

**ADOPTION OF IHO PUBLICATIONS
S-5A, S-5B, S-8A AND S-8B STANDARDS OF COMPETENCE.**

References:

- A. IHO Resolution 2/2007 as amended - Principles and Procedures for Making Changes to IHO Technical Standards and Specifications
- B. IHO Circular letter 37/2026 dated 29 June 2026

Dear Hydrographer,

1. In accordance with reference A, the adoption of the Editions 2.0.0 of the IHO Publications S-5B and S-5A Standards of Competence for Hydrographic Surveyors, and S-8B and S-8A Standards of Competence for Nautical Cartographers and Marine Geospatial Analysts were proposed through the Circular Letter in Reference B.

2. The IHO Secretariat thanks the forty five Member States who responded to Reference B: Algeria, Argentina, Australia, Bangladesh, Belgium, Brazil, Bulgaria, Canada, Chile, Colombia, Cyprus, Denmark, Fiji, France, Germany, Greece, Indonesia, Iran (Islamic Republic of), Ireland, Italy, Japan, Lebanon, Malaysia, Mauritius, Mexico, Morocco, Netherlands, New Zealand, Nigeria, Norway, Oman, Peru, Philippines, Poland, Portugal, Republic of Korea, Singapore, Slovenia, Spain, Sri Lanka, Suriname, Tunisia, Ukraine, United Kingdom of Great Britain and Northern Ireland and Uruguay.

3. All forty-five Member States approved the adoption of the proposed Edition 2.0.0 of the S-8B standard; forty-four Member States approved the adoption of the proposed Edition 2.0.0 of the S-8A standard; and forty-three Member States approved the adoption of the proposed Editions 2.0.0 of the S-5A and S-5B standards. Six Member States submitted comments in addition to their votes. All comments received are provided in Annex A to this Circular Letter with the responses from the IBSC Chair and IHO Secretariat.

4. When Reference B was issued, there were 104 Member States of the IHO with two States suspended. In accordance with the provisions of the Convention on the IHO as amended, the minimum number of affirmative votes required is 34. As a result, the above mentioned proposed Editions have been adopted and are now available (English versions only) on the IHO website > Publications > [Standards and Specifications](#).

5. The IHO Secretariat congratulates the IBSC Members on the successful completion and on the adoption of the new Editions of IHO Publications S-5A, S-5B, S-8A and S-8B.

On behalf of the Secretary-General

Yours sincerely,



Luigi SINAPI
Director

Annex: Responses to Member States' comments to IHO CL 37/2026 from the IBSC Chair and IHO Secretariat (in English only).

**MEMBER STATES' RESPONSES TO IHO CL 37/2026 AND COMMENTS
FROM THE IBSC CHAIR and IHO SECRETARIAT**

S-8A, Ed. 2.0.0**STANDARDS OF COMPETENCE FOR NAUTICAL CARTOGRAPHERS AND MARINE GEOSPATIAL ANALYSTS.**

IRAN (Islamic Republic of) (Vote for adoption = Yes)

General comment:

The overall revision of the second edition of the S8 Standard is welcomed and supported. However, it is noted that the revised edition introduces the S100 framework, while the associated training materials also reference S102. In this regard, it is recommended that the corresponding Learning Outcomes be incorporated to ensure closer alignment between the training content and the competencies expected of learners.

Furthermore, considering the scope and level of the course, it would be beneficial to provide participants with introductory exposure to other products within the S100 framework, including S104 and S111. This would further strengthen the alignment of the educational objectives with the evolving operational environment of the S100 framework and better prepare learners for its broader implementation.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank Iran (Islamic Republic of) for its vote and comment. However, the consultation process initiated through IHO Circular Letter 48/2025 was conducted from 19 December 2025 to 3 March 2026. It is therefore too late to incorporate any changes, other than minor typographical corrections, into the editions currently submitted for approval.

Nevertheless, it is important to emphasize that the Standards establish the minimum requirements for the respective levels of competence. Institutions are not only able, but are also encouraged, to include additional content and enhance the corresponding learning outcomes in accordance with their specific programmes and educational needs. The IBSC will take due note of the comments for consideration in a future revision of the S-8A Standard.

MALAYSIA (Vote for adoption = Yes)

General comment:

Malaysia agrees with the adoption of Edition 2.0.0 of IHO Publication S-5A and supports its implementation.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank Malaysia for the support.

NETHERLANDS (Vote for adoption = Yes)

General comment:

no vote, n/a for NL.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank Netherlands for its support.

