



12th Meeting of the WENDWG

Developments to the IC-ENC Overlapping ENC policy

Agenda Item 6.2C



IHO

INTRODUCTION/BACKGROUND

International
Hydrographic
Organization

At the last IC-ENC Steering Committee meeting (November 2021), the IC-ENC Members discussed the IC-ENC overlapping ENC policy.

The following Action was set:

ACTION SC22/12: Steering Committee, through IC-ENC management team, to review and update IC-ENC's policy on Overlapping ENCs.

The Steering Committee acknowledged that WENDWG12 meeting can be an important milestone in this review, noting that this WG is made up of representatives from the RHCs and other relevant stakeholders, and is one of the audiences/users of the Overlapping ENC reports that IC-ENC provides.



IHO

ANALYSIS/DISCUSSION

International
Hydrographic
Organization

IC-ENC Management team has reviewed the existing policy and presented the initial *proposals* to Steering Committee via Circular Letter. The comment period for IC-ENC Steering Committee completes on 9th February.

The proposed changes are based on:

- Recognising that ECDIS performance has improved now to only display one ENC in overlapping areas, rather than an unpredictable “mix” of the two, etc
- An aim to simplify the assessment framework, which will pass through to a simplification of the process, and the reports that are available to stakeholders.

The proposed developments to the policy are enclosed with this WENDWG12 report, to provide visibility of these (ongoing) developments to WENDWG participants.



IHO

CONCLUSIONS

International
Hydrographic
Organization

Research identified that overlapping data causes serious problems for users of certain ECDIS which display both overlapping cells, and IC-ENC's approach to overlapping ENCs is currently based on a risk assessment accounting for a range of factors.

The policy development proposals evolve the policy to consider the impact on the user as a result of improvements in ECDIS performance for overlapping ENCs – there is now greater consistency and predictability of ECDIS performance in cases of overlapping ENCs.

The ECDIS Presentation Library has been updated and effectively promulgated to all ECDIS users, such that now, in the case of overlapping ENCs, **one of the ENCs will be selected for display**. This successfully mitigates the previous potential impact of display issues such as repeated content etc. The **safety problem that the two ENCs might show different navigational content (and which one is “right”?) remains**, and it is noted that there is no defined decision criteria regarding which of the two ENCs will be chosen for display by the ECDIS algorithm.



IHO

RECOMMENDATIONS / JUSTIFICATION AND IMPACTS / ACTIONS TO BE CONSIDERED BY THE WENDWG

International
Hydrographic
Organization

IC-ENC will present the existing proposals and any subsequent developments as a result of the IC-ENC Steering Committee review period to WENDWG12.

Noting that the IC-ENC Steering Committee is the body which will endorse any changes to the policy, the WENDWG is invited to consider any contributions it wishes to make/be considered by IC-ENC as part of this review.

ENCLOSURE: IC-ENC Overlapping ENC Policy – proposed DRAFT v4

Please note the current version of the policy is available via the WENDWG Repository:
<https://iho.int/en/wendwg-repository>



IHO

International
Hydrographic
Organization

Part 2: Updated following IC-ENC Steering Committee comment returns



IHO

PART 2 – UPDATED FOLLOWING IC-ENC MEMBER COMMENTS

International
Hydrographic
Organization

- The following section summarises the comments received from IC-ENC Members
- WENDWG12 may wish to discuss the following comments and/or any other aspect of the IC-ENC Overlapping ENC policy
- IC-ENC will use this discussion in development the next iteration of the draft policy, for IC-ENC Steering Committee review



IHO

WENDWG12 DISCUSSION ITEMS

International
Hydrographic
Organization

IC-ENC Member comment 1: Both products are to be released

Both products are to be released and it's up to the customer to select the producer.

