



INTERNATIONAL HYDROGRAPHIC ORGANIZATION
CAPACITY BUILDING SUB COMMITTEE (CBSC)

Date: 18th December 2018

Members of the CBSC

CBSC letter 2018

Dear colleagues,

Just a few days left before another busy year is ending. As a tradition, now for the eighth time, I am sending you an annual letter to inform you about some major issues since our last meeting in Goa.

First, I would like to highlight that Capacity Building has kept its important role within IHO and beyond. This has been reflected in the IRCC meeting with many fruitful discussion with several other subordinate bodies and RHCs. At Council 2 the topic was prominently present as well. There were discussions whether to name Capacity Building as one of our strategic goals, but in my view CB is more a tool to reach our goals rather than a goal in itself.

Ms Sandrine Brunel has been acting as a full time Capacity Building Assistant starting on 1 January 2018. She has been very supportive for the execution of our CB work.

We can welcome the new members Lucy Fieldhouse (UK), Emre Gulher (Turkey), Saeid Parizi (Iran, I. R. of) and Felipe Barrios (Chile). I welcome all of the new members to our group and sincerely thank the former members. My very special thanks go to Jeff Bryant. His tremendous contribution to CB is perfectly reflected by the Alexander Dalrymple Award presented to him during the Council 2 meeting in London. Congratulations again.

The updated list of members of our Subcommittee can be found following the link: https://www.iho.int/mtg_docs/com_wg/CBC/CBC_Misc/CBSC_members.pdf

The 11th Joint IHO/IMO/WMO/IOC/IALA/IAEA/FIG/IMPA Capacity Building (CB) Coordination Meeting was held in September 2018 onboard HQS Wellington in London, UK. It was hosted by the International Maritime Pilots Association (IMPA) that joined the informal group only one year ago. A very positive development that I would like to highlight is related to our joint capacity efforts with the IMO. It seems that the chances for a joint project is realistic. We will have to see what 2019 will bring in this regard.

I can report that the C-55 Review PT is making progress and I am looking forward to their report in February next year.



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Please find enclosed the final minutes of our Conference call that took place on 19 September. I will prepare a draft note on C-55 limitations and recommendations, to circulate between participants within the next month.

Some activities planned for 2018 have been cancelled or postponed to 2019 or added for 2019. The list will be distributed by Alberto seeking your approval.

Some positive information from the MSDIWG and the valuable support from Denmark: As you all may remember at the last CBSC meeting we found that there is either no or very little basic teaching material available for MSDI training that is free of charge for IHO Member States. IRCC therefore decided to task the MSDI working group to establish basic MSDI training material, in order for IHO Member States and the Regional Hydrographic Commissions to conduct basic MSDI education/training. The Danish Geodata Agency has decided to establish and fund the establishment of the necessary MSDI training material with help from an external partner. The budget for 2018 and 2019 is DKK 400,000. Thanks a lot to Jens-Peter, Denmark and MSDI-WG.

The time limit for submissions of 1 April is as important as the processing according to the procedures well in advance of the meeting. As usual I would like to ask you to assure the timely and complete submissions within your Regional Hydrographic Commissions. May I as well remind some of you on the execution of the action items still on our lists.

I would like to inform you that the IHO Secretariat in liaison with IRCC, IBSC and CBSC Chairs has decided to postpone the second Capacity Building and IBSC Stakeholders' Forum which was previously scheduled on 27 May and 28 May 2019 in Genoa, Italy. The time allocation for the intended Stakeholders' Forum would be too short and embedded in two very busy weeks with the following CBSC17 and IRCC11 meetings. The second Capacity Building and IBSC Stakeholders' Forum is now planned in 2020 and to be organized at the Secretariat in Monaco as two days CB Forum and one day IBSC Forum.

I would like to thank you for your most valuable participation in the IHO capacity building initiative and I am looking forward to seeing you all in good health at the next CBSC meeting in Genoa, Italy on the 30 May to 1 June 2018.

Let me finally send you warm seasonal greetings and the best wishes for a happy new year 2019 for you and your families.



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Best personal regards,

A handwritten signature in blue ink that reads "Thomas Dehling". The signature is written in a cursive style.

