on request from the Center.

Graduate Research Fellowships in Quaternary Studies Program

Two graduate research fellowships are available in the Institute for Quaternary Studies at the University of Maine. The fellowships are available to qualified applicants to the Institute's MA graduate program and can be used for research in archaeology, glacial geology, paleoecology, and palaeoclimatology. The stipend includes tuition and living expenses. For further information and application materials please write to: Institute for Quaternary Studies, 304 Boardman Hall, University of Maine, Orono, Maine 04469.
COUNTING THE CLOCK

"When I do count the clock that tells the time..."
—Shakespeare, Sonnet 12

Everything that was once alive comes with a built-in clock that, perhaps unlike the model in the dashboards of cars, keeps track of time and ticks away thousands of years. Cosmic rays, randomly striking the carbon atoms in organic substances, turn some of them into radioactive carbon-14, which, like all radioactive materials, decays at a known fixed rate. There are perhaps a hundred laboratories in the world that specialize in counting the clock that tells the time in one-living things, radiocarbon labs that date organic matter by measuring how much the radioactive carbon in them has decayed. Many archaeologists and anthropologists, studying their samples long after they have been here, have now actually been inside one, and have only an approximate idea of how they operate. For this reason Mammoth Trumper decided to interview Bob Stuckenrath, who has been the director of the Smithsonian radiocarbon lab since it opened in 1968, and who is now moving his lab to the University of Pittsburgh.

It is now the second step, after chemical pretreatment, in the radiocarbon dating process. Stuckenrath recounts the sequence in precise detail, but cautions first that each lab is different—partly because every radiocarbon man designs his own equipment; you can't walk in and buy it.

"Once a sample is in, it is tagged with a code number. And then, to be truthful, it sits on the shelf. Normally it will sit on the shelf anywhere from five to twelve months, depending on the size of the back- log. At any one time, 1120 samples are in the lab. And you don't do anything to it. It just sits there until it's your turn."

When you roll it to your benchtop and you look at it, and you measure it, you don't do anything to it. You just put it in a machine and you get your result."

He also does research on new methods of pretreatment. All radiocarbon labs are attempting to meet the needs of archaeologists for ever finer discriminations—organic materials like bones being broken down possibly even into their individual amino acids. Dating bone is a milder controversial topic in the field, because it is so difficult to do and because the results are at times so erratic. The reason is that there is more than one type of carbon in bones, and it is hard to isolate the only reliable type, the collagen fraction. Another fraction, the hydroxyapatite, exchanges carbon atoms readily with ground water, thereby muddling the results. Some labs do not even want to try dating bone samples. "The process is not only tricky but time-consuming, dirty—and it stinks to high heaven."

A more accurate technique currently used in the field is radiocarbon dating using the tandem particle accelerator. "It think's it a fine idea," Stuckenrath says, "though not universally. I think the mistake to try to use an accelerator which for fifteen years or longer have been used for other experiments and now have carbon-14 larking around in the nooks and crannies. But I think you have dedicated equipment and if you've got the money, if you've got the money. Accelerator dating can be expensive for the client as well as for the investor in an accelerator. But it is the preferred solution to the problem of having little samples, for a small amount of charcoal is easily to lose in the carbon-14 system once it's gas."

"We have it set up so that it counts steadily for a hundred minutes. Then it vomits out everything it knows, clears its mind, and starts all over again for another hundred minutes."

Couple of hundred-minute printouts what the count is. And we have calculated for each counter a series of curves, and we look at the number of counts per minute that we're getting and tell approximate age.

"If this sample's looking like it's 10,000 years old, then it had better go for three days, 4000 minutes' worth of counting time. If it's only 500 years old, it goes one night. That sort of thing depends on the size of the sample, the size of the counter, the sensitivity of the counter. We have counters of different sizes because you have to sometimes have it adaptability. For a little half-liter container, our equipment normally counts on that for three weeks. If the sample is too small for the precalibrated pressures for your counters, then you have to add some dead gas to bring it up to pressure. We try not to, which is why we have a variety of sizes."

