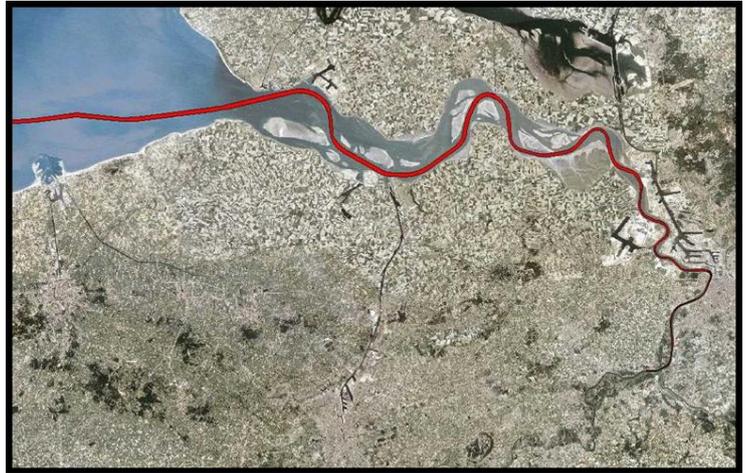


## “Schelde-ECDIS project”: production of ECS’s used in Pilot Navigation and Docking Systems.

The morphological structure of the river Scheldt, and the increase in draught of the vessels, requires that a pilot, working on the river, carries a set of frequently updated very detailed sounding charts.

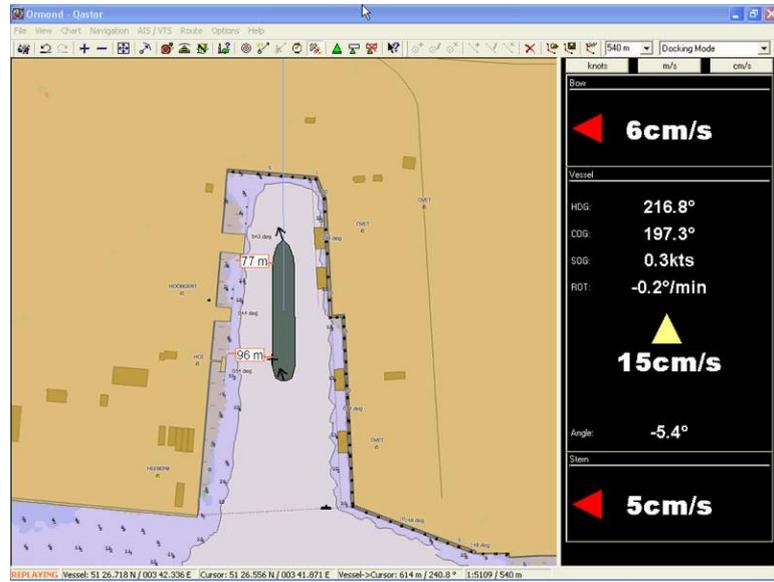
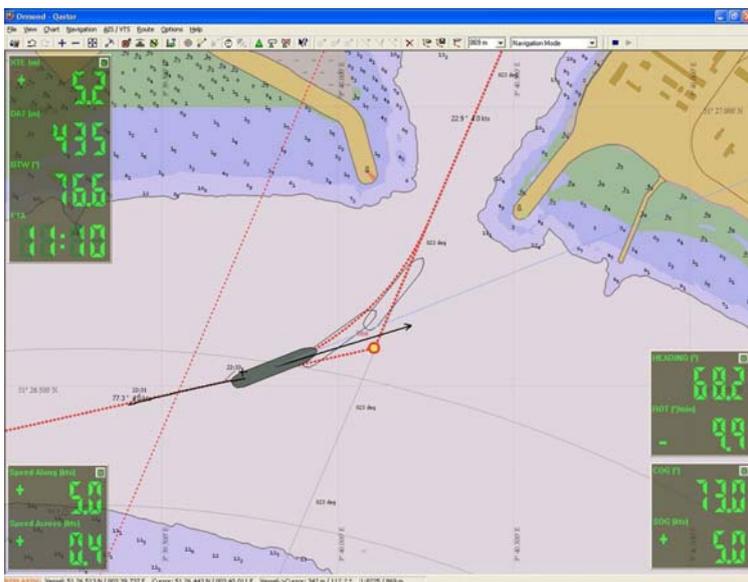
In spring 1999 the project Schelde-ECDIS started. In this project first of all the possibility was examined to replace the traditional Belgian and Dutch paper sounding charts of all scales and sizes, by one complete detailed electronic chart.

It became a co-operation between Dutch and Belgian hydrographers, pilots and traffic managers. The production of the so called high-density Schelde – ECS (Electronic Chart System), a combination of the hydrographic chart and sounding chart, proved to be a very big challenge. The amount of detail in the electronic charts and the update frequency are very high.



The first part of the Schelde-ECS was constructed by “cutting and pasting.” To speed up the process and to organize all the data a Hydrographic Database called Database Scheldes was developed. For distribution to the pilots the Schelde-ECS and its up-dates are placed on an FTP-server. The pilots can load these ECS’s on their portable pilot-unit.

On the Western Scheldt two versions of the portable pilot unit are used at the moment, the system SNMS-light and SNMS. SNMS stands for Schelde Navigator Marginal Ships. At this moment already 70 of 400 pilots are using voluntary SNMS-light and SNMS for general navigation and for precise docking of large oil and gas tankers and container-ships.



The project however is far from finished. There are still problems to be solved. Amongst others, the pilots are asking that new releases of ECS-cells are ready within 7 days after completion of the survey. This implies an improvement of the workflow from data acquisition to ECS updating and the employment of a lot of extra cartographers, as well for the Flemish Hydrography as for the Dutch Rijkswaterstaat.