

Department of Civil Engineering and Geological Sciences
Challenges and Innovation in Civil and Environmental Engineering



Land Reclamation Maasvlakte 2 at the Port of Rotterdam

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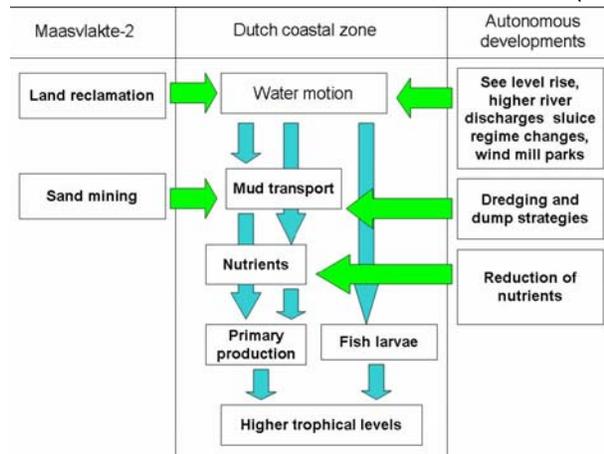
Vice President, Coastal and Rivers, Haskoning Inc.

October 29, 2008
 126 DeBartolo Hall
 4:30pm

“In the North Sea, west of the port of Rotterdam, new land will arise from the sea. This is a logical step in the process of port expansion and is a typically Dutch phenomenon: reclaiming land from the sea.” http://www.maasvlakte2.com/en/more_on_MV2/art_gallery/last_look.jsp

Maasvlakte 2 is the new port and industrial zone that is to be built right on the North Sea near the harbour of Rotterdam. The construction of this new port area consists of two main activities: sand mining in the North Sea and land reclamation near the harbour entrance of Rotterdam. Along with several autonomous developments (e.g. sea level rise, nutrient reduction) these activities will have an impact on the surrounding water system. The figure below visualizes the large-scale impacts of Maasvlakte 2 in the Dutch coastal zone (and beyond) together with the autonomous developments.

This seminar discusses the development of a large scale hydrodynamic model of the Southern North Sea with eight grid domains with very high resolution, an existing fish larvae model that was significantly extended and used to simulate the transport of fish larvae in the Southern North Sea, and the effect of exchange of mud to and from the sediment bed at various time scales.



This presentation will also discuss the fruitful interactions between various disciplines and institutes and the lessons learned from this extensive modeling effort.

A reception and an opportunity to meet the speaker will take place after the seminar outside of 126 DeBartolo