An alternative is to try developing tiny counters to deal with tiny samples: the English have one which can work on as little as ten milliliters, though it has to be left counting for three to five months, and though its dates come with a 80% margin of error. These are the plus-minus number which indicates, in Stuckenrath's precise phrase, "the distribution of individual counts around a mean." Or, less precisely but more concretely, how approximate a given date is likely to be.

"Let me put it this way," says Stuckenrath using a characteristic down-home analogy, "it's like making popcorn. You have a little oil, and you clap the lid on it and shake it. You can't tell when the first kernel is going to pop, so for your popping rate you get a bell-shaped curve" (actually, he revises himself, one that is slightly skewed). "It's exactly the same thing: we can't predict when any particular carbon-14 particles are going to be in the sum, so we tell on the average that half will disappear in a certain length of time, half of the remainder in a certain length, and so on."

To find the number of counts per minute, you take the number of counts and divide it by the counting time. The square root of the number of counts per minute is the plus-or-minus number. Thus, if you have 1000 counts over a 1000 second period, you tell out to tens of counts per minute, plus or minus one tenth of a count. Or, rather, the result is the basis of the final deviation: when you begin subtracting background radiation out, the plus-or-minus margin grows considerably, which is why some European labs have been built a hundred feet underground, with immense amounts of shielding, in order to reduce the background level as far as possible. Where plus or minus one percent on the final dating is generally regarded as precise, so that 10,000 years ± 100 is quite acceptable, some European labs are achieving dates such as 4000 ± 20, in other words a deviation of one half of a percent.

Absolute shielding is impossible; the very walls of the counters contain a few contaminants. But Stuckenrath's shielding cuts the 1500-2000 counts per minute that a counter simply sets on a shelf will register to 200; sophisticated electronic circuitry further reduces his worst counter to six counts of background radiation per minute, his best to one and a half. He also does research on new methods of pretreatment. All radiocarbon labs are attempting to meet the needs of archaeologists for ever finer discriminations—organic materials like bones being broken down possibly even into their individual amino acids. Dating bone is a milder controversial topic in the field, because it is so difficult to do and because the results are at times so erratic. The reason is that there is more than one type of carbon in bones, and it is hard to isolate the only reliable type, the collagen fraction. Another fraction, the hydroxyapatite, exchanges carbon atoms readily with ground water, thereby muddling the results. Some labs do not even want to try dating bone samples. "The process is not only tricky but time-consuming, dirty—and it stinks to high heaven."

"I think it's a fine idea," Stuckenrath says, "though not universally. I think the mistake to try to use an accelerator which for fifteen years or longer have been used for other experiments and now have carbon-14 larking around in the nooks and crannies. But I think you have dedicated equipment and if you've got the money, if you've got the money. Accelerator dating can be expensive for the client as well as for the investor in an accelerator. But it is the preferred solution to the problem of having little samples, for a small amount of charcoal is easily to lose in the carbon-14 system once it's gas."

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Ask what site investigators themselves can do to improve the chances their radiocarbon results will be accurate, Stuckenrath replied, "Refine the degree of association of the sample material with the event to be addressed. Invalid association is probably the source of at least 50% of the inaccuracies." Another way is actually to involve the lab in the investigation. Even if the people in the field know accurately what is in association, they may not know what it will take to get a good date.

There is, of course, no degree in radiocarbon dating. "I'm very much interested in palaeoecology or geologists. Stuckenrath's primary interests include the earliest peopling of the Americas as the relationship between changing environments and culture. Probably not many are ex-lawyers can be the only people who have spent three years in engineering school, Bob Stuckenrath recounts: "I started as a budding young lawyer. Went home to practice law; everybody'd known little Bob was the one who would be the big. When I was interested in how he was doing, why, he was obviously too young to handle any of their work."

(Continued on page 8)
TREES IN THE STONE

Editor's note: The following is a story submitted by etnologist Ruth Holmes Whitehead. It is set in an ar- rested lifestyle complex on the Scotian coast. The man is called.DisplayMember
because he now makes a very special blade, a ritual blade, the fire he makes to temper the robe of his blade must be struck from itself. Then he inlets his blade of this. As with all manipulations of Power, there is risk; the prefab may shatter. He gets its attention first, by singing to it. The brown man sinks deep and resonates in the bones. The fog wraps him round.

