

**10th Meeting of the Nautical Information Provision Working Group
(NIPWG)
IHO Secretariat, Monaco, 12 – 15 September 2023**

Contribution to the IHO Work Programme 2023	
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' Routeing Guides</i>

The 10th meeting of the Nautical Information Provision Working Group (NIPWG) was held at the IHO Secretariat, Monaco, from 12 to 15 September 2023.

The meeting was chaired by Mr Eivind Mong (Canada), supported by Mr James Weston, Secretary (United Kingdom). Thirty-eight delegates from 15 Member States (Australia, Canada, China¹, Denmark, Finland, France, Germany, India, Italy, Norway, Poland, Republic of Korea, Sweden, United Kingdom and United States of America) and twelve expert contributors representing various stakeholders (EGDH, IHMA, ICS, IEC, Portolan Sciences, Furuno, Teledyne Geospatial, Anthropocene Institute, IIC Technologies Inc, PRIMAR, SevenCs, and Bureau Veritas Marine&Offshore)² attended the meeting. The IHO Secretariat was represented by IHO Director Dr John Nyberg, Technical Standards Support Officer (TSSO) Jeff Wootton³, Project Officer Insung Park and Assistant Director Yves Guillam.

Dr Mathias Jonas, Secretary-General of the IHO welcomed the participants, making several comparisons across the centuries between the first textual *navigation data services* available through the portolans, followed by charts, then the first handheld cellular phone, and therefore stressing the key role for NIPWG in the S-100 era to tackle multiple concepts and technologies together in support of mariners' requirements and beyond.

The NIPWG Chair opened the meeting, providing a clear statement on the objectives and priorities given by the HSSC, such as S-128 development since it is the only the S-100 based product under NIPWG listed in Phase 1 / Route Monitoring of the S-100 Roadmap. The List of those Decisions and Actions from HSSC-15 tasking NIPWG was also reviewed.

Following an update on S-101 modelling provided by TSSO, the participants acknowledged that a robust mechanism to assess the impact of changes in the S-101 model on S-12x product specifications - in the remit of NIPWG - was not well established yet. However, the Working Group made progress during the week, as demonstrated by a Member (US) who agreed to become the representative of NIPWG in the Registry Domain Control Body for better coordination.

Several quite complex technical and policy issues were addressed during the meeting. One of which was about the MRN⁴ concept. The MRN was proposed as a possible way to identify official versus unofficial data in conjunction with producer codes, but the Group decided to

¹ By VTC, for the S-127 agenda item only.

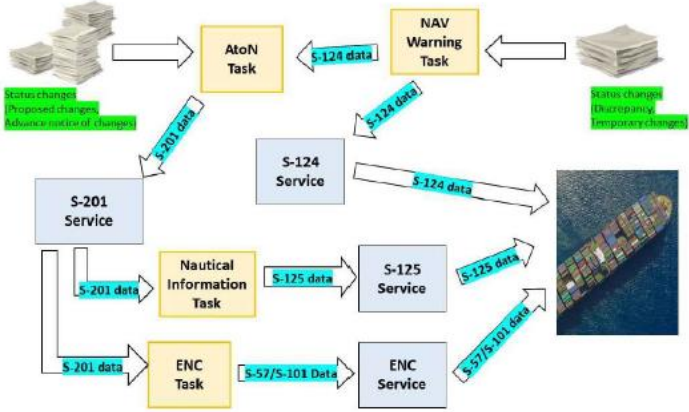
² IMO/IALA/IHO Expert Group on Data Harmonization (EGDH), International Harbour Masters Association (IHMA), International Chamber of Shipping (ICS), International Electrotechnical Commission (IEC).

³ Also S-101 PT Member.

⁴ Maritime Resource Name (Useful Reference: IALA Recommendation R1023).

design use cases prior to any implementation phase. As a side-consequence for S-98, the meeting agreed to include an interoperability identifier into the registry, as a concept.

