2nd NCWG MEETING Monaco 26-29 April 2016

Paper for Consideration by the Nautical Cartography Working Group (NCWG)

Submitted by:	NCWG Chair
Executive Summary:	A brief report on discussions and decisions on activities related to the future of S-4 since CSPCWG11/NCWG1.
Related Documents:	CSPCWG11-09.06A The Future of S-4 as the IHO Chart Specification HSSC7-05.6A_rev2 Report and Recommendations of NCWG HSSC7 Minutes
Related Projects:	NCWG Work Plan

Report – Discussions on the Future of S-4

Introduction / Background

Discussions at CSPCWG11/NCWG1 on the subject of the possible future programme of work for S-4. This paper summarises the discussions and activities related to this subject since CSPCWG11/NCWG1.

Analysis / Discussion

Paper CSPCWG11-09.06A *The Future of S-4 as the IHO Chart Specification* provided a summary of thoughts of the NCWG Chair as to possible options for the future programme of work for S-4, based on discussions that have taken place in the AHS. The key points raised in the paper as factors that may influence the future programme of work for S-4 include:

- Modernising the format of S-4 such that it can be provided as a web service rather than/in addition to a textual (pdf) format;
- The requirement to begin to incorporate graphics showing ECDIS portrayal in addition to paper chart portrayal (perception that S-4 is just a "paper chart" specification);
- Consideration of specifications within S-4 that are currently written as generic to both paper chart and ENC, however the requirements for navigation result in divergence of the specification between the requirements for the paper chart and the requirements for ENC;
- Review of S-4 parts A and C has not yet been conducted (e.g. consideration of incorporation of the WEND Principles and parts of S-65; merging of remaining "unique" guidance in Part C into Part B and subsequent cancellation of Part C; publishing Part A as a separate document);
- The impact of discussions regarding the future of the paper chart;
- The relationship between S-4 and other nautical cartography related specifications, such as the S-57 UOC for ENC and the S-101 Data Classification and Encoding Guide;
- The continuing divergence of the construction and content of paper charts and ENCs to provide the best information for the mariner in regard to the way that the products are used in the planning and operational environment; and
- Evolving nautical chart production processes by HOs (e.g. ENC first with the paper chart as a derivative);

Paper CSPCWG11-09.06A was included as a reference paper under the NCWG Agenda item for discussions at HSSC7, with a proposal to establish a Project Team under the NCWG to further investigate possibilities for the future style and format of S-4 (essentially a 'scoping study"). The conclusion of the Committee was that this work was not considered a high priority and would divert resources from more important Work Items such as the future of the paper chart. However, the Committee suggested that, based on the priorities of the NCWG, this proposal could be resubmitted to the HSSC at a later date for consideration. The section of the HSSC7 Minutes related to this discussion is as follows:

The IHB proposed that the HSSC should instruct the NCWG to limit its future work on S-4 to clarifications, when required by chart producers or mariners, and to postpone further revisions until the proposed scoping study of the future of S-4 is concluded. The NCWG Chair indicated that most of the work carried out by this group was driven by IHO Member States' requests and that

there was probably a misconception by HSSC that S-4 was for paper charts only: he reminded the Committee that S-4 was an important reference for ENC production as well.

<u>Further observation since CSPCWG11/NCWG1 by NCWG Chair</u>: While discussing options for the depiction of radio activated fog signals and lights on charts (particularly encoding options for ENC), it was noted that many of the types of fog signal that are currently listed at S-4 – B-452 may no longer be used (or relevant). While some work was done during the full comprehensive review of S-4 Part B to remove specific instances where older technology is no longer used to aid in navigation (e.g. removal of specifications for charting certain types of radio position-fixing stations), a process for conducting a more thorough review of S-4 Part B to remove obsolete or redundant specification could also be included in the tasks for the future programme of work for S-4.

Conclusions

While the HSSC does not consider a future programme of work for S-4 to be a high priority at the moment for the NCWG in respect to other activities of the Working Group, it agreed that a scoping study should be conducted as resources become available to develop recommendations for further work on S-4.

Recommendations

1. NCWG to note the additional observation of the NCWG Chair above for consideration in the scoping study for the future programme of work for S-4.

2. NCWG to resubmit the proposal to establish a Project Team to perform the scoping study for the future programme of work for S-4 to HSSC8, under the terms of Reference and Work Plan submitted to HSSC7.

Justification and Impacts

If S-4 is to remain the authoritative IHO nautical charting specification, it must continue to evolve so as to fully specify to the nautical cartographer the requirements for all forms of nautical chart. Such evolution will also serve to remove any interpretation of S-4 as just the "paper chart specification".

The main impact of the recommendations in this Paper is on resources. The CSPCWG review of S-4 Part B required considerable resources over an extended time period, and based on this a further prolonged resource commitment from IHO Member States would be required.

Action required of NCWG

The NCWG is invited to:

- a. **Note** this report.
- b. **Approve** the resubmission of the proposal to establish a Project Team to perform a scoping study for the future programme of work for S-4 to HSSC8.