European MSP Platform

Data for MSP

Data & Information Needs for MSP in European Sea Basins

Bronwyn Cahill / s.Pro / 13th June 2016

Funded by:

Lead Partner:

Subcontractors:

Overview

- Short Briefing European MSP Platform
- Study on Data & Information Needs
  - Highlight added-value
  - Clarify scope / boundaries of the study
  - Data and knowledge issues
    - Analysis of planners needs
    - Some lessons from MSP (data) projects / initiatives
    - Overview of data infrastructures

European MSP Platform

- A service to Member States to support implementation of MSP throughout Europe financed by the European Commission, contract „MSP Assistance Mechanism“ EASME/EMFF/2014/1.3.1.7/SI2.721508
- Objectives:
  - Share resources and practical information to enable MSP implementation
  - Promote transfer of MSP knowledge and experience
  - Make good use of various MSP funding opportunities and work done on MSP
  - Increase knowledge base through dedicated studies on specific topics as identified by Member States

Tasks

- **Task 1: Technical Studies on specific MSP topics**
  - **Year 1: Data Study, Final Report December 2016**
- Task 2: Support MS' implementation of MSP, including the following services:
  - Website development and maintenance to serve as a repository of relevant MSP information
  - Operate a focal point service for each sea basin
- Task 3: Administrative and technical support to DG MARE for MSP related meetings, workshops and conferences

MSP Data Study ToR

- Identify main data, information and knowledge issues from perspective of MSs at different stages (and scale) of MSP implementation.
- Evaluate data and knowledge gaps that may act as obstacles to implementing MSP.
- Correlate data gaps with information and data held in existing databases, including products and marine information services that support MSP decision making process.
- Suggest ways of bridging existing data and knowledge gaps, and mechanisms that could allow MSs to obtain the “best available data and information” as per MSP Directive.

Added Value

- Coherent transfer of knowledge across 23 MSs
  - What can countries learn from each other?
- Sea basin overview of projects / initiatives and data infrastructures:
  - Systematic analysis of what has already been done and where? Transfer of key outputs, synergies
- Better understanding of data and knowledge issues from MSs perspective:
  - What's similar? What's different? Clarify terminology
- Identify future EU funding priorities and policy recommendations, sea basin & macro-regional

Scope / Boundaries

- NOT prescriptive
- NOT identifying some minimum set of data requirements that countries have to use
- NOT an assessment
- NOT proposing one-size fits all solution

Data and knowledge issues so far ...

- Scoping Paper
- 3 lines of investigation ongoing ...
  - Analysis of planners needs
  - Some lessons from MSP (data) projects / initiatives
  - Overview of data infrastructures

Analysis of planners needs

- Guiding questions:
  - What do planners need to know at which stage of the planning process?
  - What parameters does this translate into?
  - When/where do planners rely on tacit knowledge?
  - What are the key knowledge gaps?
- Looking at MSs plans, finalised or in preparation:
  - Sweden, Belgium, England and Germany
  - To come: Croatia, Estonia, Finland, Latvia, Lithuania, Malta, Netherlands, Ireland, Poland, Portugal, Scotland, Slovenia

MSP (data) Projects Review

- Desk research of publicly available information
- European projects and national initiatives, past or current, which address and / or generate:
  - Stocktaking maps
  - Data / knowledge needs / gaps
  - Data portals
  - Mapping tools
  - Assessment tools
  - Data policy
  - Transboundary exchange of MSP data
- Sea basin overview, distil useful outputs

Completed projects

- **MESMA**: Monitoring and evaluation of spatially managed areas
- **ESaTDOR**: European Seas & Territorial Development, Opportunites and Risks
- **COEXIST**: Interaction in European coastal waters
- **PlanCoast**:
- **BaltSeaPlan**: Planning the future of the Baltic Sea
- **PartiSEApate**: Multi-level governance in MSP throughout BSR
- **ARTWEI**: Action for reinforcement of transitional waters' environmental integrity
- **Plan Bothnia:** Planning the Bothnian Sea
- **MASPNOSE**: Maritime spatial planning in the North Sea
- **TPEA**: Transboundary planning in the European Atlantic
- **SHAPE**: Shaping an holistic approach to protect the Adriatic environment between coast and sea
- **AdriPLAN**: Adriatic Ionian maritime spatial planning
- **PEGASO**: People for ecosystem-based governance in assessing sustainable development of ocean and coast
- **MISIS**: MSFD guiding improvements in the Black Sea integrated monitoring system