Ho, you trees,
I see you dreaming in this stone.
The seeds of burning are in you.
A long time you have dreamed.
Come out! Burn with your children in my fire.
Da'ho! It is I who call you,
O trees in the stone.
The kneeling man contorts himself around the pile of bird down and powdery rotten wood he uses as tinder, sheltering it with arms, legs, torso. The muscles in his shoulder bunch once as he strikes. The movement is faster than you can follow; the pyrite tip hits the rock in his left hand and the hot sparks flare . . . Nothing . . . He burrows the left hand further down into the tinder and rests it there. This time the sparks catch. A faint curl of smoke begins to escape the mesh of scarred stubby fingers. Gently the smoke blows, then wrights it flame with dry grass and a curl of birch bark. The fire begins to crackle.

The prefab needs to be heat tempered before he works it further, and the brown man has the necessary length of its stay in sand over the hot coals of his fire by the length of a specific traditional song he intones.

The fog has burnt away. Now comes the final thinning, and the man's strain and concentration are immediately visible. For greater control he holds the stone against the leather pad on his thigh, branching. As he strikes off the long thin flakes he works up and back along each side, peeling back layers of material from the edge to the centre spine, gripped, intent. The critical blows are being struck—he lifts the blade. A few whitish flakes fall away as the piece is turned up. The cheese-rind smear is gone, and in the exact centre of the knife is the now-opened geode, a cluster of purple crystals, tiny amethysts perfectly displayed by the expert strike, not one crushed. A long sigh escapes the artisan.

Rapidly now the man completes the last stages, holding the blade in his left hand, still bracing against his leg. His tool is an antler-tine pressure flaker, and placing it against the rock-edge he uses it to pull down and away, making a polished tip, a cutting edge like a razor's, a flute at the base for easier holding. The minute flakes seem to come off in a blur, a stone drift. Every so often, the man holds the blade in his mouth, letting his saliva soak it.

The brown hands move lovingly over the blade. It is done, and the maker hafts it with an elaborately carved handle, lashes this tightly with wet rawhide, and lies back on the moss, finished. Drained, wet with sweat, his body is freckled with small blackflies which have crowded on to him. His face is stained before he-dess his eyes is to make a quick cut on his chest, a slash from which the blade may drink. For this is a very special blade, and blade that will bring and bind him a son. His song has said so.

It is dark at first, earth-dark, cave-dark. Then there is a fire, small, just the red light's flicker from between the heath stones. The small leafy treen are the cave walls; the night and the fire define them with tiger stripes of orange and black shadow. This is a birthing, two women together here in the timeliness dark. This is the house, the cabin, for some hours. The older woman supports the younger, kneeling behind her, holding her as a contraction comes, wiping her

(Continued on page 8)
THE CLOVIS-ARCHAIC INTERFACE IN THE WEST

(Continued from page 1)

archaeologist from the University of Oregon. Test excavations at the site began in 1983. Work continued in 1984 under the direction of Aikens and Fagan with funding from a National Science Foundation grant. Since 1985, research has proceeded with assistance from the BLM Lakeview district, university students, volunteers, and some private funding. Judy Willig, doctoral candidate in archaeology at the University of Oregon, has been the Assistant Project Coordinator. Research on the Dietz Site is the subject of her dissertation. She, along with Aikens and Fagan, organized a symposium this year focusing on the Clovis-archaic transition in the west at the Society for American Archaeology meetings last spring. In addition, Willig organized a similar symposium with a more regional focus for the Great Basin Conference. Willig is encouraged with the accumulation of research on this transitional period, and hopes to bring further definition to it.

During the 1985 season point-plotted surface collection was conducted for the area yielding the Clovis tools, from a stemmed point-yielding area, and from an area where these were found mixed. The critical task has been to relate these to the ancient shorelines. Willig and students from the University of Oregon Field School (about 8 of whom volunteered an extra month of their time) made a painstaking survey of the two hypothetical shorelines. They looked there for additional sites, and ran a north-south line down the center of the Alkali Lake Basin.

