Paper for Consideration by HSSC

Comment on the Report of the DQWG

Submitted by:	Chair of NIPWG; Vice-Chair of NIPWG; UK; DE.
Executive Summary:	This paper comments on the proposed change to the DQWG Terms of
	Reference
Related Documents:	HSSC9-05.5A Report and recommendations of DQWG
	HSSC9-05.5B Proposal for new DQWG TORs.
Related Projects:	All projects developing S-100 product specifications

1. Introduction / Background

In paper HSSC9-05.5A, the DQWG proposes an extension to its current responsibility to include data quality aspects for **all** S-100 based product specifications. A proposed Terms of Reference (TOR) is provided as paper HSSC9-05B. The current TOR refer to 'digital hydrographic data', but in reality, its focus to date has been entirely on quality aspects of bathymetric data. To this end, most of the members of the DQWG have particular expertise in surveying. Likewise, the outputs of the DQWG have been focused on survey and bathymetric quality.

2. Analysis/Discussion

The proposed DQWG TOR specifically states that it is 'to ensure that the data quality aspects are addressed in an appropriate and harmonised way for all S-100 based product specifications'.

This paper questions whether data quality expertise is a specialist skill, rather than being best addressed by relevant subject matter experts. The DQWG proposal suggests that it's members are needed by, for example NIPWG, to deliver DQ specifications on the full range of nautical product specifications based on S-100, including Marine Protected Areas, Radio Services, Traffic Management etc.

The consequences of the principle described in the proposed DQWG TOR, that all WG and PT developing S-100 based product specifications are required to 'refer the data quality aspects to DQWG for advice and endorsement', will be that product specification development will require an additional step in the process, causing potential delay with iterations through the DQWG.

Noting the new tasks within the potential work plan of DQWG, the following questions arise:

A	Provide WG and PT a checklist aiming to develop, when appropriate, data quality components within product specifications	Is this necessary in addition to what is defined in S-100 section 4C?
В	Periodically review S-100 based product specifications to ensure the data quality aspects have been referred to DQWG	By which mechanism or by whom will the review by initiated? When does this periodic review take place? If the review takes place after a product specification has been issued, how does it relate to the approval process it has already been through? If the review takes place prior to publication, will the review delay the development process?
С	Monitor new developments of ISO and other international standards, check against S-100 based product specifications and advise accordingly	Is this an onerous task? Does the S-100 WG already have a process in place to keep S-100 aligned (where necessary) to ISO standards?
D	Provide guidance on data quality aspects to hydrographic offices, in particular to ensure harmonized implementation	Is there any evidence that HOs require guidance on data quality aspects?

E	Provide data quality educational material for the use of mariners	Is there any evidence that such material is used? Is data quality a special case that requires additional material in addition to what is included in various IHO standards?. On which standards should this material be based?
F	Advise on the ways ECDIS displays data quality information of product specifications	Isn't this the role of the Nautical Cartography WG?
G	Investigate and advise on possible legal aspects of data quality in product specifications	What legal liability might the IHO be exposed to if a working group gives legal advice?
Н	Propose new data quality topics for consideration by HSSC	What is envisaged within this task?

3. Conclusions

The fundamental questions are:

- Is Data Quality such a specialist subject that requires a separate group of experts?
- Can a single group of experts be considered to be suitably knowledgeable on data quality aspects of all data types within the wide range of S-100 product specifications?
- Is there further work required of the DQWG once it has delivered bathymetric survey quality aspects?

4. Recommendations

HSSC is invited to consider whether the change of TOR as proposed by the DQWG is appropriate. In doing so, HSSC should consider the proposed new work plan for the DQWG and decided what work is required to support S-100 product specification development by other HSSC working groups.

If data quality expertise is not considered to be sufficient within working groups developing product specifications, a counter proposal to the requirement for a DQWG is that HSSC maintains a list of data quality experts who are available to other working groups as required. These can then be called upon to assist in the product specification development and review process as it is happening, rather than as an additional process.

5. Justification and Impacts

The proposal to maintain a list of 'on call' data quality experts will have the following benefits:

- Time and resource in continuing the life of the DQWG will be saved;
- Interaction with the S-100WG will take place when required;
- Interaction with other working groups developing product specifications will take place when required;

6. Action Required of HSSC

The HSSC is invited to:

- a. **Note** the comments in this paper;
- b. **Consider** the relevance of the comments and questions in relation to the DQWG proposals;
- c. **Consider** the counter proposal in section 4 above;
- c. **Take any actions** considered appropriate.