SOUTHWEST FLORIDA ARCHEOLOGICAL SOCIETY

- NEWSLETTER -

Travis F. Doering, Editor Vol. II, No. 1

May, 1986

- THE MAY MONTHLY MEETING of the SWFAS will be held at the First Federal Savings and Loan of Ft. Myers, (Community Room), 3201 Tamiami Tr. No., Naples, Florida at 7:30 p.m. on Thursday, May 15, 1986.

- This month's meeting will feature a presentation by Dade County Archaeologist, Robert Carr, on the latest findings at the now-famous Cutler Ridge Fossil Site. This should be a very exciting and interesting talk, so be sure to make plans to attend the May meeting and bring along a friend.

- SITE FORM MEETING - Tuesday, May 13, 1986 at 6:30 p.m. at the Strader residence, Edgewater Dr., Bonita Springs, FL. (992-6133) Completion of site forms and discuss future SWFAS activities.

- ANALYSIS SESSION - Sunday, May 18th, at 10:00 a.m. at John Beriault's home, 3550 Bolero Way, Naples, FL. Your chance to examine and categorize artifacts from past digs. (261-0295)

- SORTING SESSION - Tuesday, May 20th at 5:30 p.m. at J. Beriault's residence, 3550 Bolero Way, Naples, FL. Your chance to help sort and classify materials from past digs.

- JUNE MONTHLY MEETING - Thursday, June 19th, at the First Federal Savings and Loan of Ft. Myers, (Community Room), 3201 Tamiami Tr. No., Naples, FL at 7:30 p.m.

- APRIL MONTHLY MEETING - Thanks to our President, John Beriault, for his enlightening presentation on notetaking at the April meeting. The techniques John has personally developed and the other possible methods of record-keeping, information storage and retrieval was very edifying.

- THE GREAT GLADES GRITTYWARE II - held on Sunday, April 27th, was a great success. The Strader place was beautiful as usual on a perfect day. It was our pleasure to have Gypsy Graves and members of the Broward County Archaeological Society over to enjoy this event. This year's participants have definitely been practicing their clay forming techniques. Most of the pieces were very well made and easily recognizable. Thanks everyone, for the fine turnout and making this another successful outing.

- WELCOME NEW MEMBER - We would like to welcome Gina Understahl as a new member of SWFAS.

- OLD COLD BONES - Scientists probing the cold rocks of a mountain range in Antarctica have found 225-million-yr.-old fossils of reptiles and amphibians that they say may broaden the range of time researchers believe the animals lived on the now-frozen continent.

- A team of scientists working along the trans-Antarctic mountain range during the recently ended Antarctic summer found more than 350

vertebrate fossils, including bones belonging to four new species of amphibians and reptiles, the National Science Foundation announced.

- Dr. William R. Hammer of Augustana College in Rock Island, Ill., said the cache included a triangular two-foot-long skull and a jaw with inch-long teeth from two amphibians, animals at home on both land and in water.

- The discovery is significant because about 50 of the fossils were found at a Triassic period rock level that is 1,000 feet higher than levels where bones associated with that geological period had been found previously.

- Because species found at higher rock strata are younger, the find may give scientists new clues about how long these animals existed in Antarctica and the nature of the continent's environment at the time.

- "We'll also now be able to relate older fossils to younger ones to see how these animals evolved", said Hammer.

- The fossils represent life in the overlapping boundary between the Triassic period, which began 240 million years ago, and the Jurassic, which began 200 million years ago.

-Reptiles were the dominant land creatures during the Triassic, and the earliest dinosaurs appeared toward the end of that period. By the beginning of Jurassic, dinosaurs proliferated and dominated the Earth until they vanished 65 million years ago.

Article by Warren E. Leary, APScience Writer

- NEW MINOAN SITE FOUND ON CRETE - On a windswept hill above the sea, a Greek archaeologist has unearthed a 4,200-year-old building that may be a forerunner of the vast palaces where ancient Minoans lived in luxury on Crete.

- The site at Agia Fotia in east Crete in the southern Aegean, also was protected by a thick stone wall that probably stood 13 ft. high.

- "This find has really excited the experts. It would be the first example of a Minoan fortification wall ever excavated, and the building itself is unique", said Hetaxia Tsipopoulou, a government Antiquities Service archaeologist who recently finished the dig.

- The discovery of a fortification wall upsets an image of peaceful Minoan communities living in undefended palaces, towns and country villas while prospering from foreign trade.

- Europe's first sophisticated urban civilization flourished on Crete in the Bronze Age, between 3000 and 1450 B.C. The island is named after the legendary King Minos who built the labyrinth at Knossos where the Minotaur, a monstrous combination of man and bull, was kept.