The survey along this 10 mile-long line covered many miles, but did not reveal any Clovis localities other than the original site on the western shore. It did, however, yield 56 additional localities, 25 of which contained diagnostic artifacts mostly assignable to the stemmed tradition. Although there seems to be only one Clovis site on the lower shoreline, the stemmed point sites are distributed in greater numbers along the higher shoreline—but never below that line.

POSSIBLE PALEOINDIAN SITE AT INDIAN ROCKSHELF

In late March of this year the U.S. Forest Service sponsored a cultural resource survey in Chicago National Forest. Its purpose was to identify and do a preliminary evaluation of archaeological sites in a proposed hunting unit area. The findings from this particular survey prompted additional involvement at one of the sites, located in south-central Indiana.

The survey, conducted by Cheryl Musson, staff archaeologist, Glenn Black Laboratory, University of Indiana, covered over 9,000 acres, involving sites with and without vegetation. These sites without vegetation (i.e., rockshelters) were located partially from predictions based on local topography and bedrock geology. A complex of rockshelters was found in an area composed of heavily dissected sandstone, slates, and occasional limestone.

When the survey team arrived at one of the rockshelters they found fresh holes, tracks, piles of back-dirt, and a small pile of discarded artifacts. It was in this site, composed primarily of chert debris, that the base of a Clovis point was found.

The rockshelter comprises an area about 88 feet long by 8 feet deep. Unfortunately, an estimated 50-70% of the site had been disturbed by vandals. The Forest Service archaeologist, Mary Wilson, was contacted immediately after discovery of the site. But, in just the few days that it took to set up her initial examination, an additional five square feet were vandalized.

Wilson concluded that part of the archaeological deposit was intact. She then arranged for a one-week test excavation in order to salvage important cultural materials before further damage could be done. At this time, the site was put under surveillance. However, it is feared that they could not keep a twenty-four hour guard there, they relied on the local press for help. The press could not only advertise the fact that the site was not being watched, but also publicize the legal penalties for such vandalism.

Because the land lies within national forest, Federal rather than State laws have jurisdiction. The two most important of these are the Antiquities Act, and the Archeological Resources Protection Act (ARPA). Passed into law in 1979, ARPA is the strongest Federal law to date for dealing with archeological vandalism. It carries up to $100,000 fine, and a five year maximum prison sentence. It was used successfully to prosecute offenders in Idaho and Illinois just this past year.

The test excavation was carried out by Mary Wilson, with the help of archaeologists Jan Brasher, John Davis, and Dan Haas. They opened six pits to see what they could find still intact. Unfortunately, no further diagnostically Paleoindian materials were discovered. The earliest identifiable cultural level was early Archaic with several more recent cultural traditions above that.

In two of the six excavation pits the lowest layer was reached. In one of those the lowest layer was early Archaic; in the other they found a large rockfall and did not excavate beneath it. It is unknown whether there are earlier materials under that layer of rocks.

Wilson's analysis is not yet complete, but the results are likely to provide much additional information about Archaic and more recent cultural traditions than about Paleoindian peoples of the area. However, as Cheryl Musson comments, "It's possible the Clovis fragment is the only Paleoindian specimen there; but the site is significant because, although there are hundreds of rockshelter sites in south-central Indiana, there is no other rockshelter which has produced evidence of Paleoindian presence."

It is unlikely, however, that the Forest Service will be able to excavate further. Their funding is specifically for salvage archaeology as needed to prevent the destruction of sites, rather than pure research. They hope, however, that the recent publicity and attempts to educate the public will deter further destruction of that and other sites in the area. In the meantime, the site has been nominated for placement on the National Register of Historic Places.

—Kathleen Waters

Typical "assemblage" of Great Basin stemmed artifacts (left) from one of the lakeshore sites in the Northern Alkali basin, and a fluted point base fragment (right) from the Dietz site. (Photos by J. Willig)

Dewey Dietz, avocational archaeologist who discovered the site, assists William Johnson in setting up a surface collection unit to document the exact location of artifacts. (Photo by J. Willig)

Feel behind the times?

