Reconstruction of Late Quaternary Shorelines in the Eastern Mersin Bay : Inferred from high-resolution seismic records and known sea-level curves

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Analyses of an extensive grid of Late Pleistocene/Holocene erosional surfaces from seismic reflection profiles along with previously published sea-level curves and several sedimentary environment information from Eastern Mediterranean (See ERGIN *et al.*, 1991 and references therein) permit an outline of the paleogeography of the Eastern Mersin Bay (E. Mediterranean) during the Late Pleistocene and Holocene changes of sea level (Figs. 1 and 2.). Taking a reduced accuracy into consideration; when combined with suitable global average sea-level curves not seriously affected by tectonic or isostatic complications, the high-resolution shallow-seismic profiles enable us to construct not only the positions but also the ages of the formerly subaerial and lowered Late Quaternary shores in the Mersin Bay. A number of uncertainties in the rates of sea-level fluctuations, which are difficult to quantify, still remain. Nevertheless, we believe that, with the results presented here, it is possible to interpret the Late Pleistocene to present paleogeography of the continental shelf of Eastern Mersin Bay.

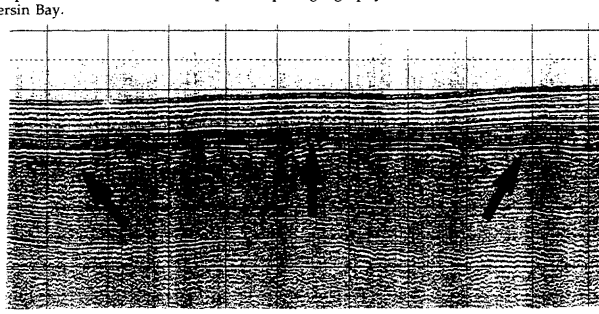

Fig. 1.- High-resolution seismic profile obtained off the coast of Mersin, southeastern Turkey. Note the pre-Holocene erosional surface.

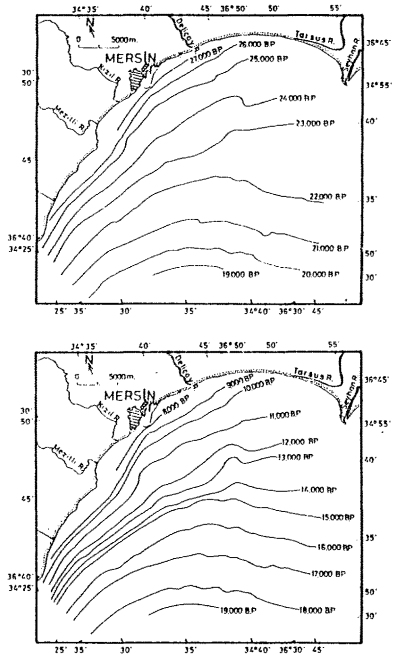

Fig. 2.- Isopach map of the Late Pleistocene (top) and Holocene (bottom) shorelines of Mersin Bay, lasted from about 27 000 to 8 000 yrs B.P.

REFERENCES

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