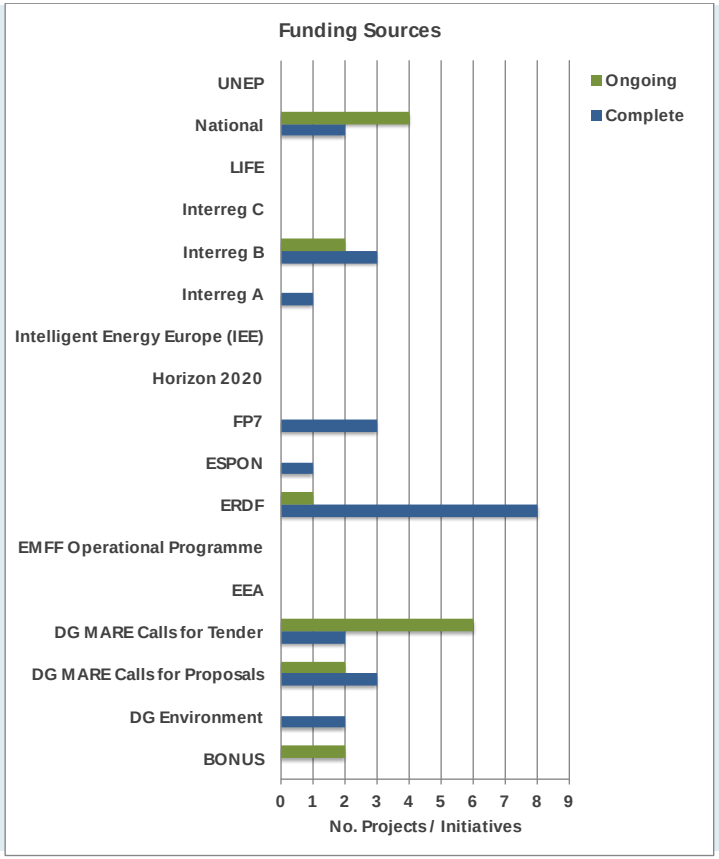
Ongoing projects

- **EMODnet Sea Basin Checkpoints**
- **HELCOM-VASAB Data Group Study**
- **BaltSpace**: Towards Sustainable Planning of Baltic Marine Space
- **BalticLINes**: Coherent Linear Infrastructures in Baltic Maritime Spatial Plans
- **NorthSEE**: A North Sea Perspective on Shipping, Energy and Environment Aspects in MSP
- **SimCELT**: Supporting Implementation of Maritime Spatial Planning in the Celtic Seas
- **RITMARE**
- **MarsPlan**: Cross-Boarder Maritime Spatial Planning in the Black Sea

MSP (data) Projects Review

Sea Basin Coverage

	Complete	Ongoing
European	5	1
Baltic Sea	8	8
North Sea	4	2
Atlantic	2	2
Med. Sea	6	2
Black Sea	3	2