Current Research In the Pleistocene will keep you up to date on the latest findings and on-going research in the Quaternary sciences as they relate to the peopling of the Americas before 10,000 years ago. For the cost of a good lunch, CRP serves up a smorgasbord of concise, timely reports from the fields of archaeology, taphonomy, and paleoecology (plants, vertebrates and geociences). Join us for volume 3 (1986), with a Regional Focus section of invited papers featuring Northeast Asia, And pencil us in for volume 4 (1987) which will feature South America.

The leftovers are good, too!

Limited quantities of back issues are still available at the same per volume price. Volume 1 (1984) $ 5.00 Volume 2 (1985) $12.00 Volume 3 (1986) $12.00

Make checks payable to Center for the Study of Early Man, 495 College Avenue, Orono, ME 04473.

Prices include shipping and handling and are subject to change without notice. All orders must be prepaid in U.S. funds. A $5.00 surcharge for all orders to be shipped outside North America. Allow 6-8 weeks for delivery.
NEW REFERENCES AND RESOURCES

Editors Note: Although we review some major journals regularly for articles and books of interest to MT readers, we do not review all. Please send us reprints or notification of your publications. All contributed references are placed in the Center's library.

Ruth Grun (University of Alberta) advises that after many delays the final report on the 13,000 year old site of Taima-taima in Venezuela has been privately published in West Germany: Claudio Ochoanis and Ruth Grun (editors) 1986 Taima-taima: A Late Pleistocene Paleo-Indian Kill Site in Northernmost South America—Final Report of 1976 Excavations. It may be obtained for $4 U.S. fromExecia Verit, Fischterra 42, 7700 Singen, West Germany. Make U.S. dollar order payable to Claudio Ochoanis.

A recently excavated site in Brazil, a rockshelter called Boqueirao do Sito da Pedra Furada which has walls decorated with prehistoric paintings, has been recently in Nature (see below) as the cover story. Details on this site, which was excavated by Niebo Guidon (Laboratoire d’Anthropologie Prehistorique d’Amérique, Ecole des Hautes Etudes, Paris) and which dates to 72,000 years ago, can be found in the two references below. Please note that in the list of references in the Nature article the citation for the book edited by Bryan (which first published information on the site) is in error. The correct reference follows:

ARIZONA ARCHAEOLOGY WEEK

Editors Note: The article is the first in the series featuring exemplary programs across the Americas which involve the public in their archaeological heritage. We solicit information on other programs our members may know about.

Arizona Archaeology Week is a four-year-old program of state-wide public education in archaeology. Sponsored by the Arizona State Historic Preservation Office (SHPO) and the Governor’s Archaeology Advisory Commission (AAC), this program highlights the knowledge, artifacts, methods, and values of preserving their state’s earliest heritage. This year’s program theme, “The Past Made Public,” emphasized commitment to public education and involvement. At least 44 organizations in over 16 communities actively participated.

Prior to 1980, illegal excavation in Arizona was a common problem. Thanks to intervention by Governor Bruce Babbitt, however, the situation has been turned around. First he created an Archaeology Advisory Group. Then the state made unauthorized excavation on state land a felony and instituted an aggressive public relations campaign to educate citizens on the importance of their heritage. Inaugurated by the governor’s proclamation, Arizona Archaeology Week included a wide range of events and products. Publicity was garnered in many ways beginning with a poster design competition; the winning poster was distributed statewide. A teacher’s curriculum packet was developed containing four lesson plans, recommended readings, a synopsis of Arizona archeology, and a list of archaeological places to visit; it was distributed to over 1000 public and private schools.

A Public Information Package was distributed to archaeological organizations, museums, national and state parks, and the media. This included posters, information about events, a list of major National Register of Historic Places archaeological sites in the state, and a list of archaeological sites open to the public. A similar packet was sent to mayors of all Arizona cities and towns with draft language for a city or town proclamation for the Archaeology Week celebration. Additionally, the Bureau of Land Management (BLM) sent out copies of an article of their newsletter devoted to archaeological activities in each BLM district to over 2000 individuals and organizations.

