

6th Meeting of the Worldwide ENC Database (WEND) Working Group (WENDWG), Stavanger, Norway, 8-10 March

The sixth meeting of the Worldwide ENC Database Working Group (WENDWG) took place in Stavanger, Norway, hosted by the Norwegian Hydrographic Service (NHS), from 8 to 10 March. The meeting was chaired by Mr Jamie McMichael-Phillips, UKHO. Twenty-four delegates from 16 Member States (Argentina, Brazil, Canada, Finland, France, Germany, Italy, Japan, Norway, Oman, Poland, South Africa, Sweden, Turkey, United Kingdom, USA), representing 11 Regional Hydrographic Commissions (ARHC, BSHC, EAHC, MACHC, MBSHC, NHC, NSHC, RSAHC, SAIHC, SWAHC, USCHC), two Regional ENC Coordinating Centres (IC-ENC and PRIMAR), and the IHB attended the meeting. Additionally, four expert contributors from industry and academia had been invited by the WENDWG Chair to participate as observers. Director Mustafa Iptes and Assistant Director Yves Guillam (Secretary) represented the IHB.



Most of the decisions and actions arising from the 5th meeting of the WENDWG were implemented or complete. As a result, the meeting concentrated on the main work items of the WENDWG 2015-16 programme of work, as approved at the 7th meeting of the Inter-Regional Coordination Committee (IRCC-7).

One of the main objectives of the WENDWG is to monitor the application of the WEND Principles by the Hydrographic Offices and the Regional Hydrographic Commissions (RHCs). As reported to the IMO, global ENC coverage has reached the point where further progress is primarily dependent upon new surveys or re-surveys being carried out in the areas not yet covered by ENCs. Yet, for various reasons, there remain numerous cases of overlapping ENCs, which is contrary to the ENC production principles established by the IHO. It was agreed that the situation is not improving: one of the reasons identified is that most of the RHCs do not set up “Approved” ENC Schemes as they do for INT paper charts. IC-ENC provided a comprehensive report on the unpredictable behaviour of ECDIS in situations where overlapping data occurs. This was followed by very fruitful discussions.

ic-enc

Results Summary Table

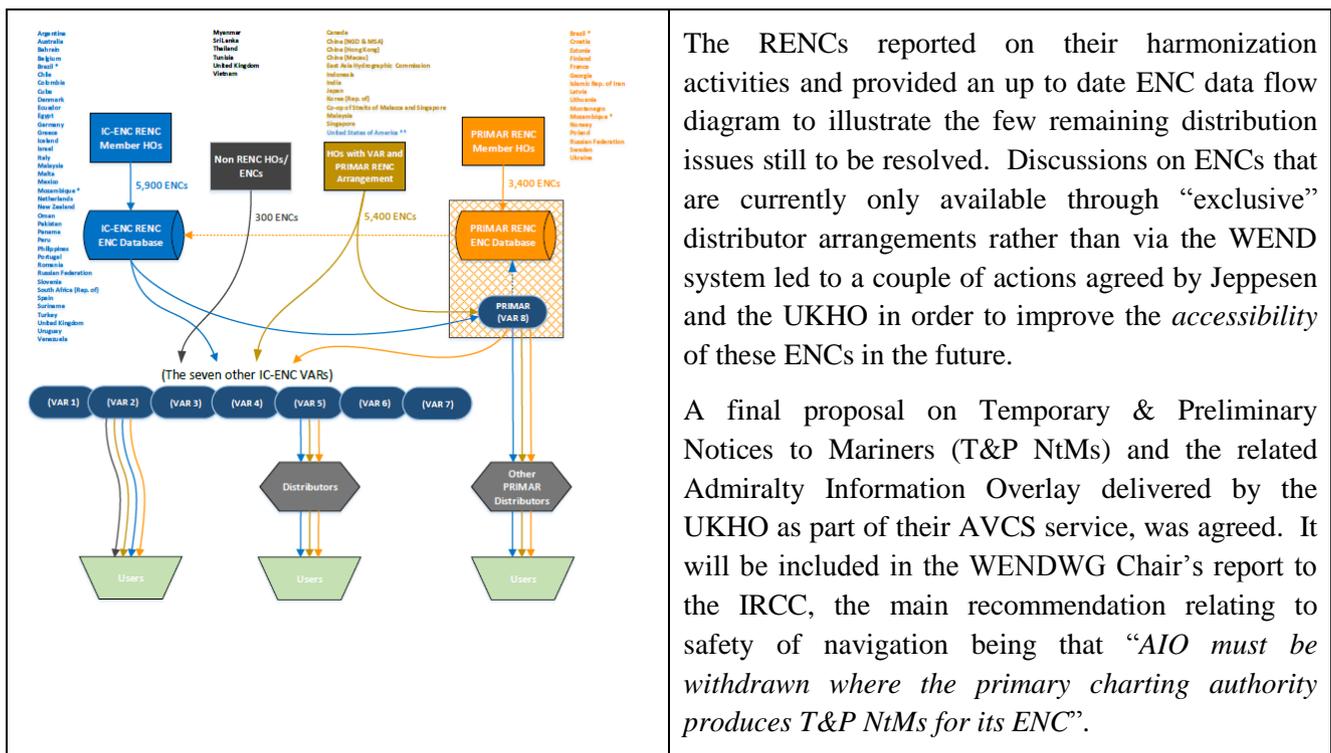
ECDIS	Scenario	Pan	Zoom	Pick Report
A	1	See Annex 2 Figure 2.8.2	See Annex 2 Figure 2.7	
	2	See Annex 2 Figure 2.7		
	3	See Annex 2 Figure 2.8		
Comments: Generally pans ok but inconsistent as to which cell is displaying at the edges and at what point it changes. Both only listed in Pick report at edge.				
Display: Display of cells change as zoom in and out of cell at the edges for scenario 1 & 2. More stable in the centre of the cell. Scenario 3 zoomed as expected.				
Pick Report: Reports items from display cell except at the edge. The cell varies due to panning and zooming issues but pick report is accurate. Where duplicated reports in full.				
B	1			
	2			
	3			
Comments: Pan relatively stable in scenarios 1 & 3 but keeps a stored memory of cell with both cells reporting in the Pick report at limits. Pan in scenario 2 consistent.				
Display: Scenario 1 zoom in and out not the same at the centre and edge. Scenario 3 & 3 stable zooming.				
Pick Report: Scenario 2 & 3 occasionally report both cells and 2 nd cell doesn't list full capture. Potentially only listing safest option. Scenario 2 consistent and only lists one cell.				
C	1	See Annex 2 Figure 2.1.8.2		
	2	See Annex 2 Figure 2.1.8.3		
	3	See Annex 2 Figure 2.1.8.4		
Comments: Generally pans ok but inconsistent as to which cell is displaying at the edges and at what point it changes. Both only listed in Pick report at edge.				
Display: Display of cells change as zoom in and out of cell at the edges for scenario 1 & 2. More stable in the centre of the cell. Scenario 3 zoomed as expected.				
Pick Report: Reports items from displayed cell except in edge of cell. The cell varies due to panning and zooming issues but pick report is accurate. Where duplicated reports in full.				
D	1	See Annex 2 Figure 2.8	See Annex 2 Figure 2.7.2.2.2	See Annex 2 Figure 2.8.1
	2	See Annex 2 Figure 2.8	See Annex 2 Figure 2.7.2.2.2	See Annex 2 Figure 2.8.1
	3	See Annex 2 Figure 2.8	See Annex 2 Figure 2.7.2.2.2	See Annex 2 Figure 2.8.1
Comments: Screen routinely 'blues out' whilst panning. Screen routinely 'blues out' whilst zooming.				
Display: Scenario 1 & 3 occasionally report both cells and 2 nd cell doesn't list full capture. Potentially only listing safest option. Scenario 2 consistent and only lists one cell.				
E	1	See Annex 2 Figure 2.7		See Annex 2 Figure 2.7
	2			
	3			
Comments: Pan more stable but at cell limits multiple cells in Pick report. Pan in scenario 2 consistent.				
Display: Both cells regularly report in the pick, except in scenario 2 which only displays the dominant cell.				
Pick Report: Example in scenario 1 where Pick report was empty. Scenario 2 stable and consistent. Scenario 3 regularly reports both cells in Pick report.				