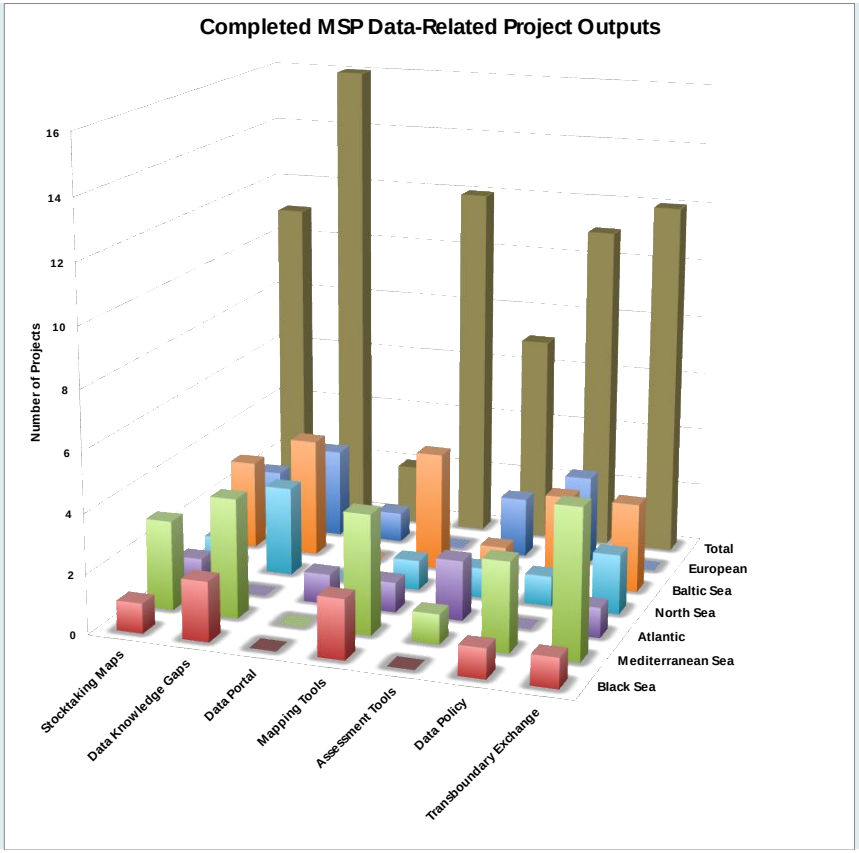


Complete 25

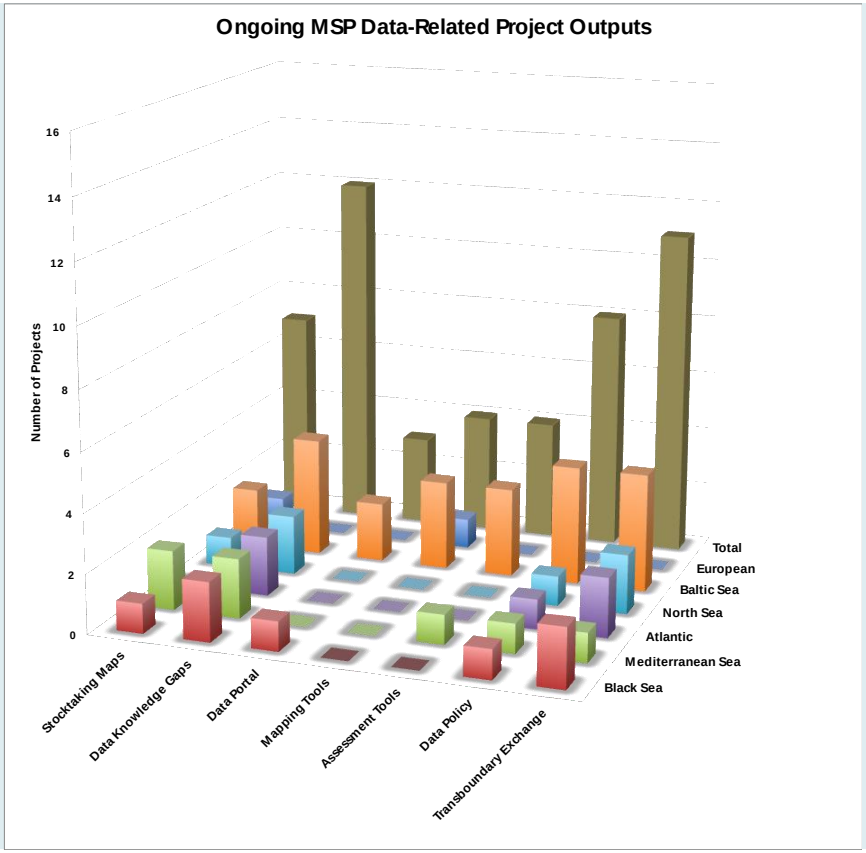
Ongoing 17

European MSP Platform

MSP (data) Projects Review



25 Completed 2004 - 2015



17 Ongoing

Stocktaking maps

- Various efforts to map sea use
  - All sea basins and Europe-wide
  - Boundaries, environment, ecology and activities
  - Mapping tools

Data Knowledge Needs Gaps

- Challenges at European and Regional Scale:
  - Availability of suitable data sets in consistent manner across sea basins / regions
  - No statistical unit for sea space (i.e. NUTS equivalent)
  - Difficult to disaggregate information between land and sea
  - Paucity of data or information on land-sea interactions, e.g. degree to which coastal communities are dependent on their links to adjacent seas and the potential for them to benefit from growing maritime sectors.
  - Limited social, economic and governance data but this is changing
  - Gaps and weaknesses in historical time series, data quality
  - Translating data and information into indicators to assess pressures
  - Accessing / handling tacit knowledge

Data Portal

- Relatively few developed in project context
- Limited value without long term data strategy
  - Not maintained
  - Restricted access
  - Language specific
  - …

