

THE CARACOL AS IT STANDS RESTORED TODAY—STILL A RIDDLE

ARCHAEOLOGY

## Mayas' Round Tower Restored, But Its Riddle Still Unsolved

THE MOST extraordinary of all the beautiful buildings in the Mayan ruins in tropical Yucatan stands restored—but it is an unsolved puzzle.

Archaeologists of the Carnegie Institution of Washington recently reported efforts to restore this building which adorned the Mayan Indian city of Chichen Itza in Yucatan betore the Spanish Conquest. The building, one of the most famous ruins in America, is called the Caracol, meaning in Spanish the Snail.

Starting in 1925, Carnegie archaeologists worked on the Caracol for six years in the winter season, when conditions are right for digging and clearing in tropical America. They report that the arduous task is accomplished. The graceful round building on its dignified stone terrace stands clean-looking, stripped of untidy undergrowth.

The upper story, which has inside a winding stairway in snail-shell pattern, is left incomplete. Long as they studied the ruins, the archaeologists still felt uncertain of the original plan for the tower. No other building in all the Mayan ruins of Yucatan offers a clue. Mayan architects rarely chose to construct round buildings. And the Caracol with its winding stairway and tower is unique, so far as the modern world has fathomed Mayan ruins.

What the building was used for is,

however, the major mystery. The Carnegie Institution states:

"To archaeologists the Caracol has proved to be an enigma, for they have been unable to decide with certainty what purpose it served or its date."

Even archaeologists of the Carnegie staff differ in their opinion as to the building's significance. Theories include: that the building was an astronomical observatory; a military or civil watch tower; a temple for worship of Kukulcan, great Feathered Serpent deity of the Mayas.

The favored theory is that the building combined several of these functions. Its tower contains a passageway oriented due west, as if to serve as a line of sight for astronomical observations. But science and religion mixed amicably in Mayan civilization; a headquarters for sun and star gazing might well be both a temple and a watch tower.

The Mayan people had to depend on astronomer-priests to tell them when to plant and harvest their maize, for the astronomers were guided by the sun's crossing the equator and other signs. Lucky and unlucky days also crept into every corner of Mayan life, as astrology mixed with astronomy. On all these matters, the layman consulted his advisers, the astronomer-priests.

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RCHAEOLOGY

## Find First Evidence That Mayas Knew of Keystone

THE FIRST discovery in early American civilization of a keystone in building arches has just been reported by Dr. Alfonso Caso, excavating at Monte Alban, dead mountain-top city in the southern Mexican state of Oaxaca.

Some prehistoric Indian in Mexico, it now develops, discovered how to make a true arch. And yet, strange to relate, the builders of Mexico's beautiful temples did not hasten to use the new idea. It was invented, and forgotten.

The Indian arches continued to be magnificent, but being without keystones they were not self-supporting, and they were clumsy in comparison with the early buildings of the Greeks and Romans.

The keystone, in fact, is the distinguishing characteristic which marks the difference between Old and New World building construction in the days before the white man came to America.

The Mexican mason who stumbled on the principle of the keystone used it in constructing a Monte Alban tomb. But either he did not grasp its valuable significance and never used it again, or else his was but one small voice in the architectural wilderness. So far no other evidence of the use of the keystone has been found in the extensive Mayan structures.

Dr. Caso's find occurs in a tomb ceiling made by lean-to slabs. Gabled tomb ceilings made in this way are plentiful at Monte Alban and elsewhere but miss being true arches since their keystones are lacking.

The keystone tomb was found buried under three layers of plaster floor in the layer known to be next to the oldest in the city's history.

Technically the tomb will be recorded as No. 77 and is the richest since famous No. 7, which contained a remarkable treasure of gold and precious Indian stones.

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MININ

## Ducks Discover Gold For Russian Miners

DUCKS, nuzzling a muddy pond bottom near the village of Yemasn Pavlovo in the Ural Mountains, yielded gold nuggets when they were killed and their gizzards slit open. Prospectors immediately went out and found the "pay dirt" deposits from which the nuggets had washed into the pond.

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