- Scholars are still undecided whether the Minoan palaces, which were regional power centers on the island, were modeled on Egyptian or Near East prototypes, or developed independently on Crete around 2000 B.C.

-"The Agia Fotia discovery is going to provoke arguments that we've found a missing link in a chain of local architectural developments that culminated in the palaces," Tsipopoulou said.

-Built around a central courtyard, the palaces included living apartments decorated with elaborate frescoes, workshops and dozens of storage rooms for farm products.

- The 38-room, single story stone building at Agia Fotia surrounded a rectangular pebble-surfaced courtyard, 55 ft. long and 11 ft. wide. Doorways led from the courtyard into small groups of interconnecting rooms. The fortification wall was close to the building, enclosing the seaward side of the hill.

- More than 1,400 stone tools -- beach stones flatened and worn with use -- were found in the building, along with pottery and quantities of blades made from obsidian, a black volcanic glass found on the Aegean Island

of Melos.

- Only one bronze tool, an axe, was found, suggesting that the ancient workers took valuable tools and artifacts with them when they abandoned the building. "There were no signs of destruction. It seems they simply stopped using the building after a relatively short space of time -- perhaps only 50 years," said Tsipopoulous.

- A later Minoan settlement at Sitia was concentrated at another hilltop overlooking a well-watered plain two miles to the west.

- East Crete, a district of mountains interspersed with strips of fertile plain and scoured by fierce winds, was densely populated in Minoan time. More than 100 Bronze Age sites are known.

Naples Daily News, 4/6/86

- BOOK REVIEW BY ART LEE - Teeth Provide Clues to Amerindian Origins

- The First Americans: The Dental Evidence; Turner, Christy G. II, in National Geographic Research 2(1):37-46 (1986).

- An eight-year project that involved the study of 9,000 American Indians, Aleuts, and Eskimos has enabled the author to trace the origins of North America's first inhabitants via three different Asian pathways.

- Turner selected dental characteristics in his analysis because they evolve slowly, and thus provide a reliable time continuum.

- Using nine dental traits, he found that native American populations divided into three distinct groups, the Aleut-Eskimo, the Greater Northwest Coast Indians, and all other North and South American Indians.

- The author further notes that there are three distinct early tool traditions. The oldest is the late Pleistocene Clovis point used to hunt large animals. Next oldest is a tradition of microblades and unfluted relatively small knives or arrow points, suggesting pursuit of smaller game. The youngest is the unifacial blade-making technology of the Aleutian Islands, suited to pursuit of sea mammals.

- These three ecologically-influenced tool traditions have little geographic overlap -- and they are found in the areas of the three respective dental groups.

- Similarly, three New World language groups have been defined: Na-Dene, Aleut-Eskimo, and Macro-Indian. These correspond with the three dental clusters except that today's Na-Dene languages have a more restricted distribution than the correspondining dental group, suggesting either genetic leakage or shrinkage of the Na-Dene language distributions.

- Comparing dental traits and tool kits of the Americans with those of Asians, Turner concludes that three populations developed in North China in geographic isolation and starting 20,000 years ago, took part in three distinct, ecologically-separated waves of migration:

> The most westerly group moved through the Vitim and Lena river basins, crossing Beringia to Alaska in search of game and later moving south away from the food-poor forests that developed in Alaska with climatic changes.
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> Some 15,000 or more years ago a more easterly-trending second group reached the lower Amur-Hokkaido-Sakhalin region where they began to develop a sea mammal-hunting, maritime life style, entering Alaska via the southern coast of the Bering land bridge and forming the Aleut-Eskimo stock.
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> Soon after the Paleo-Indians left Alaska the third group -- the microblade-making Diuktai bands who had lived between the Amur and Lena basins -- arrived in Alaska just before the closing of Bering land bridge with an economy based on exploiting rivers and forests, becoming the Na-Dene Indians of modern Alaska.

- SPECIAL SERIES - Part II: Birth of a Shell Mound
Give 'Em Shell: Notes On Shell Mounds by John G. Beriault

The shell mounds of South Florida are not a recent phenomena. In many instances their genesis began in the Late Archaic period (c.700-3,000 B.C.) or earlier. Pre-Ceramic Archaic shell "rings" and "enclosures" have been investigated at various points along the coast. Stratigraphic tests in certain large mound complexes have revealed the basal portions to be surprisingly old.

- Interest in the birth and formation of area shell mounds began with speculation by Frank Hamilton Cushing in the mid 1890's. Cushing was renowned for his "bursts" of intuitive insight - a "gift" his contemporary scholastic colleagues held in contempt. Many of Cushing's more fantastic ideas have been proven in time to be at least partially true.