Mapping tools

- Quiet a few mapping tools developed across all sea basins
  - Boundaries, environment, ecology and activities
  - Useful transboundary demonstrations Baltic Sea, Eastern Mediterranean, Black Sea
  - Some transitioned to “operational”, e.g. Belgium Coastal Atlas, Plan Bothnia integrated into HELCOM-VASAB data portal, MESH Seabed Habitat integrated into EMODnet, European Atlas of the Seas (updated 2014)

Assessment tools

- Broad range of analytical tools:
  - Applied modelling tools (e.g. environmental investigations, sedimentary patterns, site selection, ecological risks)
  - Maritime region typology: sea uses and land-sea interactions (i.e. economic significance, flows and environmental pressures)
  - Economic analysis
  - Interactions and risk analysis, synergies
  - Cumulative impact assessments
  - Data harmonisation across boundaries
  - Future scenario planning
- Quite specialised, expert knowledge
- More to come …

Data policy

- Europe
  - Common maritime data collection framework: facilitate harmonisation and consistency of spatial data sets across maritime regions
  - Broaden thematic and spatial scope of maritime data collection beyond current ESPON boundaries – land-sea interactions
  - Improve accessibility of existing data sources
  - Adopt a maritime spatial statistical unit (NUTS equivalent)
- Baltic Sea:
  - Establish an MSP Data Infrastructure
  - HELCOM-VASAB MSP Expert Data Group
  - Establish pan-Baltic Spatial Data Infrastructure
- Mediterranean & Black Sea
  - Establish pan-Mediterranean and Black Sea Spatial Data Infrastructure

Transboundary exchange

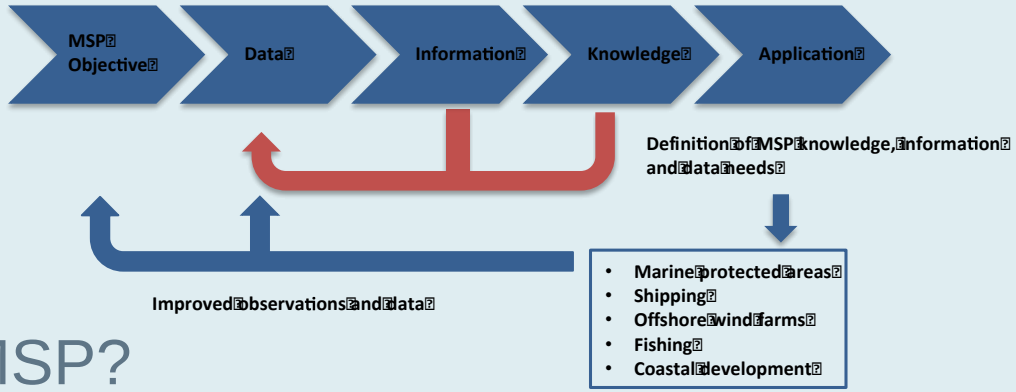
- Baltic Sea, North Sea, Atlantic, Eastern Mediterranean and Black Sea
- Common issues:
  - Availability
  - Coherence across boundaries
  - Data harmonisation
  - Quality
  - Language issues
  - Political agreement
  - Cooperation between local and regional interest groups

EMODnet Sea Basin Checkpoints

- North Sea and Mediterranean Sea, 2013 – 2015
- Arctic, Atlantic, Baltic Sea and Black Sea, 2015 – 2018
- Stress Test: audit of marine data services:
  - Windfarm siteing
  - Marine protected areas
  - Oil platform leak
  - Climate and coastal protection
  - Fisheries management and impacts
  - Marine environment management / eutrophication
  - River inputs to coastal environment
  - Bathymetry
  - Alien species

Data Infrastructures Review

- Desk research of publicly available information
- Sea basin overview, MS level, operational
- Considers existing MS MSP data strategies, e.g. MMO Marine planning evidence base, Swedish Current Status Report 2014
- MSP Cycle ...
  complex data, information, evidence & knowledge needs for MSP
- What is applicable for MSP?