The updates provided by the different Task Groups (TGs) on the development of their product specifications (S-122, S-123, S-125, S-128, S-131...) were promising. This offered the opportunity to identify the need to extend the principle of drafting “Operational Interaction Diagrams” (such as the one aside for S-125) to other nautical publications.



Source: 20th IALA Conference

Generic AtoN information flow

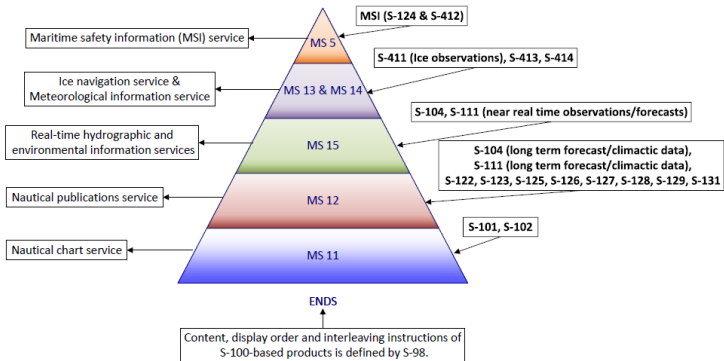
For S-123, the proposed changes to the product specification Ed. 1.0.0 by the TG were agreed in principles but need to be shared within NIPWG before a next edition is submitted for approval. At the same time, Bureau Veritas suggested S-123 as an S-100 based product adequate candidate to map the connectivity coverage for remote operations which is becoming so important for navigation of autonomous platforms in particular but may include additional uses. This was received positively and the introduction of new object types in S-123 to meet this requirement is to be considered.

For S-128, the TG was requested to create and distribute a detailed timeline of the development roadmap from November 2023 to August 2024, to ensure a robust testing phase when the tool for generating CATALOG files is ready and documented. The Secretariat also invited the TG to make a clear distinction between the S-128 product specification development and the development of INTOGIS III. Dedicated monthly VTC meetings are now planned to finalize the product specification, prepare and monitor the testing phase, and work on distribution issues and use cases. As a reminder, the Chair referenced the S-128 use case possible scenarios, presented at HSSC-15⁵.

The Chair also reminded the Group of the requirement for an impact study of S-128 before submission of Ed. 2.0.0 for approval, and Denmark agreed to lead this task. This impact study should cover the association with the IMO Maritime Services.

On this matter, in preparation of the NIPWG report to HSSC, the Chair and Vice-Chair provided an update on the S-100 System Architecture in relation to IMO’s Maritime Services.

Some refinements are still needed since the description of Maritime Services is very limited in general (IMO MSC.1/Circ.1610 refers) and the association with SOLAS/V Regulations not clearly depicted yet.



Electronic navigational data service (ENDS) means a special-purpose database compiled from nautical chart and nautical publication data, standardized as to content, structure and format, issued for use with ECDIS by or on the authority of a government, authorized hydrographic office or other relevant government institution, and conforming to IHO standards; and, which is designed to meet the requirement of marine navigation and the nautical charts and nautical publications carriage requirements in SOLAS regulations V/19 and V/27. The navigational base layer of ENDS is the electronic navigational chart (ENC). (MSC.530(106))

⁵ See [HSSC-15 IHO Secretariat’s Bulletin Report](#).

With no other nomination received by the Secretariat for the positions of Chair and Vice-Chair, Mr Eivind Mong (Canada)⁶ and Mr Stefan Engström (Finland) were re-elected by acclamation.

In addition to S-12x Task Groups' sessions which proved very efficient during the year, a sequence of VTC NIPWG inter-sessional meetings will be arranged between now and the next meeting. The 2nd IHO-IALA S-100 Workshop is scheduled in Annapolis (USA) from 9 to 13 September 2024, and the 11th meeting of NIPWG is planned in Europe from 24 to 27 September 2024 (location to be confirmed).

In his conclusion, the Chair shared NIPWG Members' recognition of the strong support received from subject matter experts of industry since the last meeting.



NIPWG-10 Participants

⁶ Due to administrative reasons, commitment confirmed for one year only.