

User needs in Environment
Part 2 : Marine sciences, geosciences

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Earth Sciences

Observations

Long-term monitoring network
Satellite, in-situ
Field campaigns :
Ships / planes / remote stations

Modelling

High-performance computing
Software developments

+ Experimentation
Ecotron

Data access

Marine Sciences

ESF Marine Board (2002)

- Natural marine resources & geohazards
- Ocean climate interactions and feedbacks
- New frontier in marine science « Deep ocean floor frontier »

Infrastructures

« European Strategy on Marine Research Infrastructures » (2003)

- Research vessels, AUV
- Observing systems : buoys & profilers (ARGO), seafloor observatories
- Data centres and databases

Optimisation / Common new infrastructures

Polar Research

ESF Polar Board

- Polar stations
 - e.g. Concordia
- Polar vessels
 - Ice breaker : Aurora Borealis

Geosciences (Geohazards)

- Observation networks for seismology
 - Array (e.g. Nereis), Seafloor Observatories
- Deep ocean drilling
 - Integrated Ocean Drilling Program
- Deep continental drilling
 - ICDP