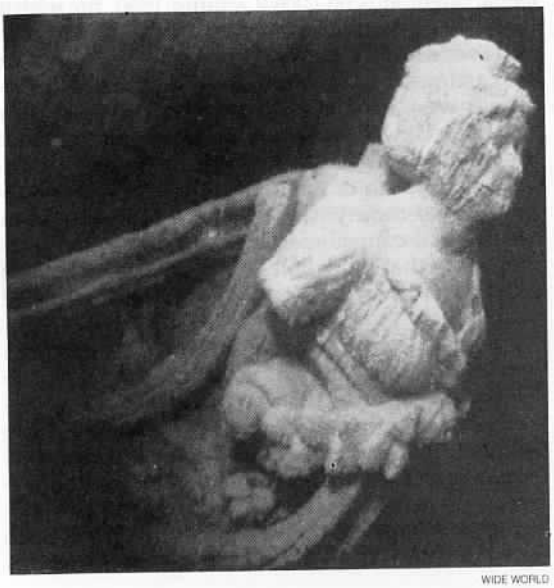
Western Hemisphere. Trends and events within archaeology in the Americas during 1983 continued to reflect larger political and economic currents throughout the hemisphere. Whole areas remained unavailable for study and field research. Financial or political constraints throughout much of the Caribbean and Latin America limited the number of foreign research teams in Latin countries. The 1983 financial crisis in South America constricted and, in many places, stopped programs of archaeological research and preservation. The inflationary crisis in Mexico resulted in zero funding and no new field excavation projects by National Institute of Culture archaeologists in 1983. At the same time, and as reported in *American Antiquity*, a scarcity of funding and the aforementioned political realities brought major shifts in U.S. funding priorities. Instead of support for new field projects, money was allocated for data analysis and the laboratory study of already excavated collections by U.S. scholars.

South and Central America. Within the Andean countries, continued military activities in the highlands of Peru all but stopped high-altitude archaeological research. Instead, recent discoveries had been made in the desert coastal areas of Peru and Ecuador. In Peru excavations by Christopher Donnan at the deeply stratified 1st millennium AD sites of Chotune and Chonancap in the Lambayeque valley revealed a large architectural complex containing a long, six-colour mural that shows a procession of figures, many carrying trophy heads. Along the northern Ecuadorian coast of Manabi, James Zeidler reported the discovery of an elaborate and previously unrecognized northern manifestation of the 3rd millennium BC Valdivia culture. This rich northern Valdivia culture area was revealed at the site of San Isidro, a large ceremonial centre that was distinguished by elaborate ceramics and ornately decorated plaques.

To the north, in the isthmus region of central Honduras, intensive survey and excavation field projects by U.S. and Honduran scholars documented 141 new Early and Late Classic Mayan sites, ranging from scatters of stone tools to large ceremonial and residential centres with hundreds of structures. Sponsored by the Instituto Hondureño de Antropologia e Historia and the Empreas Nacional de Energia Electrica and directed by Kenneth Hirth and Gloria Lara Pinto, this systematic regional study was conducted as a first step in the large-scale salvage excavation of the sites threatened by the planned El Cajon reservoir.



The figurehead of the U.S. armed schooner "Hamilton" still graces her bow after 171 years at the bottom of Lake Ontario, where she was sent by a sudden squall during the War of 1812. Underwater archaeologists photographed her thus by remote control at a depth of 92 metres (300 feet) in February 1983.

WIDE WORLD

Underwater Archaeology. The year was notable for major trends and discoveries in maritime archaeology. In terms of policy, funding, and effort, the concern with underwater wrecks was until recently dominated by privately financed treasure hunters more interested in profit than in scientific control. New discoveries of historic ships commonly disappeared as archaeological sites in a matter of days or weeks, with their contents going to private collectors and the international antiquities market. During the year, however, after a decade of conflict between salvage divers and archaeologists, protective legislation was introduced in the U.S. Congress. The Historic Shipwreck Preservation Act would allow states to lay claim to historic shipwrecks within their waters and, by so doing, provide for the first time a viable national program that would control and limit the number and scope of salvage permits granted. At the same time, it would allow each state to develop preservation and funding programs.