Teresa Hoffman, archaeologist with the SHPO, helped coordinate the over 45 special demonstrations, exhibits, lectures, and tours. Included this year were, for example:

- An Open House at the Arizona Archaeological and Historical Society in Tucson
- Tours of sites at the Homolovi Ruins State Prehistoric Park
- An Archaeology Booth at the Yuma County Fair
- Special exhibits at the Capitol Museum
- A teacher workshop for all grade levels

Plans are currently underway for Arizona Archaeology Week 1987, using the theme “Take Pride in the Past: 100 Years of Arizona Archaeology.” For further information, contact Teresa Hoffman, Arizona State Parks Board, State Historic Preservation Office, 1688 W. Adams, Phoenix, AZ 85007, (602) 255-4174.

—Marilyn Roper
CONFERENCES

INAQUA COMES TO NORTH AMERICA IN 1987

The second INQUA Congress to meet on this continent will be held at the Congress Centre, Ottawa, Canada from July 31 to August 5, 1987. A circular containing abstract submission, accommodation reservation, excursion, and general reservation forms is available from Mrs. Huguette Lacoste, Executive Secretary, XIII INQUA Congress, National Research Council of Canada, Ottawa, Ontario, Canada K1A 0R6, or by calling 613-993-9009 or telex 053-3145. The deadlines for receipt of abstracts and the deposit for field excursions is January 15, 1987.

The anticipated number of participants in the Conference, as of September 16, is 1591 representing 72 countries. The organizers of the Congress are making a special appeal to students, offering special student rates and pointing out that Ottawa is within a 24-hour drive of a great part of eastern North America. The following is a list of Symposia and Special Session titles for INQUA '87.

Symposia


Montsos and paleomontsos, organized by R.J. Fairbridge.


Long-term structure in the Late Devonian terrestrial ecosystem, organized by K. Luchterhand and Estella B. Leopold.

Long continental record, organized by D. Adams. Applied Quaternary studies, organized by P.B. Hagaman.

Special Sessions


The Smith Symposium: Late Pleistocene and Early Holocene Paleoecology and Archaeology of the Eastern Great Lakes Region held at the Buffalo Museum of Science, Buffalo, New York on October 24-25, 1986. The following is a list of papers presented.

- Thomas Webb III (Brown U). Climatic change over the past 18,000 years in eastern North America: pollen and climate model results.
- Denise F. Gaudreau (Southampton College). Vegetational change in northeastern United States over the 14,000 years: reexamination of plant population dynamics.
- George L. Jacobson (U of Maine) and Eric C. Grinn (U of Minnesota). Summary of radiocarbon change in late-glacial vegetation of the Laurentide Ice Sheet.
- J.K. Davis and R.M. Sleeman (U of Waterloo). Ice, lakes, and plants. 13,000 B.P. to 10,000 B.P. the Erie-Ontario lake in Ontario.
- Parker E. Calkin (UNY - Buffalo) and Ernest H. Muller (Syracuse U). Late Pleistocene and Holocene geology of the eastern Great Lakes region.
- Richard S. Lafla (Buffalo Museum of Science). The Hinckson Site: an unusually rich late Quaternary locality in western New York.
- Normen G. Miller (NY State Museum). Plant fossils from the last Quaternary Hinckson Site (Genesee County, NY) and their regional significance.
- David W. Steadman (NY State Museum). Vertebrates of the late Quaternary Hinckson Site, Genesee County, New York.
- Anthony D. Berkozy, Cathy W. Barokey (Carrefage Museum of Natural History). Allan C. Ashworth (North Dakota State U), and Rudi E. Gantenbein (Bergen County Climate Center). The Newmamn mammoth and associated paleoecology from Bradford County, Oxford, Pennsylvania.
- Holmes A. Semken, Jr. (U of Iowa). The Late Wisconsin biomes of the southeastern United States.
- Alan V. Morgan (U of Texas). Late Pleistocene and early Holocene Colopeters in the lower Great Lakes.
- J. Mark Erickson (St. Lawrence U). The promise for fossil orbirid mussels in paleoecological analysis of Quaternary lake and bog deposits: preservation quality and date extraction.
- Mark J. Camp (U of Toledo). Late Wisconsinan united habitats in the Maumee Drainage Basin of Ohio, Michigan, and Indiana.
- D. Brian Dellor (McGill U) and Chris J. Ellis (U of Waterloo). Early Paleo-Indian complexes in southwestern Ontario.
- Arthur Roberts (Simon Fraser U). Paleo-lndian/Arcadian transition on the north shore of Lake Ontario.
- Russell W. Graham (Smithsonian Museum) and Marvin Kay (U of Arkansas). Taphonomic comparisons of cultural and non-cultural faunal deposits at the Kismimsk and Burnhart Sites, Jefferson County, Missouri.

