

**9th Meeting of the Nautical Information Provision Working Group
(NIPWG)
Niterói, Brazil, 13 – 16 September 2022 (hybrid event)**

Contribution to the IHO Work Programme 2022	
Task 2.1.2.5	Organize, prepare and report meetings of NIPWG
Task 2.5.2	Support the development and implementation of Maritime Services
Task 2.8.1	Maintain S-12, as appropriate - <i>Standardization of List of Lights and Fog Signals</i>
Task 2.8.3	Maintain S-49, as appropriate - <i>Standardization of Mariners' Routing Guides</i>

The 9th meeting of the Nautical Information Provision Working Group (NIPWG) was held in Niteroi, Brazil from 13 to 16 September 2022, kindly hosted by the *Diretoria de Hidrografia e Navegação* (DHN) and arranged as a hybrid event.

The meeting was chaired by Mr Eivind Mong (Canada), supported by Ms Laura Hall-King, Secretary (United Kingdom). Forty-five delegates (17 in-person, 28 by VTC) from 21 Member States (Australia, Brazil, Canada, China, Colombia, Denmark, Finland, France, Germany, Greece, India, Italy, Japan, Netherlands, Nigeria, Norway, Poland, Republic of Korea, Spain, United Kingdom and United States) and ten expert contributors (4 in-person, 6 by VTC) were registered in the meeting. The IHO Secretariat was represented by Assistant Director Yves Guillam (VTC).



Welcome address and in-person participants in NIPWG-9

After a welcome address by VAdm Renato Garcia Arruda (DHN Director), the Chair presented the main objectives of the meeting, from considering the progress made on the various actions from the HSSC to the development of the S-100 based products that are in the remit of NIPWG.

The Chair also took some time to brief new NIPWG Members with a short history on the path from standardization of nautical publications (in paper) to the point of development of current S-100 based product specifications. This was very welcome for putting everyone on the same page and for raising the awareness on the identified uncertainties that remain to be resolved.

The main outcomes of the IALA-IHO Workshop on S-100 / S-200 Product Specification Development and Portrayal held in Norway the week just before NIPWG-9, were also shared with all Members to put them quickly at the same level of knowledge than the NIPWG Chair

Group¹. This was particularly relevant for S-125 for which the concept of Nautical Publication Information Overlay was introduced as a possible solution for being used in S-100 ECDIS.

02 | Workshop discussion

- Purpose of S-125 data
 - to be updated more frequently than the S-101 dataset
 - As there are differences in the frequency of when the S-101 dataset can be issued, which is to the best of the ability of the provider,
 - the S-125 dataset should be updated at a frequency necessary to support navigational safety
 - S-125 should include, at a minimum, the same AtoN data contained in the S-101 Product Specification
 - 4 identified statuses (Discrepancy, Temporary Change, Proposed Change, and Advanced Notice of Change)
 - S-125 data has benefits like AtoN status and frequent updates than S-101 ENC

02 | Workshop discussion

- Interoperability between S-125 and S-101
 - S-125 data merely as an overlay was considered a big enough first step to implement instead of data replacement
 - As an option for replacement of data, portrayal of only the status data, and not replacing nor duplicating actual existing AtoN symbology was generally accepted
 - the actual dataset could still contain a full set of AtoN data, although only status would need to be portrayed on ECDIS
 - The status indicator symbol would merely be flagging and not obscuring the ENC symbol
 - Interoperability could be enhanced at a later stage
 - It was concluded that only the S-125 status change symbology and pick reports need to be included by overlay/interleaving

Some important discussion points on S-125

Following up on a task from the HSSC, the NIPWG considered a draft proposed paper on the “intended use and distribution of S-1xx products”. This paper, which needs to be reviewed by all members from now, aims to show the most common sources of data used in each product and to highlight the data dependencies in an S-100 complex environment.

Presentations from the US (NGA) and the UK (UKHO), respectively on the new World Port Index web services and on the new generation of Digital Sailing Directions, generated fruitful discussions. They also highlighted the needs for national strategies to ensure that the new generation of products will remain interoperable or at least compatible with the current development of S-1xx products at international level.

The new NIPWG internal arrangements in task groups (TGs) for progressing the developments of every single S-1xx products under NIPWG’s remit proved to be very efficient. The different task groups (S-122, S-123, S-125, S-128, S-131...) had several VTC technical meetings prior to NIPWG9. The TGSs provided their status reports, not only on technical matters which are progressing very well, but also on key discussion points that are critical to move forward (scope, use cases, coverage limits and responsibilities, test beds, authoritative S-100 service coverage, digital signature versus encryption, etc.).

03 | Discussion topics

- Topic 3. S-128 product service
 - S-128 will be used also to check the up-to-datedness of nautical products
 - discussions on the S-128 production and services from the development of the WEND-100 Guideline
 - INTtoGIS3 will provide coverage information of various S-10X products by utilizing S-128
 - utilized by RHC, RENC, HO and other potential users if necessary
 - discussion of various applicability such as a new data service method MCP (Maritime Connectivity Platform) and a cloud-based approach

Some important discussion points on S-128

This is particularly important for S-128 which appears to become one of, if not THE, cornerstone of the S-100 implementation phase. For S-128, the UK shared the concerns they foresee for the RENCs, the End-User Service Providers/VARS, and ECDIS Providers. PRIMAR shared its draft vision on the various options to implement this new “catalogue of nautical products/services”.

A significant number of discussion points were identified for most of the products. Many complex questions still need to be addressed, clearly worded... and then answered.

¹ Who participated actively in the IALA-IHO Workshop.

Following up on a former NIPWG action, France submitted an interesting discussion paper with a proposed classification of S-1xx products against those listed in SOLAS V/27 (“...*nautical publications such as sailing directions, lists of lights; notice to marines, tide tables, all other nautical publications...*”). With reference to IHO Resolution 5/2022, needless to say that there is no obvious equivalence between existing NP1 and NP2 and S-1xx products and services. It was agreed that NIPWG had to prepare a draft statement promoting the need to cooperate across governments and to identify the best organization to provide *data services* to ensure the best possible whole service for the end user.

The NIPWG Chair commented on the amendments proposed to the IMO Resolution MSC.232 (82) – *ECDIS Performance Standards*. NIPWG agreed to prepare for HSSC-15 some clarifications on the definition of “*Electronic Navigational Data Service (ENDS)*” which is introduced in these amendments. Despite a couple of late and additional comments made by IACS² submitted to MSC106, it is expected that these amendments and the associated calendar will be approved in November. In the discussion on the IACS’ comments, the NIPWG Chair supported by the Chair of IEC TC 80 prepared the wording recommended to be used by the IHO for a verbal intervention at MSC106.

A VTC NIPWG intersessional meeting is planned on 14 of December while the 10th meeting of the NIPWG is planned from 12 to 15 September 2023, with the venue still to be decided.



² International Association of Classification Societies



Some NIPWG-9 Participants (in-person and VTC)