

# **A Comparative Study of the WAM and a Second Generation Wave Model in the Mediterranean Sea**

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## **Abstract**

The WAM and a second generation (SG) wave models are used to hindcast the surface state of Mediterranean Sea with the wind fields provided by the ECMWF initialised analysis during December 1992. The wave hindcasts were evaluated against time series of measured significant wave height, period, and direction obtained at eight buoys moored near shorelines of Mediterranean Sea. The wave height time series for a deep ocean point are quite similar in both models simulations during the wave growth stage. The SG model tends to delay the beginning of the decay stage and simulates wave peaks slightly greater. Conclusions regarding the performance of both models in shallow water and coastal zones cannot be simply stated. Appropriate spatial and temporal resolutions, and a wind analysis approach, incorporating non-conventional wind data with the global centres gridded analysis, have to be considered.

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## **Hindcast and Calibration of the Wave Conditions in the Black Sea**

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## **Abstract**

A seven year hindcast of wave conditions in the Black Sea has been performed using ECMWF surface wind fields and the WAM wave model. The results have been validated and calibrated using Topex satellite altimeter data. General statistics have been evaluated for the whole basin. The results provide a perfect input to evaluate the wave conditions at any nearshore location, using the Eurowaves methodology, which is described in a parallel paper at this conference.