Thomas Dehling

Chairman IHO Capacity Building Sub-Committee



Draft memo C-55 Review Project Team

C-55 Limitations and recommendations

Participants C-55 RPT: CA, FR, JA, NO (Chair), UK, US

References - Documents

ToRs and RoPs of the WG are available on the CBSC section of the IHO website (https://www.iho.int/mtg_docs/com_wg/CBC/CBSC16/AnnexB-C-55RPT-ToR-RoP.pdf).

The UK & FR proposal to the CBSC16 for review of C-55 is also available on this section (https://www.iho.int/mtg_docs/com_wg/CBC/CBSC16/CBSC16-08.3B-Review_of_C-55_UK_FR.pdf).

C-55 publication: https://www.iho.int/iho_pubs/CB/C-55/index.html

Purpose of C-55:

The purpose of IHO C-55 Publication is to provide base data for governments and supporting international organizations as they consider the best means by which to implement responsibilities set out in Chapter V, Regulation 9, of the Safety of Life at Sea (SOLAS) Convention. It also informs IHO input to the United Nations Global Maritime Assessment.

C-55 is a key indicator on charting and hydrographic survey status for our most strategic stakeholder organization, the IMO through their mandatory IMSAS framework (IMO Member States Audit Scheme, https://www.iho.int/mtg_docs/CB/CBA/IMSAS/IMSAS-Programme.pdf). The quality of this indicator reflects therefore directly on IHO and its member states.

Limitations of present C-55

Limitations of the present C-55 with regards to hydrographic survey status can be defined in 4 categories:

1. Quality of the data. As there is no clear prescribed way of how to calculate and derive C-55 hydrographic survey status data, IHO member states do this in very different ways. As a consequence there is major inconsistency in how this data is produced. The quality of this part of C-55 is therefore at best subjective and questionable.
2. Ease to populate this part of C-55 for IHO MS. Depending on what method a IHO MS chooses to populate C-55, it can be resource demanding work that does not guarantee objective quality.
3. Fit for purpose. From a safety of navigation perspective, assessments of the entire 0-200m depth area for surveying and charting adequacy are not particularly useful. Based on the current and forecast size of vessels and the dynamic nature and complexities of seafloors, a different depth

range, e.g. 0-50m may produce more relevant assessment results. From a Blue Economy global perspective more detailed knowledge at all depth ranges continues to be an important objective for all Member States to ensure the effective and sustainable management of the oceans and seas.

4. Usability. At present C-55 Hydrographic status is presented as a generic table with an overall status for a large geographic area, only differentiated in two depth areas (shallower and deeper than 200m)). Adapting C-55 to GIS technology allows for enhanced spatial analysis, interoperability, data sharing and discovery (e.g. Marine Spatial Data Infrastructures (MSDI) and Web Mapping Services (WMS)), and visualization of the data, which could greatly enhance its usability.

Recommendations

Short term

The C-55 RPT recommends use of CATZOC from ENC's to derive survey status data as a first step to improve the quality (and especially the consistency) of C-55. Some IHO MS have an issue that CATZOC is linked to the charts, but the CATZOC is directly linked (by definition!) to the source data. This recommendation is in line with IRCC's requests to producers to improve the quality of CATZOCs on their charts (in particular by limiting the use of CATZOC "U").

The calculation of the C-55 from the CATZOC could lead to a deterioration of the indicator. The risk is real (this was the case for the indicators set by FR & UK) but the objective of the C-55 is to provide the most reliable information possible on the state of the surveys and not to show indicators in green.

The 200m depth limit between "shallow" and "deep" indicators can be questioned. It can however be addressed through the conversion table from CATZOC to C-55 (see FR proposal annexed to the CBSC16-08.3B paper).

The calculation of the C-55 from the CATZOC may simplify the production of the C-55 as:

- CATZOC has to be established by the ENCs producers anyway
- IHO secretariat has already access to the ENCs' CATZOC through the RENCs (see IRCC7 Action 24 for example). The IHO secretariat could therefore produce the C-55 quite directly and automatically.

Long term

Beyond this "immediate" pragmatic solution, a more in-depth overhaul of the C-55 should be considered in order to better depict the surveying status for:

- Safety of navigation. In some areas (e.g. Arctic; Polynesia) only a small percentage of coverage is really necessary, a "poor" C-55 may be enough to answer safety of navigation needs;
- A state of knowledge of bathymetry ("Hydrography is Much More than Just Nautical Charts") in support of for example the Seabed 2030 project

The work to integrate C-55 into the IHO Country Information System should continue.