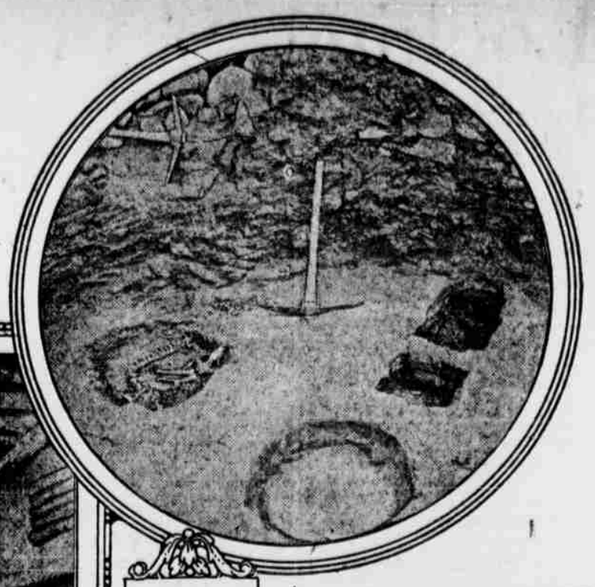
America's First Apartment House, 1,100 Years Old, Rivals Our Marvels

Excavations in New Mexico Show Conveniences Upon Which Modern Builders Pride Themselves Were Known to Pueblos Centuries Ago—1,200 Persons Accommodated in One Cliffdwelling—Iceless Refrigerators and Terrace System of Lighting and Ventilation Used by the Ancients

CORNER OF SECOND STORY WITH DETAIL OF CEILING

HOPI INDIANS, DESCENDANTS OF AZTECS, LIVING IN A PUEBLO



INTERIOR OF KIVA SHOWING VENTILATING DUCT, FIRE-PLACE and WOLF SKELETON

By JOHN W. HARRINGTON.

DISCOVERIES just announced in the excavating of the "First American Apartment House" at Aztec, New Mexico, reveal the mysterious people of the Pueblo as a race high in ingenuity and civilization, who anticipated the ablest builders in modern America by more than one thousand years.

The important relics and remains just unearthed form a connecting link between the culture of the Southwest and the manners and the customs of the present. These remarkable objects now in transit to the American Museum of Natural History crown the achievements of its representative, Earl H. Morris, and his coworkers, who for the last three years have been exploring the great peublo, with the financial support of Archer M. Huntington, who has done so much to bring the people of the United States in contact with the exploits of the Spaniards who gave this New World first to Castile and Leon.

When through the fortunes of war this nation wrested from Mexico the wonderful Southwest there were some important finds made in the cliff dwellings of the region now known as Arizona and New Mexico, but they did not contribute much to our knowledge of that ancient people from whom a great deal has been learned and is still to be learned. The antiquities which now have been brought to light will be available for careful study and research, for they are not only a treasure trove to the archæologist, but may prove of great practical value to the men and women of this workaday world.

Egypt of New World.

"The Egypt of the New World," that land of the mesas of mystery has often been called from which the museum savants have taken these evidences that there once lived a race more advanced in the ways of community life than were any of the aborigines of North America.

The wrapped bodies of the five children which have just been brought to the outer air after having been in a burial chamber for ten or twelve centuries at least and probably more suggest a similarity between our own Southwest and the land of the Pharaohs. The forms of the small pueblos whose souls went to the happy hunting grounds so long ago seem not unlike mummies, with thick shrouds of rush mats, rolled and folded and bound tightly about them with cord of yucca. Here is the same dry-hard climate such as one associates with Egypt, the same kind of territory where the San Juan River gave fertility through man made sluices, as did the Father Nile—and here are mighty pyramidal dwellings, like gigantic flights of stairs reared by patient toilers, who had neither beasts of burden nor wheeled vehicles.

The bodies of the dead were not preserved with spicery and drugs such as the Egyptians used, and yet in the climate of the Southwest the skeletons at least are well preserved through the centuries. Some of the bodies found in the pueblos have hair and vestiges of skin and bear the ornaments, often of turquoise, with which they were buried. The children were adorned in lifetime with long strings of tiny beads bored with the cactus thorn. With the dead, as is shown by this recent discovery of rooms absolutely intact and with the cedar ceilings still in place as though the tenants had left them only lately and they had been suddenly filled with dust and debris, were buried pottery, stone implements, cloths, rugs and many other objects. The articles which Mr. Morris has obtained are reported to be in a fine state of preservation. The textiles used in the burial wrappings closely resemble the faded Coptic cerements of the far distant land where Rameses ruled. The public of New York is likely to see one day these carved wooden boards, the plaques of basketry and the tools of bone and stone which will shortly be placed among the collections of the museum.