Data Infrastructures Review

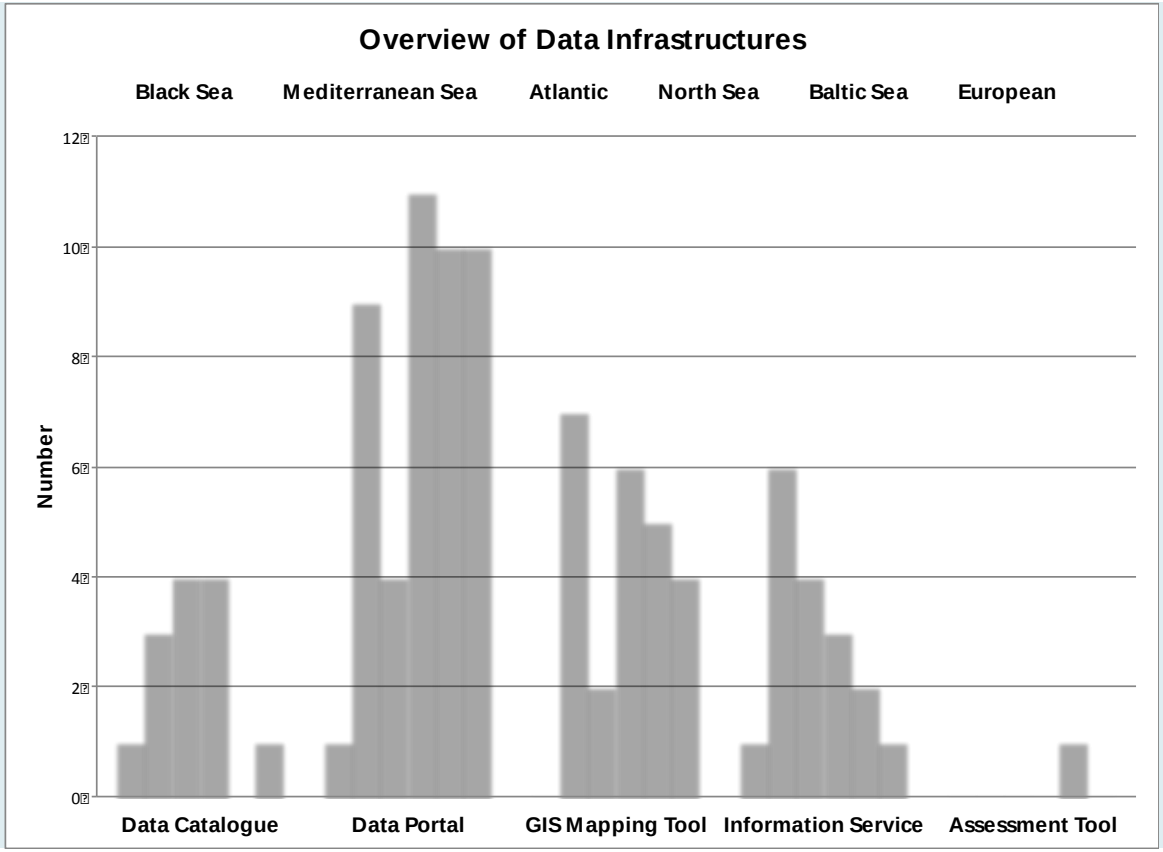
MMO Evidence Strategy 2015 – 2020, Part 1:

THEME	SUB THEME
 Describing the marine area	• State of the biological, physical and chemical environment • Distribution of human activities • Social value of human activities and the environment • Economic value of human activities and the environment
 Interactions in the marine area	• Pressures resulting from human activities • Sensitivities • Potential impacts and effects of human activities • Interaction pathways
 Integrated management	• Integrated assessments to inform management approaches • Tools for monitoring and evaluating management approaches • Methodologies for adaptive management

Data Infrastructures Review

- What is it exactly?
  - Data Catalogue
  - Data Portal
  - GIS Mapping Tool
  - Information Service
  - Assessment Tool
- Spatial coverage?
  - European, Sea Basin, Regional, National
- Which themes and sub-themes does it address within planning cycle?
  - Potential scope of data infrastructure

