

Kyllene Harbour Project 2007-2009. Marine geoarchaeological investigations at the ancient and medieval harbour of Kyllini/Glarentza (NW Peloponnese, Greece)

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Abstract

The study presents the preliminary results of archaeological topographical survey and marine geophysical investigation conducted on the ancient harbour site and Crusader's port of Kyllini/Glarentza in NW Peloponnese, Greece (2007-2009). Ancient Kyllene was one of the harbours that served the sanctuary of Olympia and an important naval base in the 5th c. BC. The Medieval harbour of the city of Glarentza was built by the Franks in the 13th century and developed as one of the major ports during the Crusaders' period, in NW Greece. The medieval harbour installations were built on top of the ancient port of the Classical period. The main objective of the project is to study the geoarchaeological evolution of the harbour site during the centuries in order to reconstruct the maritime façade of the city for the different construction phases.

The Kyllene Harbour Project is a joint project of the Finnish Archaeological Institute at Athens and the Ephorate of Underwater Antiquities; it is conducted in collaboration with the University of the Peloponnese, the Laboratory of Marine Geology and Physical Oceanography, Department of Geology, University of Patras and the University of Mainz.

The archaeological survey concentrated on the precise 3D topographical investigation using total stations to measure details of the harbour remains and shallow-water features. The marine geophysical study employed a 3.5kHz sub-bottom profiler system, a side-scan sonar system and an Overhauser magnetometer in order to examine the seafloor bathymetry and acoustic stratigraphy and to locate potential targets of archaeological interest.

The synthesis revealed the distribution of the submerged harbour remains and the seafloor morphology. Methodologically, the study demonstrated that the use of remote sensing techniques in conjunction with detailed archaeological and topographical survey in shallow-water coastal sites could be an effective methodological approach for the study and landscape reconstruction of submerged ancient ports and coastal installations in the eastern Mediterranean.