Tobias, High resolution Quaternary deep-sea biostratigraphy: implications for the climate control, L.H. Burckle; Rates of change: the time factor in Holocene Mediterranean landscape evolution, S. Bortsma and J.L. Bintliff; The Antigene and Southern Ocean; Recent and last glacial maximum, G. Denton and E. Zinderenbaker; Quaternary of the Queen Elizabeth Islands, J. Englands; Glaciation of the northern Appalachian region, D.R. Grant and G. Denton; Late Pleistocene and Holocene insect assemblages; their use in Quaternary paleoecology and archaeology, G.R. Coope and A. Morgan.

6th Annual World Open Atlai Open Contest

The 6th Annual World Open Atlai Contest, July 19, 1986 in Saratoga, Wisconsin was an international success. Joining the 37 men and women atlai contestants and 20 flintknappers were Dr. Axel Schultze-Thulin, head of the American department of the Linden Museum in Stuttgart, West Germany, and his wife Hanni. Dr. Schultze-Thulin gave a talk about his recent travels to early sites in North and South America. Speakers at the Early Man Symposium included Marie Woodmington (Denver Museum of Natural History) and Chuck Reher (University of Wisconsin).

UPCOMING CONFERENCES

December 3-7, 1986 AMERICAN ANTHROPOLOGICAL ASSOCIATION 85th Annual Meeting, Franklin Plaza Hotel and Holiday Inn Center City, Philadelphia, PA. Deadline for all submissions is April 1, 1986; forms to be provided in January, 1986. Program Editor to be announced.

March 5-8, 1987 SOCIETY OF ETHNOBIOLOGY, 10th Annual Conference, Florida State Museum, University of Florida. Contact Elizabeth S. Wing, Florida State Museum, Gainesville, FL 32611, 604-792-1721.

April 3-4, 1987 CENTRAL STATES ANTHROPOLOGICAL SOCIETY, 63rd Annual Meeting, Victoria Inn, Columbus, Ohio. Abstracts and registration fee by December 15, 1986 to James Hamill, Department of Sociology and Anthropology, Miami University, Oxford, OH 45056. Contact: Camp M.D. King, Bowling Green State University, Bowling Green, OH 43403.

April 22-26, 1987 CANADIAN ARCHAEOLOGICAL ASSOCIATION, 20th Annual Conference, Westin Hotel, Calgary, Alberta, Canada. Contact M.C. Wilson, Program Chair, Department of Geology and Geophysics, University of Calgary, Calgary, AB T2N 1N4, Canada.

May 25-27, 1987 GEOLICAL SOCIEITY OF CANADA - MINERALOGICAL ASSOCIATION OF CANADA Annual Meeting, Saskatoon, Saskatchewan, Canada. Contact W.O. Kupcis, Department of Geological Sciences, University of Saskatchewan, Saskatoon, Saskatchewan, Canada S7N 0W5.

