Developing a Marine Spatial Planning: Lessons from Integrated Spatial Plan for City of Balikpapan, Indonesia

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SUMMARY

The primary focus of many surveyors worldwide has been mainly on land-based issues. The marine cadastre concept presents an opportunity for surveyors to widen their horizon and work more closely with their hydrographic surveying colleagues. At the same time, awareness and needs for marine spatial planning also increase considerably, especially for a region or a country which has complex issues and stakeholders in the marine environment.

And significantly, The Jakarta Statement (FIG, 2004) recently mentions that surveyors can in a manifold way to contribute to a more sustainable development in urban, coastal and marine zones. Recommendation also has been made for FIG Commissions to work closely between Commission 4 (Hydrography), Commission 3 (Spatial Information Management), Commission 7 (Cadastre and Land Management) and Commission 8 (Spatial Planning and Development).

A marine spatial planning should be considered as part of a spatial data infrastructure, considering its importance for coastal and marine stakeholders. Spatial information technology can also be used as a tool to enhance the input, editing, storage and visualisation of spatial information. Spatially, it can also be used to illustrate problem areas and alternative solutions. In the case study, spatial information was used to identify boundaries, different kind of issues and competing uses and interests between stakeholders.

The objective of this paper is to share information from spatial planning project and process undertaken at City of Balikpapan, East Kalimantan, Indonesia. This area was chosen because of the complexity of the issues confronting a range of stakeholders with different interests and perspectives. It will be a model of integrated land and marine spatial planning for Indonesia. The process was legitimate after conducting two series of public consultation on spatial planning to gather inputs and supports from government officials, local stakeholders and public.

A particular focus of this research is a review of spatial planning and administrative interests at the land-marine interface and bay area. Utilising the case study has been conducted, analysing and integrating datasets to provide stakeholders access to dynamic information. The use of Spatial Data Infrastructures (SDI) in the land and marine environment will also be examined by evaluating their application to the implementation of current policies in this particular area.

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At the end of the process, a local regulation on spatial planning for City of Balikpapan administrative area which covers land and marine environment will be issued. This final document will be valid for the next ten years and available for revision after five years.

This process conducted by City of Balikpapan Spatial Planning Team, supported by USAID Coastal Resources Management Project II (cooperation between US Government and Government of Indonesia) and Department of Marine Affairs and Fisheries, Republic of Indonesia.

As conclusion, it is important to have a marine spatial planning for a country like Indonesia or other countries which have coast line. While awareness and needs for marine spatial planning increase to a large extent, development of spatial data infrastructure also has high priority for land, coastal zone and marine environment.

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