Advances in Spanish marine data availability in the framework of EMODNET data ingestion EU-project.

Elena Tel, Instituto Español de Oceanografía, IEO. (Spain), elena.tel@ieo.es Gemma Ercilla, Instituto de Ciencias del Mar, CSIC (Spain), gemma@icm.csic.es Javier Valencia, Lyra Ingenieria (Spain), javi.valencia.m@gmail.com Belen Alonso, Instituto de Ciencias del Mar, CSIC (Spain), belen@icm.csic.es Irene Chamarro, Instituto Español de Oceanografia, IEO (Spain), irene.chamarro@ieo.es

The Spanish coast extends for 7879 km in which 58% of the Spanish population lives, almost 23 million people. In addition, Spain has more than 1 million km² of marine waters, more or less twice the land area of the country. These characteristics favor that an important part of its economic activity is linked to the use of the resources that the sea offers, and generate a valuable amount of marine information. However, these data are scattered in private sectors and public administrations.

EMODNET Data Ingestion is an EU-funded iniciative that promotes the incorporation of marine data into databases for publishing as open data and contributing to applications for society. Marine data remains stored and dispersed throughout the European Union countries, and provide a legacy of continuing usefulness and importance. Their secondary use increases the knowledge and understanding of the marine environment. Promotion of this data accessing and sharing has different responses depending on their confidentiality issues or the lack of them. Already ingested, data show the variated information that will be reused in the framework of EMODNET iniciatives, but also in different aproaches that are not previously though.

As an example of unexpected uses, the coastal temperature timeseries of the El Bocal aquaculture facility on the North coast of Spain, are nowadays being crossed with medical data in the search for environmental factors that can affect health. Also, those timeseries can be useful in climatic variability assessments.

The bathymetric and geological data from old research campaigns contribute to improve the knowledge of the seafloor nearsurface, allowing a better approach to future local and regional studies about global climate change, pollution control and assessment, slope stability etc. Aditionally, those data contribute to the implementation of improved digital terrain models that can be used, for example, to perform useful simulations in tsunami warning systems or other coastal risks.

As expected, all these ingested data are evaluated, metadata to preserve their authorship and favor their reuse. Finally, they are incorporated into European databases in internationally accepted formats and depending on their discipline used for the development of EMODNET products: bathymetries, distribution maps of different ocean variables, climatologies and trends, among others. In consequence the effort to promote EMODNET-DI is valuable, although the response may be uneven.