

**“The Future of the 21<sup>st</sup> century ocean”**  
**European marine Research Infrastructures Symposium, 28 June - 1 July 2011**

*The Brest declaration*

Acknowledging the major contribution that seas and oceans can make to the EU 2020 objective of a smart and sustainable growth for Europe;

Recalling the great challenges for the future of the 21<sup>st</sup> century ocean as stated in the “Ostend Declaration”;

Recognizing that the research infrastructures are at the heart of the Innovation Union;

Underlining the need for further development of the European marine research infrastructures in the following areas:

- Global, regional and coastal ocean observing systems including remote sensing (climate, operational oceanography, geohazards)
- Research fleets
- Land and off-shore based experimental facilities (microcosms, mesocosms, testing facilities)
- Marine resource centres “from genes to ecosystems” back-to-back with biotechnology facilities

Highlighting the contribution of marine research infrastructures to European innovation and growth:

- By fostering public procurement on specific marine & maritime technologies
- As information and services providers enabling the development of marine industries
- As knowledge and potential technology transfer producers
- By attracting the best scientists and providing constantly updated, enabling technologies

**“The future of the 21<sup>st</sup> century ocean” symposium participants call for:**

**A coordinated implementation and encompassing European governance**

To allow an optimum cost-benefit strategy, the European marine science community calls for a coordinated and integrated implementation of marine research infrastructures at a European level. The symposium also encourages the establishment of an encompassing European governance for marine research infrastructures contributing to a higher global perspective.

**A truly co-funding mechanism between EU and national funding**

Member states funding is essential, but not sufficient for the sustainability of pan European research infrastructures, which calls for a truly co-funding mechanism between EU (including structural funds) and national funding (and private where relevant). The EU should definitely contribute to the economic model of pan-European infrastructures, by supporting extra implementation / operational costs and transnational access including access from outside of Europe, so as to promote the international dimension of Research Infrastructures and the attractiveness of the Union in Marine Sciences. Moreover, EU funding is absolutely necessary for global or pan European international ocean observing networks. The Research Joint Programming Initiative on "Healthy and Productive Seas and Oceans" provides a good platform for this co-development mechanism.

**Training schemes for marine RI managers and researchers / engineers / technicians**

The symposium welcomes the European Commission call for specific and multidisciplinary Research Infrastructures Management training and diploma. As for marine sciences, such training should include courses on the international legal and economic framework for marine & maritime policy. The long-term development, up-dating and maintenance of marine Research Infrastructures also calls for trained researchers, engineers and technicians, able to work in a specialized and multidisciplinary context, especially stimulated within the framework of the EU mobility schemes (e.g. Marie Curie Actions).

**Gender balanced marine Research Infrastructures**

The construction of the marine Research Infrastructures has been involving a relevant number of female researchers / engineers / technicians with a large variety of skills. This needs to be pursued and there is a need to open fast-tracked career path for females towards high level management positions.