Close to State Line.

The ruins at Aztec, New Mexico, are about two hours ride from Durango, Col., as they are close to the State line. The huge apartment had 400 rooms and had an area of 90,000 square feet. It was covered over with dust and sand, but owing to the labors of the explorers it has now been almost all disclosed, and some of the rooms are accessible to the visitors who foregather there by automobile on pleasant days.

Standing four and often five stories in height in places, this ruin must have been an impressive sight in the sixteenth century when Coronado, the Spanish adventurer, went on his quest for the lost "Seven Cities of Cibola." He had started to find gold and precious gems in the mystic realms of the Southwest. In his explorations which began about 1540 and extended into that region and then to the eastward as far as Kansas he was probably the first white man who led an expedition into this region of the storied past. To the metropolis of the western world there are coming store and riches from the castlelike cities which Coronado searched in vain for such wealth as Peru yielded to the conquistadores of old. If silver and gold the people of the pueblos had none, they certainly did leave a cherished heritage to modern America in several arts and certainly in architecture.

It was only a few years ago that apartment houses came into being in New York city, and at first they were called "French flats" just as though France had actually invented them. Then we took much credit to ourselves for building very large apartment dwellings and called ourselves most progressive. Why, the people of the pueblos were equalling the best American builders in ingenuity for at least six hundred years before Columbus set sail in his frail caravels!

Held 1,200 Persons.

As shown by the discoveries at Aztec, the Pueblo Indians designed apartment houses which were perfect in their appointments. This one probably housed more than twelve hundred persons in all. It was built of dressed sandstone, brought from quarries two miles distant. The walls are from three to three and a half feet thick at their bases and taper slightly toward the top. The stone was held together by adobe or mud which withstood the rain well, as downpours were restricted to certain times of the year, and was restored by frequent pointing up.

There are certain very modern architects who praise themselves mightily for having invented tapestried bricks and various gradations and arrangements in stone when they erect apartment houses. The Pueblos anticipated them all by building this apartment house of skilfully selected sandstones of various hues. Here and there the monotony of the side walls is relieved by introducing thin bands of sandstone of somewhat darker color. The effect is artistic and pleasing.

The roofing and flooring were made of cedar logs and strips brought in all probability from forests one hundred and sixty miles distant, where timber could be cut and floated down the stream on which the pueblo stands. Although the lumber was dressed only with stone tools, for these Indians had not even reached the age of the bronze, it was skilfully combined and handled. The ceilings are skilfully braced and supported, and some of them, as was the case in several of the rooms which have recently been explored, were left intact. Builders of to-day may well study these examples of craftsmanship.

When these apartments were new they must have been very livable and comfortable indeed, with the odor of the fresh cedar above them and the clean, hard stone walls.

These days architects tell us that by terracing back the tall skyscrapers and apartment hotels which they are building they get fine light and ventilation. Why, this is the very newest thing with them. The Pueblos at Aztec knew all about that terrace idea, and they climbed from story to story by ladders.

When we go flat hunting these days we are told about the many modern improvements such as air vents, which bring oxygen to all parts of the dwelling, and wonderful refrigerators which keep food cool without the use of ice. Save the mark! The Pueblo architects were doing all this very well before any white man knew what an apartment house meant.

In the plan of the community dwelling at Aztec may be seen certain round assembly halls or clubrooms which were especially noted for their up to date appliances. They were built in circular form and partly above the surface. On their outer walls were built what appeared to be chimneys but in reality were ventilator shafts. At the bottom of these shafts were ducts buried in the ground which opened up near the centre of the floor. Through these shafts and ducts the air was led down into the council chamber. The draft was created when the currents were sluggish by building a small fire on a hearth near the opening of the duct. The smoke rose upward and found vent in a hole in the roof. The draft thus created sucked down more air through the brick ventilator and kept the air within the room always fresh.

The cool currents which coursed through the ventilator were used for refrigeration for meat, and other food was placed in them. With the porous earthenware bottles, which depend upon the evaporation of the water from their outer surface to keep the contents cold, the air currents were of especial help in having a drink almost as cold as the iced ones of these prohibition days. This type of refrigeration, as a result of the investigations made in the pueblos, is being adopted by many of the people of the Southwest in their quite civilized houses.

