Regular process for global reporting and assessment of the state of the marine environment, including socio-economic aspects

World Ocean Assessment I
Why have a World Ocean Assessment?
How is it to be organized?
What are we now doing?
How can IOC help?
The sustainable development tripod

- To achieve sustainable development, we need to look at environmental, economic and social aspects
- There are many assessments of aspects of the marine environment
- Few have even tried to look at all three aspects together
Putting it in context

• The world is spending “several tens of billions of US dollars” a year on assessing aspects of the marine environment.
• An improvement of even a few percentage points in the effectiveness of this expenditure would be substantial.
• If it enabled an improvement in the management of 7/10ths of the planet, it would be a major achievement.
• Even a small improvement would be worthwhile.
Overall Objective

To “review the state of the marine environment, including socio-economic aspects,
- on a continual and systematic basis
- by providing regular assessments at the global and supraregional levels
- and an integrated view of environmental, economic and social aspects.”

“Such assessments would
- support informed decision-making, and thus
- contribute to managing in a sustainable manner human activities that affect the oceans and seas,

in accordance with international law, including the United Nations Convention on the Law of the Sea and other applicable international instruments and initiatives.”
How to organize a World Ocean Assessment?

- The UN General Assembly is the focus, through an Ad Hoc Working Group of the Whole
- A Group of Experts to have overall direction
- A Pool of Experts to provide specialist input
- The UN Secretariat (DOALOS) is to be the secretariat
- Other UN agencies (especially FAO, IMO, IOC, UNEP) to provide scientific and technical support
- Website – www.worldoceanassessment.org
Scope

“The scope of the regular process is global and supraregional, encompassing the state of the marine environment, including socio-economic aspects, both current and foreseeable.”
UNGA endorsed in resolution 64/71, and reaffirmed in resolution 65/37, the recommendations of the AHWGW that the output of the first cycle of the Regular Process (by 2014) should be:

- an integrated assessment of the oceans
- agreed priority cross-cutting thematic issues such as food security
- a baseline for future global assessments.
The oceans and seas are manifold. There are at least three possible bases for organization:

- Human activities affecting the marine environment (*best for such activities*)
- Habitats (*best for biodiversity questions*)
- Ecosystem services (*best for fundamental processes*)

Conclusion – draw on the strengths of all three
What are we doing?

- Group of Experts functioning
- Pool of Experts populated
- Organising writing teams and panels of commentators
- Starting to write draft chapters and supporting working papers
- Editing the chapters to a draft assessment
- Peer review by States and independent peer reviewers
- Finalization and publication by end of 2014
Outline

I. Summary for decision-makers
II. The Oceans and their context
III. Ecosystem Services
IV. Cross-cutting question – food security
V. Other human activities
VI. Biodiversity and habitats
VII. Overall evaluations
Non-provisioning Ecosystem Services

- Hydrological cycle
  - sea level, salinity, nutrients, heat transport
- Sea/air interaction
  - air quality, meteorological events, acidification
- Primary production
  - distribution, causes and effects, surface layer
- Aesthetic, religious and spiritual ecosystem services
Focuses within each ecosystem process

- What is changing?
- How does that affect other processes?
- How do the aggregate changes affect human society and the world economy?
Food - social and economic dimension

• Dependence on the oceans and seas for food
• Inter-regional dependencies
• Potential contribution of living marine resources to food security
• Human health and food from the sea
• Employment in fisheries and aquaculture: numbers, pay, safety
• Fisheries and social structure
• Who benefits from what fisheries areas?
• International distribution of fisheries benefits
• Economic activity dependent on fisheries and aquaculture
Human activities – what to look at?

For each of 14 activities, look at

- The nature and magnitude of the human activity
- Socioeconomic aspects of the human activities
- Pathways from the human activity to its environmental impacts
- Major ecosystem impacts;
- Integration of environmental and socioeconomic trends;
- Environmental, economic and social influences on trends;
- Capacity building gaps.
The 14 activities

- Shipping
- Ports
- Submarine cables and pipelines
- Coastal, riverine and atmospheric inputs from land
- Offshore hydrocarbon industries
- Other marine-based energy industries
- Offshore mining industries
- Solid waste disposal
- Marine debris
- Land/sea physical interaction
- Tourism and recreation
- Desalinisation
- Use of marine genetic resources
- Marine scientific research
Biodiversity & Habitats

• Not feasible to look at everything
• What is important for a global assessment?
   Ecosystems already identified as of global concern – (but not just EBSAs and VMEs)
   Migratory species moving between regions
   Other species and habitats meeting criteria for global concern
• Develop criteria for global concern and identify other species and habitats on that basis
Groups of Species

- Marine Mammals
- Marine Reptiles
- Seabirds
- Sharks and other elasmobranchs
- Tuna and billfish
Habitats

- Cold-water corals
- Warm-water corals
- Estuaries and deltas
- Open-ocean Deep-sea Biomass
- Hydrothermal vents and cold seeps
- High latitude ice
- Kelp forests and sea grass
- Mangroves
- Salt marshes
- Sargasso Sea
- Seamounts and other submarine geological features potentially threatened by disturbance
Overall evaluations

• What can we say about the overall human impact on the seas?
  – baseline for comparison in future Assessments

• How do we value the benefits from the oceans and seas for humans?
  – baseline for comparison in future Assessments
Capacity Building

- Capacity-building is an essential part of the Regular Process
- Not just capacity to carry out assessments, but also to benefit from the use of the marine environment
- To identify capacity-building gaps, not needs
- Need for capacity for integrated assessments
- Special steps need to assess such gaps
How can IOC help?

• Member States can provide:
  – Members of the Pool of Experts
  – Support for the necessary meetings

• The IOC can provide:
  – Comments through its working groups
  – Charting and cartography through its Secretariat
World Ocean Assessment I

We have eighteen months to complete it!

Thank you for listening!

See the website:

www.worldoceanassessment.org