This would allow both parties to receive the same advantages over the overlapping area and at the same time continue to resolve the issue until smooth transition to new coverage by users. The current practices only release the current products which were earlier released while the later producers were left on hold without any leverage to resolve the issue with other party. We also need to consider in the event of production of the new ENC cell that use the latest survey data and another factor that the ENC is produced by the state authority. Thus, the proposal would come handy for all. This options also would allow IC-ENC to observe the preferences of customer regarding the sales of products which would also help the process to achieve resolution on the overlapping coverage.



IHO

WENDWG12 DISCUSSION ITEMS

International
Hydrographic
Organization

IC-ENC Member comment 2: Implementation of “Intelligent ECDIS” mechanism.

“Intelligent ECDIS” is a proposal so that ECDIS would have a mechanism to select an appropriate ENC according to the suitable CATZOC or quality of data to be display. This mechanism should be work out by a related working group and the outcome would benefits all ENC producer especially towards overlapping products.



IHO

WENDWG12 DISCUSSION ITEMS

International
Hydrographic
Organization

IC-ENC Member comment 3:

IC-ENC is a technical body and must not get involved in matters of bilateral members' states concern

IC-ENC Member comment 4:

IC-ENC policy should read: In case an ENC or a new version overlaps land or territorial waters of another country, this ENC will not be released and will be returned to the originator for corrections.



IHO

WENDWG12 DISCUSSION ITEMS

International
Hydrographic
Organization

IC-ENC Member comment 5: over 5 metres...

We do not agree with breaking with the criteria established in item 4 to accept overlapping with a percentage over 5 meters. Except in very particular instances, this criteria should remain in force to avoid ambiguities which could result in unnecessary risk to the safety of navigation.



IHO

WENDWG12 DISCUSSION ITEMS

International
Hydrographic
Organization

IC-ENC Member comment 6: aligning policies between RENCs

Strongly recommend aligning policies with PRIMAR in order to have discussions based on the same underpinning principles.



IHO

WENDWG12 DISCUSSION ITEMS

International
Hydrographic
Organization

IC-ENC Member comment 7: Overlap advisory service to the RHCs

IC-ENC overlapping policy could be set in the overarching IHO policy context, i.e. reference to:

- IHO Resolution 1/1997 as amended on “Principles of the WEND & Its annex”. Member States rights and responsibilities on producing ENC’s are as described in this resolution.
- IHO Resolution 2/1997 as amended on “establishment of RHCs”. The RHC are established with the aim to establish, coordinate and enhance cooperation in hydrographic activities amongst States on a regional basis amongst others for the implementation of WEND. Article 15 is very specific: “RHC will identify and assess INT Charts and ENC coverage within the region, highlighting those areas of significant navigational risk to the producers nations and work to resolve the issues in a timely manner”.
- IHO Resolution 1/2018 on “Elimination of overlapping ENC data in areas of demonstrable risk to the safety of navigation”. This resolution describes a procedures to be applied “in any case where the elimination of overlapping ENC data cannot be resolved and its continued existence presents a demonstrable risk to the safety of navigation”. In this Resolution the “RHC will identity and assess ENC coverage within their area of responsibility and highlight those areas where there are navigationally significant differences between overlapping ENC’s.”

IC-ENC’s role could be limited to an overlap advisory service to the RHCs.



IHO

WENDWG12 DISCUSSION

International
Hydrographic
Organization

- IC-ENC Member comments are useful, but varied and these illustrate the complexity of the topic.
- WENDWG, and specifically RHC representatives, may wish to discuss these comment and/or make comments of their own.
- IC-ENC will use this discussion in development the next iteration of the draft policy, for IC-ENC Steering Committee review.

- **Comment 1:** Both products are to be released and it's up to the customer to select the producer
- **Comment 2:** Implementation of "Intelligent ECDIS" mechanism
- **Comments 3 & 4:** bilateral / territory aspects
- **Comment 5:** over 5m...
- **Comment 6:** aligning policies between RENCs
- **Comment 7:** Overlap advisory service to the RHCs (in the context of IHO Resolutions)