And, by the way, these round council chambers or kivas, as the archæologists persist in calling them, were men's clubs, to which women were never admitted except two or three times a year when "ladies' days" were held. At other times they were permitted to come as far as the door to bring food. Such a thing as disturbing a Pueblo at his club was unheard of. This was his lodge, and if he chose to stay out all night it was nobody's business, and it would have fared ill with any wife who had laid in wait with a corn pestle, the nearest approach to a rolling pin, waiting to lay it over the head of her lord and master. These first American clubs were centuries ahead of our best known social clubs, and they had waiting lists, too.

When a youth was considered eligible he was introduced to the sacred circle, and in fact he lived there all the time until he was married, and then he stayed there whenever he felt like it, and—well it was nobody's business if he stayed pretty late or never went home until morning. The clubs or meeting places of the clans were usually designated by the names of animals. One of the largest kivas at Aztec, which has been completely restored, was evidently known as the Wolf Club, for near the fireplace there was unearthed the body of one of the lupine breed.

The clubs had a part in the government of the community also, and their heads received orders from the caciques or heads of the villages or towns, which might comprise two or three of these large apartment houses. The Spaniards adopted the name cacique, which is still good Mexican for governor.

Dr. Clark Wisler, curator of the Department of Anthropology of the American Museum, said recently that among the many things which the white settlers of the Southwest had learned from the descendants of the Pueblo Indians was government. The Pueblos were undoubtedly the best organized of the aboriginal races north of the land of the Aztecs, and they had a civil and a religious government which ran side by side with seldom a clash. The priestly caste, however, exercised considerable power at times and often won out when questions of authority arose.

Product of Evolution.

In their economic life, the Pueblos were the product of evolution. They were originally nomadic, as far as the Huntington Survey now shows, and worked their way toward the locality where they were found from a centre in the valley of the Rio Grande. They had acquired a great deal of skill in the making of black and white pottery and basketry, and were proficient in the use of stone tools, as we have seen, but their ingenuity and resourcefulness were developed most when they took up their abodes in Arizona and New Mexico. Their type of community or apartment houses had grown out of the need for common defence against marauders. It was an arid land to which they went, but they developed and held it by means of agriculture. Rains were infrequent, but irrigation kept these tribes in corn and the fruits of the earth. They showed in their farming that fine ability to live on the country no matter how unpromising it may look which those citizens of the ice the Eskimos reveal in their wresting a living from the inhospitable North, as we of the temperate zone call it. The corn and other produce which they found, were very acceptable provender. Some idea of how these people lived may be gained by looking at the remarkable group of their cousins, the Hopi, which is on view in the southwest hall of the museum. Corn, sheep, dried peppers and the like were their principal diet. In that fascinating account of the long tour of exploration made by Coronado it is told how this race of apartment house dwellers cooked "most delicious cates," which the hungry adventurers ate in prodigious quantities when they had put the inhabitants to flight and found no gold.

In making an oasis out of the desert, the Pueblos had much hard work to do. They had continually to guard against the soil becoming too alkaline and thus burning up and withering the crops which they so carefully nurtured. So they rotated crops when they could. Alfalfa, for instance, serves often to correct alkalinity. At times the dwellings were abandoned, without special reason, as far as the explorers of the sixteenth century could see, but in reality, this was generally because the soil had become unfit for cultivation, for often the water itself had absorbed an excess of the alkali, which made it blast, instead of fostering the vegetation.

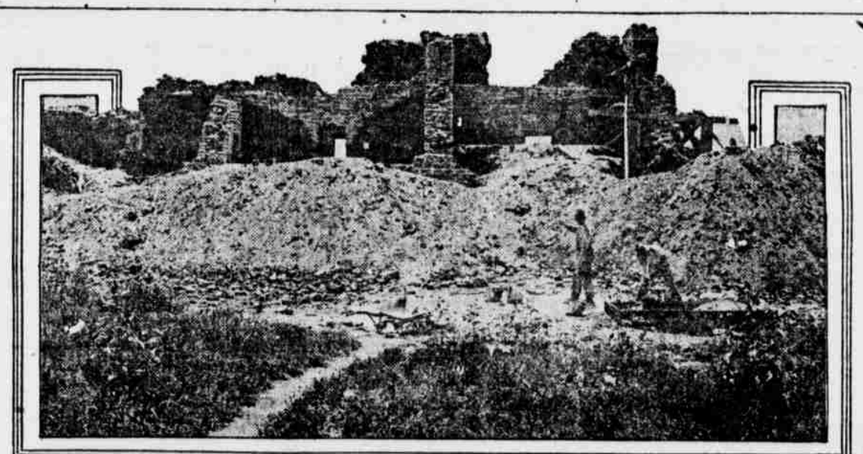
Skill in Textile Art.