July 31-August 9, 1987 12TH CONGRESS, INQUA, Ottawa, Ontario, Canada. Contact Dr. Alan V. Morgan, Department of Earth Sciences, University of Waterloo, Waterloo, Ontario, Canada N2L 3G1. September 1-7, 1987 UNION INTERNATIONAL DES SCIENCES PREHISTORIQUES ET Proto-HISTORIQUES, XIM Congress, Mainz, West Germany. For details contact Dr. K. Weidemann, Generaldirektor des Römisch-Germanischen Zentralmuseums, Ernst-Ludwig-Platz 2, D-6550 Mainz, Federal Republic of Germany.

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CENTER MATCHES BINGHAM CHALLENGE

(Continued from page 1) Center is affiliated. The purpose of the Institute endowment is to enrich Institute programs and to “ensure that the Center for the Study of Early Man will continue to be embedded in a rich matrix of relevant academic disciplines.”

The Institute was founded in 1970 to provide highest quality multi- and interdisciplinary research and teaching in the Quaternary sciences. It is jointly staffed by University of Maine faculty from the departments of Anthropology, Botany and Plant Pathology, Geologic Sciences, and History. Institute programs focus on three fields—paleoecology, paleoecology, and prehistoric archaeology—and this research is currently being conducted in the United States, Canada, Africa, Antarctica, Greenland, India, and Scandinavia.

A four-year search of institutions in the United States led the trustees of the Bingham Trust to the University of Maine as a place which was properly staffed and had the academic quality to develop a center to study the earliest human heritage of the Americas. They initially awarded $500,000 to Robson Bonnichsen, Associate Professor of Anthropology and Quaternary Studies, to establish a Center for the Study of Early Man.

Since its initiation in 1981, the Center has developed an active publication program, conducted research at several early archaeological sites in Maine and Montana, stimulated research by organizing conferences and international scientific exchange, and developed its role as a clearinghouse of information—both for scientists and the general public.

The Center’s success motivated the Bingham Trust to offer the challenge matching endowment grants to the Center and to the Institute of $500,000 each, on condition that the University of Maine raise a matching $500,000 for the Center.

The Center endowment, however, is not yet complete. Three hundred-thousand dollars are still needed in order that the Center’s basic programs can proceed uninterrupted with just the interest income from the endowment. External grants are normally solicited for special conferences, professional research, and new programs. Endowment interest is used for staff salaries and normal operating expenses. Unfortunately, interest rates have declined, and the pinch is being felt this year especially.

Currently, the Center is seeking to increase its international membership, develop its library, begin some programs aimed at children and teachers, continue its publication program, and pursue work on conferences and exchanges. See page 2 of this issue for more information.

—Marcelle Sorg

COUNTING THE CLOCK

(Continued from page 3)

“So, fortunately the highway department came along and built a road through our living room, and we had to leave. I had become interested by then in the history of the law, so I went to Penn State with the idea of doing graduate work in it. But I needed to have a job within the university, and there was one open in the radiation lab. So I took it, and after I guess about three years I wound up managing the fool thing. All the time at Penn I made a point of hiring very good graduate students in chemistry, because I failed college freshmen chemistry in 1946.

I’m a cookbook chemist, and that’s all.” But he felt that someone in the lab should know a little about the kind of objects the lab was examining, so he began taking courses in archaeology, and ended up with a degree in anthropology. At about that time, in 1968, the position of director of the Smithsonian radiocarbon lab opened up. He was accepted for it, and, eighteen years later, now at the University of Pittsburgh, Stuckenrath continues, counting the clock that tells the time.

—Michael Dolzani

SUGGESTED READINGS

On Dietz Site

LIM ERICKS

Eating mammoth five months in a row
A bilious old hunter named Joe Yelled, “Enough of this stuff!”
But his wife in a huff,
Snarled, “We’ve still got eight tons to go!”

—Robert Davidson

Early Man is the subject to date
Did he arrive early or late?
Some bet on bone tools,
Others call them dumb fools.
Answers we eagerly await.

—Pat Shipman

SUGGESTED READINGS

See page 2 for more limericks and limerick contest winners.

Unveiled Moses

You moved and didn’t tell us?
Do I look like I can read minds?

The Trumpet is not forwarded.
We must have your correct address please notify us of any change of address.

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