

Commission Report to the ICA Executive Committee

Commission: Marine Cartography

Date of report: 20/06/2023

Period of report: 07/2019 - 08/2023

Name of reporter: Ron Furness EC liaison: Andrés Arístegui

General Remarks:

The report should focus on major events and generally not exceed 1.5 pages incl. photos and links. Activities to be reported may fall into the following categories, but should either be (co)initiated by your commission or reflect significant commission participation:

Commission/Working Group highlights (e.g. conferences, publications, products & services, awards, etc. and outcomes for the EC to take note)

Publications

1. A Constraint-Based Generalization Model Incorporating a Quality Control Mechanism May 2023 DOI: 10.3390/geographies3020017

Natalia Blana, Ioannis Kavadas, Lysandros Tsoulos

2. Generalization of Linear and Area Features Incorporating a Shape Measure September 2022

International Journal of Geo-Information 11(489)

DOI: 10.3390/ijgi11090489

Natalia Blana, Lysandros Tsoulos

3. Web-based Nautical Charts Automated Compilation from Open Hydrospatial Data

June 2022 Journal of Navigation 75(4):1-21

DOI: 10.1017/S0373463322000327

Stelios Contarinis, Byron Nakos, Lysandros Tsoulos, Athanasios Palikaris

4. An Integrated Environment for Monitoring and Documenting Quality in Map Composition Utilizing Cadastral Data

June 2022 International Journal of Geo-Information 11(6)

DOI: 10.3390/ijgi11060348

Ioannis Kavadas, Lysandros Tsoulos

5. Constraint-Based Spatial Data Management for Cartographic Representation at Different Scales May 2022

DOI: 10.3390/geographies2020018 Natalia Blana, Lysandros Tsoulos **Notable cross-disciplinary events** (e.g. with other ICA Commissions/WGs, regional and international communities)

ICA has been represented at all annual meetings and annual workshops of the FIG/IHO/ICA International Board on Standards of Competence for Hydrographic Surveyors and Nautical Cartographers (IBSC) since the ICA GA 2019. The 2020 IBSC meeting was held in Cartagena de Indias, Colombia, the 2022 meeting in Cadiz, Spain and the 2023 meeting was held in Tokyo, Japan. The interim meetings were held via computer conferencing due to COVID except for the one in 2022 that was held in Singapore. ICA member of IBSC Ron Furness chaired the IBSC during 2020 - 2022 and ICA member of IBSC Lysandros Tsoulos is the vice chair of the Board. The ICA representatives have participated and contributed cartographic expertise in all decisions of the IBSC. The commitment to ICA through membership of the IBSC is extensive and requires dedicated time throughout the year in addition to attending the meetings of IBSC

Notable public events (e.g. invited public speech, Mapathon, TED talks, hackathon, etc.) Opportunistic discussions have been taken with national nautical cartographers in the sidelines of all attended IBSC meetings.

Educational highlights (e.g. degree programs, MOOCs, lifelong learning courses)

Specifically relating to programme approvals, in the period, the IBSC has recognized five (5) Category A programmes and seven (7) Category B nautical cartography programmes.

Additionally, the ICA Members fully contribute to the assessment of submitted hydrographic surveyor

Additionally, the ICA Members fully contribute to the assessment of submitted hydrographic surveyor programmes. In the period there have been eleven (11) Category A and twenty-two (22) Category B programmes recognized, with some of these reviews led by the ICA Members.

A number of reviews remain to be completed intersessionally.

Contributions were made also to the recognition of four (4) international hydrographic certification schemes. Furness is presently in early discussions about a potential international certification scheme for nautical cartographers.

The Standards of Competence for Nautical Cartographers have been maintained. The Board decided to embark on a revision of the Standards in order to include subjects as Marine Spatial Data Infrastructures (MSDI) and the new series of S-1xx IHO Standards.

The ICA Members contribute their expertise to the maintenance of the Standards of Competence for Hydrographic Surveyors.

On-site visit was made by one ICA Member to the Malaysian University of Technology in Johore Bahru when their cartographic programmes were reviewed.

ICA Members have contributed to an "Empowering Women" programme and one member has tutored student alumna participants.

Any other sharable experiences

During the period the IBSC decided to increase its ICA membership from 2 to 4 Members. This presented a double challenge of finding suitable members to represent ICA as additionally to replace the other members. One candidate from India was accepted by ICA and appointed to the IBSC. A second candidate from Spain will join after the ICA GA when his employing organization will become an Affiliate Member of ICA, thus confirming his eligibility. Another potential candidate from Italy is presently finalising her application.

Upcoming events and planned actions

The next inter-sessional IBSC meeting will be conducted in London, United Kingdom, (30 October - 3 November 2023).

If sufficient interest among the ICA CMC Members, an online meeting is mooted in the near future.