The people of the Pueblos showed much skill in the textile art, for besides the cotton which through their irrigation they were able to raise, they made blankets from the wool of the wild sheep. Coronado speaks of the soft garments of great beauty which he had seen when making his journeys among them.

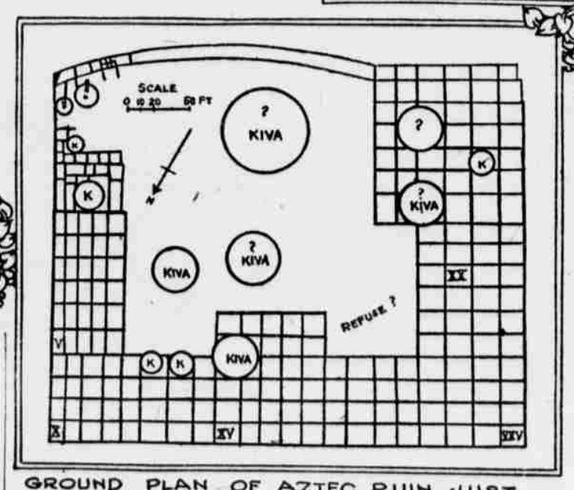
As architects and farmers and craftsmen, therefore, the Pueblos lived up well to their traditions and were a race which had many fine qualities, which fitted them for the community into which they formed themselves.

The excavation of the ancient ruin at Aztec, valuable as it is of itself, is only one of the activities which have been carried on under the Archer M. Huntington Survey. N. C. Nelson, also of the museum staff, did some valuable work in the Rio Grande district, explorations at Zuni were made by Prof. A. L. Kroeber of the University of California and by Leslie Spier. Dr. A. V. Kidder also contributed to the knowledge of these peoples by independent work in Utah and Colorado. The nomadic peoples were under investigation by Dr. P. H. Goddard, and the tribes of the higher plateaus north of the Colorado and the Hopi by Dr. R. H. Lowie.

From the studies made of surviving natives as well as from the prehistoric remains, science of to-day is able to give a romantic and convincing picture of the culture of this able race which so greatly developed an architecture and a community life in the land of vast open spaces, of bright hued mesas and of skies which are like an inverted bowl of crystalline blue. The people of the Pueblo deserve well in the regard of the race which has come to possess this land, for they builded better than we knew.



THREE STORIES ALREADY EXCAVATED



GROUND PLAN OF AZTEC RUIN JUST EXCAVATED.

INTERIOR OF KIVA SHOWING BUTTRESS and CEILING

Women Active in Politics

Continued from First Page.

cerning the candidates in next Tuesday's election. Forty thousand women will be thus circularized and it was Mrs. Tiffany who thought of doing it. The data were collected from the most reliable sources and the 40,000 women who received the leaflet last week will have themselves to blame if they don't go to the polls well primed to vote for the best interests of Father and Mother Knickerbocker.

Miss McCook a Speaker.

Well, one could go on indefinitely enumerating similar cases. There is pretty Miss Martha McCook, daughter of the former William McCook of New York and Washington. Not so long ago her friends thought of her as an attractive society girl, having a good time. When war came she developed a surprising efficiency, which soon sent her to France as head of the women's division of the Y. M. C. A. Now she is a working member of the New York State Republican Women's Executive Committee and making speaking tours everywhere for the G. O. P.

Miss Maude Wetmore, chief of the National League for Women's Service from its beginning, is now serving on the Republican Women's National Committee. Then ther is Miss Marion Parkhurst of Plattsburg. Way back in 1915 she set up a suffrage canteen at the gate of the training camp at Plattsburg, and fed the would be officers well. Soon after America entered the war she was called to Washington, where she was head of the balance stores of the Bookkeeping and Supply Department of the Ordnance Department—said to be the first woman drafted by the War Department for official duty. Now Miss Parkhurst is on several Republican committees. She was famed as the tallest and one of the best looking leaders of divisions in the first large suffrage parade in New York.