■ Significant display issues
 ■ Some unexpected display or reporting issues but usable
 ■ Operating as generally expected – only minor issues

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It was agreed by the working group and supported by the industry stakeholder participants that CIRM be invited to distribute the IC-ENC report on overlapping ENC data to ECDIS manufacturers in order to provide a better understanding of the consequences in ECDIS operating software when uploading or displaying ENCs. A set of associated actions to improve the situation was also decided. In particular, it was agreed that the IHO ENC catalogue should display Approved ENC Schemes as additional layers, and that the IRCC and the WENDWG should prepare a Conference/Assembly Proposal, focused on the navigationally-significant overlapping issues, to be considered by the next International Hydrographic Conference or Assembly in April 2017.

The meeting was informed that progress has been made by several regional International Charting Coordination Working Groups (ICCWG) that are now using ENC coverage as part of their systematic risk assessment analysis protocols. It is considered that the RHCs that are now doing this will benefit further as soon as they can maintain and keep such studies updated for the various categories of SOLAS vessels. The development of a database, that will facilitate the identification of the ports and locations where large scale ENC coverage is missing, will be carried out by the IHB, starting in 2016, with the initial support provided by the USA (National Geospatial Agency's World Port Index (Publication 150) will be used).



The RENCs reported on their harmonization activities and provided an up to date ENC data flow diagram to illustrate the few remaining distribution issues still to be resolved. Discussions on ENCs that are currently only available through “exclusive” distributor arrangements rather than via the WEND system led to a couple of actions agreed by Jeppesen and the UKHO in order to improve the *accessibility* of these ENCs in the future.

A final proposal on Temporary & Preliminary Notices to Mariners (T&P NtMs) and the related Admiralty Information Overlay delivered by the UKHO as part of their AVCS service, was agreed. It will be included in the WENDWG Chair’s report to the IRCC, the main recommendation relating to safety of navigation being that “*AIO must be withdrawn where the primary charting authority produces T&P NtMs for its ENC*”.

Following the retirement of Mr Sean Hinds (Canada), Mr John Nyberg was elected as Vice-Chair of the WENDWG. The next meeting of the WENDWG will take place consecutively when the Joint RENC meeting takes place in early February 2017 in the USA.

Further information concerning the meeting is available on the IHO web site at www.iho.int > Committees & WG > WENDWG > WENDWG-6. Reference documents are also now available at www.iho.int > Committees & WG > WENDWG > WENDWG Repository