

# The 'Titanic of the ancient world' yields new treasures

by George Vardas



It has been described as possibly the most important, most famous shipwreck from antiquity. And according to Brendan Foley, one of the lead divers, the Antikythera shipwreck is almost certainly a treasure ship which we have only just begun to explore.



In 1900, sponge divers from the Greek island of Symi whilst anchored along the eastern coastline of Antikythera waiting for a ferocious storm to pass stumbled upon a startling discovery. Underneath the crystalline waters, lay an incredible wreck undiscovered for thousands of years which gradually yielded life-size bronze statues and remarkable artefacts, the most famous of which was the famed Antikythera Mechanism.

According to Foley, “this is probably one of the largest, most expensive ships that was sailing in the first century BC. The 1901 sponge divers reported that the artefacts were spread among an area about 52 metres along the seafloor. And that corresponds nicely with what we’ve observed in our dives on the site” he said.

“The evidence shows this is the largest ancient shipwreck ever discovered,” says Foley. “It’s the Titanic of the ancient world.”

*Right→ The most remarkable object they found, however, was a bronze spear measuring 6.5 feet long. Foley and his colleagues believe that the spear may have been part of a statue of a warrior or the goddess Athena, or perhaps of an even larger horse-and-chariot sculpture. Divers on the original excavation in 1901 discovered four marble horses in the wreck, which Foley suggests could have originally been part of such a sculpture, accompanied by a warrior riding in a chariot and carrying the spear in his hand.*



The archaeologists have recovered tableware, metal fittings from the 1st century BC wooden ship, a beautiful intact table jug, part of an ornate bed leg, and most impressive of all, a 2-metre-long bronze spear buried just beneath the surface of the sand. Too large and heavy to have been used as a weapon, it must have belonged to a giant statue, perhaps a warrior or the goddess Athena, according to Foley

The new excavation effort, which ran from 15 September to 7 October, was led by the Hellenic Ephorate of Underwater Antiquities, Greece, and the Woods Hole Oceanographic Institution, US. The Head of the Ephorate, Ms Angeliki Simossi, said the freighter, believed to have been sailing from a Greek island to Italy, was carrying works of art from Roman-conquered Greece that had been specifically requested by rich or cosmopolitan Romans to decorate their villas.

The wreck lies in 55m of water and requires divers to use rebreathers. Even so, their time on the bottom is limited to just three hours. As a result, the expedition witnessed the first use of a new robotic Iron Man-like diving apparatus called the Exosuit which enables its occupants to stay down for up to 50 hours, if necessary. The suit, which makes the wearer resemble the cinematic Buzz Lightyear, has greatly expanded the divers' capabilities and the potential for greater things to come.

The search for this year has finished, curtailed in part by rough weather which probably explains why the vessel sank in the first place. But excavators hope to return in 2015 and find that much more may lie beneath the sand. "I don't know what there is there - perhaps more works of art or parts of the ship's equipment, but we really have to dig," declared a triumphant Ms Simossi.

These sentiments were also shared by the Greek Minister for Culture, Konstantinos Tasoulas, who met the archaeological dive team in Athens and praised the scientific importance of the mission as well as the excellent cooperation between public and private sectors which helped fund the program. Finally, the Minister also thanked the municipalities of Kythera and Antikythera and the islands' residents, who greeted the divers and support crew with warmth and offered



*"It was a floating museum, carrying works from various periods; one bronze statue dates from 340 B.C, another from 240 B.C, while the Antikythera Mechanism was made later", according to Ms Simossi*



© Argo/Brett Seymour



help and assistance throughout the duration of the program.

It is noteworthy that our very own John Fardoulis, whose own personal efforts and unbridled enthusiasm and energy in promoting the exploration of the Mentor wreck off Kythera are legendary, was part of the Return to Antikythera exploration team and no doubt we will hear more about the exploits of the team from John in the months to come.

Greece has enjoyed a stellar month of archaeological discovery and excitement, commencing with the discovery of the incredible tomb (thought to be Macedonian) in Amphipolis in Northern Greece and culminating in the exploration of a legendary ancient shipwreck that has never ceased to capture the world's imagination.

## WHAT IS THE ANTIKYTHERA MECHANISM?

The Mechanism was recovered in 1900 from the Antikythera wreck - a Roman cargo shipwreck off the Greek island of Antikythera.

It was discovered in a wooden box measuring 13 inchesx7 inchesx3.5 inches (340x180x90mm) and consists of bronze dials, gears and cogs.

A further 81 fragments have since been found containing a total of 40 hand-cut bronze gears.

The mechanism is said to have been created in around 100BC, and is believed to be the world's oldest calculator.

Previous studies have shown that it was used to chart the movement of planets and the passing of days and years.

Scans of the mechanism in 2008 found that it may also have been used to predict eclipses, and record important events in the Greek calendar, such as the Olympic Games.

Astronomer Professor Mike Edmunds of Cardiff University said at the time: 'It is more complex than any other known device for the next 1,000 years.'

The scans also revealed the mechanism was originally housed in a rectangular wooden frame with two doors, covered in instructions for its use.

At the front was a single dial showing the Greek zodiac and an Egyptian calendar.

On the back were two further dials displaying information about lunar cycles and eclipses.

The calculator would have been driven by a hand crank.

The mechanism recorded several important astronomical cycles known to the Babylonians hundreds of years before that help predict eclipses.

These include the Saros cycle - a period of around 18 years separating the return of the moon, Earth and sun to the same relative positions.

The device could track the movements of Mercury, Venus, Mars, Jupiter and Saturn - the only planets known at the time, the position of the sun, and the location and phases of the moon.

The researchers have been able to read all the month names on a 19-year calendar on the back of the mechanism.

The month names are Corinthian - suggest that it may have been built in the Corinthian colonies in north-western Greece or Syracuse in Sicily.

The device was created at a time when the Romans had gained control of much of Greece.

The Mechanism is on display at the National Archaeological Museum in Athens.



More than 80 fragments of the Mechanism have been found, containing a total of 40 hand-cut bronze gears (pictured)