Though the women who claim to be non-partisan are most in the public eye, and to the casual eye the entire sex appears to be anti-Tammany, as a matter of fact there are lots of the Tiger's lady friends on the job. The recent Democratic women's luncheon where Gov. Smith made his famous speech about Hearst proved that. And plenty of these Tammany women were war workers, if only there were space to tell about them. One woman who is working for Irwin Untermyer is Miss Sara McPike, who as head of the St. Catherine Welfare Association sold Liberty bonds and raised money for the Red Cross and so on. Miss Elisabeth Marbury, Democrat, who worked for the election of Gov. Smith and is now enlisted for the League of Nations, went abroad for the Knights of Columbus.

And then—

But we have simply got to stop somewhere, and we might as well stop here.

Rodin, the Master Sculptor

Continued from Second Page.

brated all over the civilized world as the educational institution par excellence for young ladies, especially for those of riches and good birth, and up to the day of the closing for a girl to have been educated at the Sacred Heart Convent in Paris was synonymous to saying that she was the very acme of perfection in deportment and manners. The traditions of Hotel Biron, the elegance and the courtliness, the formality of courts always clung persistently about that particular convent, and many of our own smartest and most elegant young girls have received their education there, and still hold these as the most happy and delightful years of their lives.

No attempt was made by the sisters to keep up the gardens. On the contrary these were allowed to run riot, and in the years nature went back to its primitive wildness.

In one corner, choked up with weeds and overrun with vines, there was for years a curious relic. It was known as the cemetery of royalty, and consisted of a heterogeneous collection of ancient statues, statues of royal personages which in the days of the monarchy had ornamented the public squares and gardens of Paris. These had all been removed when France became a republic, and lacking a more appropriate graveyard, they had been piled in the hidden gardens of Hotel Biron. Napoleon was there with one hand sticking up protestingly out of the mass of verdure, Louis XV., Louis XIV also, Catharine de Medicis, the bloody Henry II., her husband who met a violent death, Marie de Medicis, mother of Louis XIII., who died in exile at Cologne, and many others. When the last of the religieuses (sisters) left the place, 1907, taking their departure for Belgium, Italy, Spain and England, the reminiscent effigy of another epoch disappeared, no one asks why or where.

Every epoch in France has produced its great sculptor; they do not seem to tolerate two. Houdon, Carpeaux, Rude, Rodin. And now it is Bartholomé who has inherited the worldly celebrity of Auguste Rodin. To Bartholomé has been entrusted the creation of the colossal monument which is to be erected in honor of the heroic American soldiers who fought on the battle fields of France in this world's war just ended. It is to be placed at Pointe de Granges, near Bordeaux. There is no room for uneasiness; it is sure to be something splendid.

That well worn saying of the Bible, that a prophet is not without honor save in his own land, is always being repeated, and it was true of both Rodin and Bartholomé, who each found favor and fame in foreign countries before being recognized in their own; and even now, the French writers say this themselves. It is in Germany that Bartholomé enjoys his greatest celebrity. With Rodin it was the same, and the creator of the Penseur had the habit of saying: "J'ai tourne l'Institut. Je l'ai pris a revers. Liberally translated, he made the circuit of the Institut and came in at the back door. It was after making a great success in foreign countries that he succeeded in vanquishing the came of the French Academy.

Bartholomé, who also is an independent and not a member of the Institut, was for a long time pursued by the antagonism of the officials, and he only succeeded in disarming them through the notoriety which he acquired with connoisseurs, both in France and beyond its frontiers. To-day one of the first visits of strangers in Paris is to Pere Lachaise to see Bartholomé's Monument aux Morts, which is placed just inside the gateway of the main entrance.

Bartholome began his career by being a painter, and he was one of the few who enjoyed the intimate friendship of that strange personality, that man hater, Degas, who has only recently passed away; Degas, who would never part with any of his pictures, who scoffed the Institut, and whose collection sold when he was no more for over $2,000,000. What was the secret of Bartholomé's change from painting to sculpture? One may be permitted to say that he lost a sweetheart whom he adored, and that he began by modelling a monument as a souvenir to her memory. Of this thought, the idea of his "Monument aux Morts" was born. Since that time Bartholome has become a specialist in monuments to the dead. The melancholy genius of this sculptor is at present on the upward wing.

Arsene Alexandre is very bitter at Germany's pretentions to have discovered the genius of Rodin, a country which, as he says, never had a great sculptor.