Data Infrastructures Review



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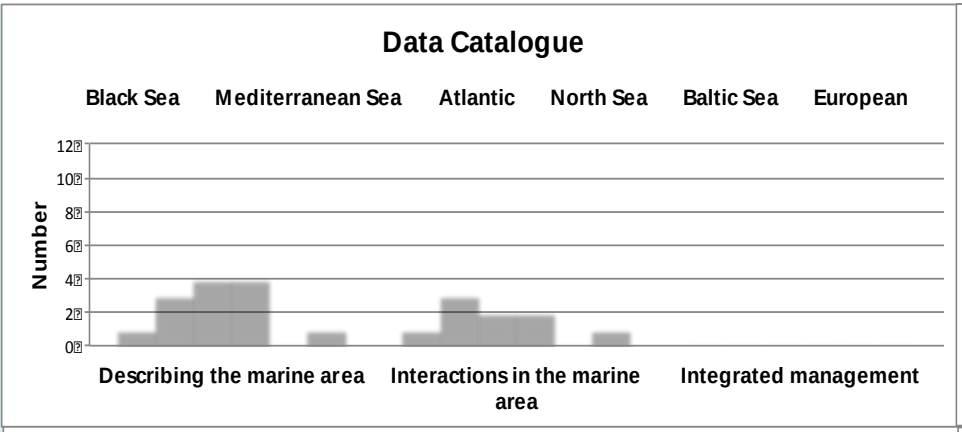