This development came about just as recent discoveries were highlighting the range and historical significance of shipwrecks, not only for the information they yielded on important maritime technologies and undocumented trade routes but also for their value as archaeological time capsules of critical importance for the dating of previously ill-defined historic artifacts. Furthermore, through the use of new techniques and the increasing ability to explore deeper and previously less accessible underwater locations, underwater archaeologists were discovering a variety of exceptionally well-preserved remains that document the material traces of everyday activities not generally found preserved in contemporary historic terrestrial sites. For example, a recently completed underwater survey of the Cayman Islands by underwater archaeologists for the Institute of Nautical Archaeology in College Station, Texas, provided the Cayman government with an inventory of 70 recently identified shipwreck sites dating from the 16th to the 20th century. A variety of wrecks dating to the 16th and 17th centuries reflected repeated hostile encounters between Spanish and British fishing and raiding vessels. The results of this government-sponsored survey transformed this little-studied group of Caribbean islands into a major new data centre of colonial economic trade patterns.

Marine technology was also providing archaeologists with new access to unlooted, deep-water wrecks. Using underwater robot systems and spacesuit-like diving equipment, underwater archaeologists obtained clear close-up views and made manual contact with well-preserved shipwrecks in two deep-water Canadian sites. Joseph B. MacInnes, a Canadian underwater scientist, reached the 19th-century British ship "Breadal-

A female skeleton estimated to be almost 10,000 years old was found in Texas. It is one of the three oldest ever found in North America.

bane," the northernmost shipwreck discovered on the seafloor, under approximately 100 m (350 ft) of Arctic ice and water.

NORTH AMERICA AND THE CARIBBEAN. Working with the Bahamian government, U.S. archaeologists announced the discovery of concrete evidence of Columbus's 1492 landing at San Salvador Island, one of the smallest of the Bahamian archipelago, located 565 km (350 mi) southeast of Miami. After a 12-year joint effort between the Bahamian government and the New York Center of Finger Lakes, archaeologists under the field direction of Charles Hoffman of Northern Arizona University announced the discovery of four green and yellow glass beads (datable to between 1490 and 1560), metal spikes, two brass buckles, and Spanish pottery together with native Arawak shards, all found at a depth of 20 cm (8 in) below the modern surface. Based on his journals, it is known that Columbus traded beads, buckles, and rings with the Indians. Given that the native population was wiped out by disease and slavery by 1520 and that the beads and European pottery predate their demise, the investigators believe it is possible that these finds belong to the site of Columbus's first landing in the New World.

Deep underground on the Tennessee-Kentucky border, archaeologists discovered seldom-found traces of prehistoric daily life. The discovery was suppressed for several years for fear that vandals might loot the fragile traces, but in 1983 archaeologists Patty Jo Watson, Louise Robbins, and Ronald Wilson reported the discovery of some 269 male and female footprints dating to at least 4,500 years ago, perfectly preserved deep in the moist clay of a 13-km (8-mi) labyrinth of the caverns of Blowing Cave in Pall Mall, Tenn.

Finally, as a modern demonstration of the potential utility of ancient techniques and tools, 39-year-old L. Adrian Hannus, a U.S. archaeologist, underwent two hours of abdominal surgery with a modern replica of a razor-sharp ancient prismatic stone blade. Not only did the patient do well, but the experiment demonstrated that those stone blades could work as well as modern surgical instruments. This experiment also augmented previous archaeological evidence (in the form of healed bone incisions found in burials throughout the Americas) that the ancient Mexicans, Peruvians, and other New World groups performed major surgery on organs and bones thousands of years ago.

(JOEL W. GROSSMAN)

See also Anthropology.
[723.G.8c; 10/41.B.2.a.ii]

Architecture

The mode of architectural design or "style" christened "postmodernism" in the late 1970s had certainly come of age in 1983. The work of U.S. architect Michael Graves, in particular his Portland (Ore.) Building, attracted wide comment and strong emotions. Could this style now be said to be the dominant preferred clothing for new buildings in the United States?

In January John M. Dixon, editor of *Progressive Architecture*, reviewed the magazine's 1983 awards and attempted to trace and tabulate trends in design of the winning projects over the past five years. Postmodernism remained the style chosen by a majority of winners of the past two years, though overall there was no one dominant trend in a period characterized by randomness and variety. Dixon's stylistic categories included modern, postmodern, classical, vernacular, historical ornament, contextual, and energy-conscious. Modern was defined as having "functionally determined form, nonbearing walls, exposed structure, and fluid interiors." This would appear to include many of the buildings described as "high tech," which are distinguished by their brightly coloured exposed service ducts and structural members, often enclosing a "glass box" space and usually having industrial or technological references. "Postmodern," by contrast, is historical in form, if not detail, and is characterized by traditional load-bearing walls, pierced window openings, defined interior rooms rather than interconnecting flowing spaces, complexity, and perhaps irony, ambi-

Archery:
see Target Sports