

NEW RELEASE

Early oil spill prediction in the Gulf of Famagusta by the "Mediterranean Decision Support System for Maritime Safety" project

The pioneering project MEDESS-4MS (Mediterranean Decision Support System for Marine Safety), co-financed by the Structural Funds of the European Union via the Med Programme and by National Resources, concerns the application of an integrated operational forecasting system for oil spill prediction in the entire Mediterranean. This system may be used not only by EU members but also by other countries.

Upon completion, the MEDESS-4MS system will be coupled with the new satellite monitoring system CleanSeaNet of the European Maritime Safety Agency (EMSA), as well as with existing national and regional platforms, like REMPEC which uses the results of operational oil spill predictions, or MEDSLIK, a tool developed by the Oceanography Center, University of Cyprus, which gained recognition after providing accurate and timely predictions for the biggest oil spill incident in the Eastern Mediterranean, in 2006 in Lebanon. Also, the MEDESS-4MS system will be coupled with the Automatic Identification of Ships service and will use sea state data from the Marine Services of Copernicus and from national oceanographic forecasting systems, like the Cyprus Coastal Ocean Forecasting and Observing System (CYCOFOS).

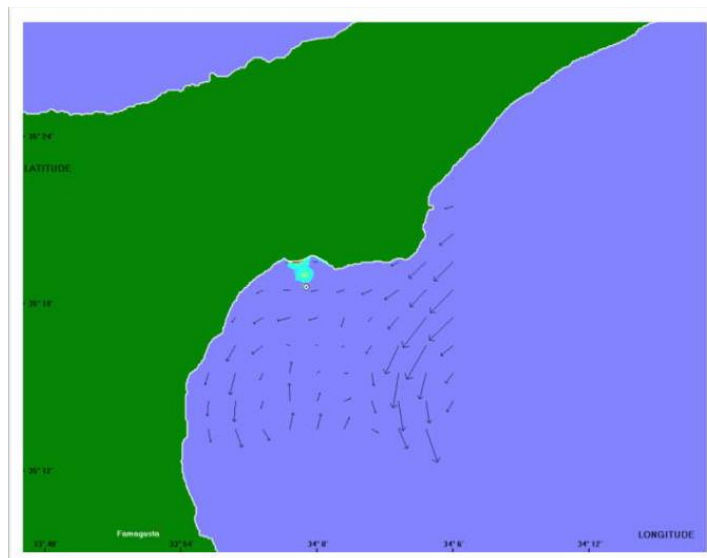
For the development of the MEDESS-4MS system, a collaboration of 21 partners from 7 Mediterranean EU countries has been established. With total funds over 6 million euro, the coordinators of the project are the Department of Merchant Shipping, Ministry of Communications and Works and the Oceanography Centre of University of Cyprus.

The MEDESS-4MS system will assist response, control and decision-making agencies during oil spill incidents through three types of operational scenarios. The first scenario will provide immediate operational oil-spill prediction after a warning alert from satellite data or observing platforms. The second scenario will involve the provision of oil spill simulations after end user request. This scenario will enable end users to have access to environmental data and model outputs and consult historical data for the best determination of the ship or platform position that caused the pollution. Finally, the

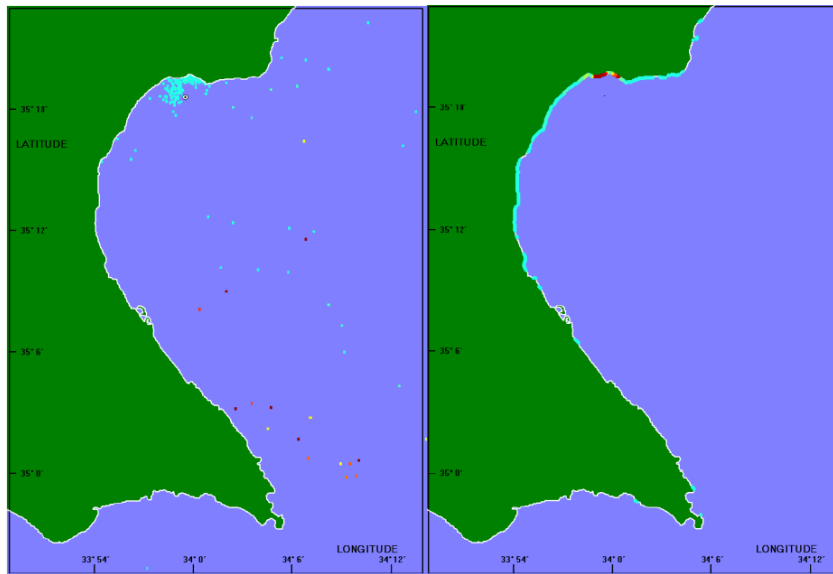
Decision Support System which will assist the response agencies for managing emergency operations providing a set of possible scenarios based on the foreseeable meteo-marine conditions.

The usefulness of the MEDESS-4MS system has been demonstrated in the recent oil spill incident in the occupied area of Famagusta, on 15 July, 2013. This incident concerns the leak of around 100 tons of crude oil from a ship in the northern part of Famagusta Bay.

The Oceanography Center, University of Cyprus, in cooperation with the Department of Merchant Shipping (DMS) and the Department of Fisheries and Marine Research (DFMS), within the framework of the national plan of action and the MEDESS-4MS system, provided the predictions on oil spill dispersion. This valuable information confirms that had the occupying forces accepted the help offered by DFMS and DMS and taken immediate actions to prevent the oil spill, the biggest part of the oil spill could have been limited to the first 12-18 hours from the time of reporting the incident. Also, the prediction showed that there was no risk of oil dispersion southern in the Paralimni area, apart from some traces that were sunk and carried away from the sea currents (since no measures were taken by the occupying forces to prevent pollution).



Prediction of the dispersion of the oil spill during the first few hours after the report of the pollution incident.



Prediction of the dispersion of the oil spill in the water column (left) and affected coastal areas (right) two weeks after the pollution incident report.



Part of coast polluted by the oil spill (source: worldbulletin.net). Had the occupying forces responded on time accepting the equipment offered by Cyprus Authorities, this environmental disaster would have been avoided.

Project website: www.medess4ms.eu

End of announcement