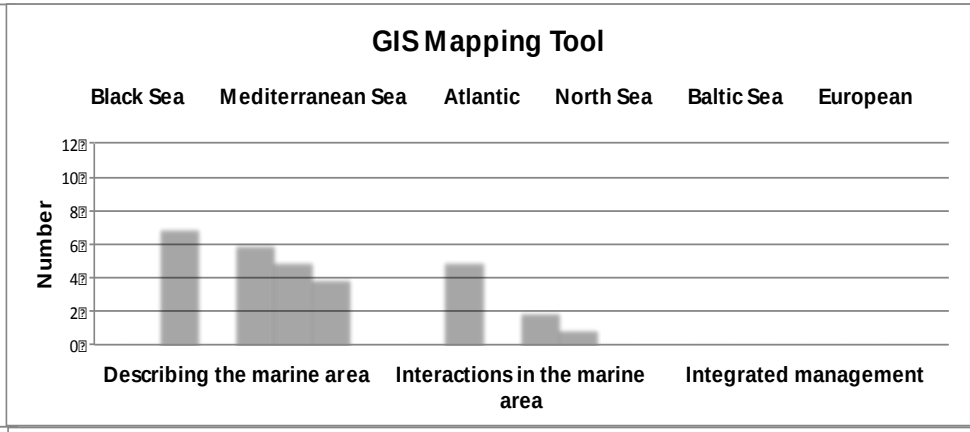

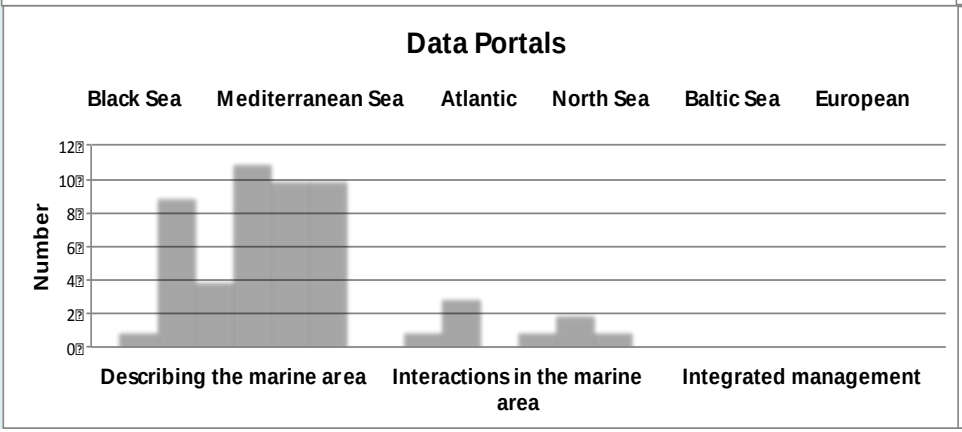

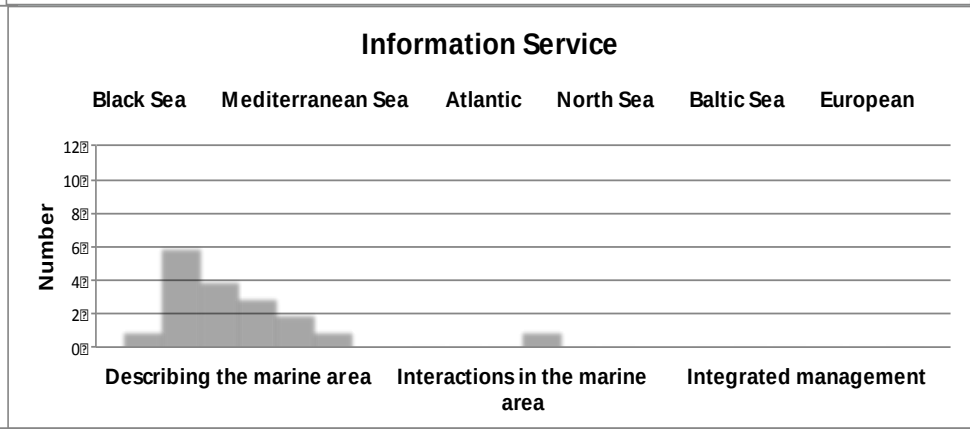

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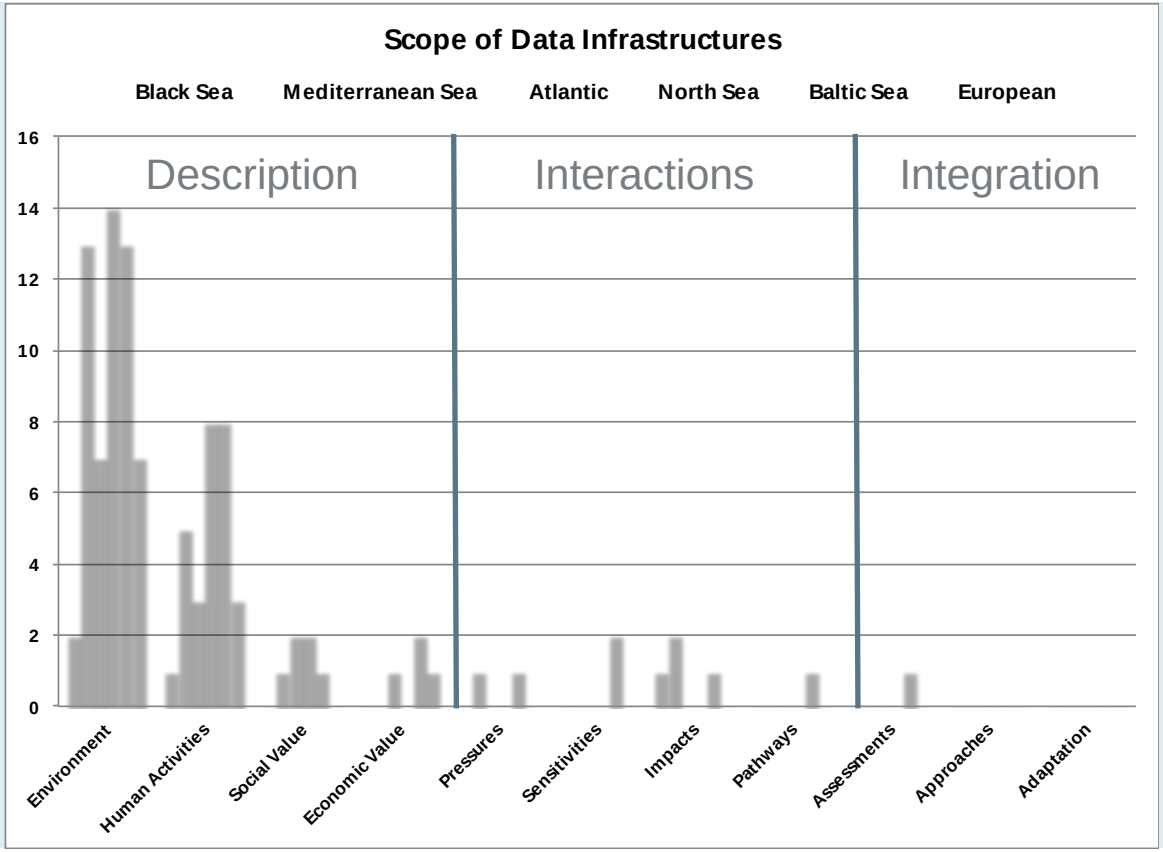

Next steps

- Knowledge brokerage: cross-cutting dialogue with 23 MS
  - Verify what we have found: what is NOT visible to us?
  - Go into more depth: which projects and data infrastructures are being used by planning authorities?
  - What is based on tacit knowledge?
  - Learn status quo of available MSP data and assessment tools in each MS: what is actually being used?
  - Better grasp on MS needs versus transboundary needs
- Draft report November 2016, final report December 2016
- Thank you!