- Cushing saw the local shell mound - building Indians, whom he gave the colorful name "Key-Dwellers", as being at least spiritual kin to Arawaks of Venezuela who still dwelt in stilt villages in the Gulf of Maracaibo. He saw the local Indians as "setting up shop" on shell bars with the same intent as pelicans - namely to drive fish into the shallows to trap and catch them. Recent research by the University of Florida on Joslyn Island (which, ironically,was one of Cushing's first stops) has shown the most important food source (calorie for calorie) for the coastal tribes was small sardine-sized fish and not shellfish. The presence of the remains of many thousands of these fish suggests an efficient method of trapping them, perhaps with a system of tidal weirs.

- The presence of structures such as "canals", "basins", and "breakwaters" on many of the larger sites may indicate special-use features that functioned at least in part as fish-catchment devices. Frank Hamilton Cushing may yet again be proven correct in another of his "off-the-wall" assumptions.

- The situation or position of large shell mounds can be classified as those of headland, riverbank/river mouth, bay island, and island-point. This system reflects the current aspect of these sites rather than how they appeared when inhabitated by Indians several hundred or several thousand years ago.

- Recent work on the Strader Site (8L1709), a river bank midden ridge on the Imperial River has revealed abundant evidence of water fluctuation during its period of occupation. Hearth/fire pit features in their original deposition have been found 1½ meters below present (river) water level. In the same excavation a level of stained, patinated, and concreted shell may mark an interval of "wet" conditions a meter or so higher than present.

- This significant change in water level implies an even more radical change in environment and topography for the entire South Florida area. During "dry" intervals, a xeric "scrub" vegetation may have surrounded an upland hammock on the Strader Site proper. The site may have been positioned on a river bluff formation such as at the Horse Creek Campsite. During "wet" times, the site may have comprised an elongate "island" surrounded by a shallow bay or mangrove swamp. The fact that the Strader Site and many other site locations were under almost continuous habitation during these changes reflects the initial judicious positioning to exploit the resources of an area.

- A further indicant of environmental, if not cultural, change is the differing make up of shell species in the various levels of deeply stratified sites. At the Strader Site there are "zones" of large atlantic bay scallops (Argopecten irradians) alternating with levels containing few scallops but abundant oyster (Crassostrea virginica). This may imply a change of collection strategies - but, most probably, an environmental

change as well.

- The traditional explanation for the nascence of shell mound development suggests wandering bands of hunter/gatherers during the Mid-Archaic began to appreciate and exploit vast marine resources which were developing during the post-glacial recovery of the early Holocene. Sedentary modes of behavior followed as a matter of course and highly specialized fishing and shell-fish gathering techniques were developed. The simple social unit of the band evolved into a highly complex stratified non-agrarian society with an hereditary chieftan and elite class.

- A reflection of this complexity and specialization can be found in elaborate mound complexes that are frequently in the form of large islands situated in estuarine (bay) areas. Frank Hamilton Cushing saw these sites as developing from the center outward - with the most recent construction activity occuring along the periphery of the site as shell debris was being dumped from stilt houses at water's edge. Recent research has proven Cushing's hypothesis to have some merit. Large sites were constantly being constructed outward. Interior areas were also being constructed upward. The technique, as evinced by investigations at Addison Key, Chololoskee, and the Strader Site, seemed to be the "dumping" of culturally "sterile" shell debris and fish bone until a high, level area was achieved. Then, an intensive habitation would ensue with house structures or "living floors" in evidence. This stage would leave a cap or mantle of culturally-rich black midden soil and ash.

-Further extensive research into patterns of shell mound construction are needed to more accurately interpret the creation and evolution of these most interesting structures.

NEXT: LIFE ON A SHELL MOUND

- COMMENTS AND ARTICLES - Send any information or articles that you would like included in our Newsletter to SWFAS Newsletter, P. O. Box 9965, Naples, Florida 33941.

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MEMBERSHIP APPLICATION Mail to: SWFAS, P.O.Box 9965, Naples, FL 33941

_____ Individual — $10.00 / _____ Family — $15.00 /_____ Student — $7.50 /_____ Contributing — $25.00

Yes! I want to support the SWFAS in their work of preserving and interpreting the prehistoric heritage of Southwest Florida.

NAME _____ PHONE _____

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INTERESTS & HOBBIES _____

I hereby agree to abide by the rules and bylaws of the Southwest Florida Archeological Society. I further release from any and all liability due to accident and injury to myself, dependents, and property, the SWFAS, its officers, members, and any property owners cooperating with the Society.

Note: All dues & contributions are tax deductible.

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