UNITED KINGDOM (Vote for adoption = No)

General comment:

Selecting 'No' as a default answer, as this is not relevant to UKHO.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank the United Kingdom for its comment but would like to emphasize that the approval process is intended to reflect the collective support of the Members for the revised publication, rather than only the interests of Member States with programmes directly affected by the Standard. Furthermore, as there are currently only three recognized S-8A programmes worldwide, limiting approval to Member States with recognized S-8A programmes would make it impossible to reach the required number of favorable votes.

URUGUAY (Vote for adoption = Yes)

General comment:

SOHMA Uruguay supports the adoption of this Edition.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank SOHMA Uruguay for its support.

S-8B, Ed. 2.0.0	STANDARDS OF COMPETENCE FOR NAUTICAL CARTOGRAPHERS AND MARINE GEOSPATIAL ANALYSTS.
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MALAYSIA (Vote for adoption = Yes)

General comment:

Malaysia agrees with the adoption of Edition 2.0.0 of IHO Publication S-5A and supports its implementation.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank Malaysia for its support.

NETHERLANDS (Vote for adoption = Yes)

General comment:

no vote, n/a for NL.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank Netherlands for its support.

URUGUAY (Vote for adoption = Yes)

General comment:

SOHMA Uruguay supports the adoption of this Edition.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank SOHMA Uruguay for its support.

S-5A, Ed. 2.0.0	STANDARDS OF COMPETENCE FOR HYDROGRAPHIC SURVEYORS.
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CHILE (Vote for adoption = Yes)

Comments:

Standard location	Type of errata	What Ed. 2.0.0 Says (The Error)	What It Should Say (The Correction)	Evidence / Why It Is an Error
Section H5.5 "Currents" — subsection H5.5a "Tidally induced and non-tidal currents"	Taxonomic level	Declares "Explain the forces behind tidally induced currents and describe temporal variations. Differentiate between tidal and non-tidal current", as intermediate level learning outcomes, which are basic level. It does not modify the verbs from the previous standard	According to the definition of intermediate level in the guidelines, verbs at this level should be application and analysis.	There are no content or verb changes that justify raising the level to intermediate.

Section F1.1 "Physical geodesy", subsección F1.1a "The gravity field of the Earth"	Taxonomic level	Declares "Explain relationships between the gravity field of the Earth, normal gravity, and level surfaces", as an intermediate level learning outcome, which is basic level. It does not modify the verbs from the previous standard.	According to the definition of intermediate level in the guidelines, verbs at this level should be application and analysis.	There are no content or verb changes that justify raising the level to intermediate.
Section H1.2, Subsection H1.2a — "Time References" (H1.2a)	Taxonomic level	Declares "Configure position, attitude, and sounding systems for consistent time reference", as an advanced learning outcome, which is application level, i.e., intermediate level.	According to the definition of intermediate level in the guidelines, verbs at this level should be application and analysis	The verb <i>configure</i> implies following a procedure, set of rules, or manual to set up or adjust an existing system, tool, or software. It represents the practical use of procedural knowledge in a specific situation, unless it refers to creating when configure means designing, structuring, or assembling an original system from scratch.
Section H1.2, Subsection H1.2b "Time Latency"	Taxonomic level	Declares "Assess and account for time reference throughout the system ping cycle", as an intermediate learning outcome, which is advanced level.	According to the definition of advanced level in the guidelines, verbs at this level should be synthesis and evaluation	The verb <i>assess</i> demonstrates critical thinking by justifying a position, evaluating outcomes, or checking the reliability of a process or information

Section H1.5, subsection H1.5 "Subsea metrology" "subsea positioning error analysis"	Duplicate code	Code H1.5d is assigned TWICE to different topics with no relation in content	The second occurrence should have its own unique code (e.g., H1.5e, which is the convention used solely for this analysis, not an official IHO correction).	First occurrence (retains H1.5d): "Subsea Metrology", Level B. Learning outcome: "Explain the purpose of subsea metrology. Describe and assess metrology methods using acoustic, optical, LASER, and inertial, including their strengths and limitations." Second occurrence (renamed H1.5e for this analysis): "Subsea positioning error analysis", Level I. Learning outcome: "Compute and interpret the total propagated uncertainty in subsea positioning, accounting for GNSS, time, sound speed and pressure sensors, water density, doppler velocity log, acoustic positioning system, and other observable errors." These are two clearly distinct competencies (what subsea metrology is vs. computing propagated uncertainty in positioning) that should not share a code.
Section B5, subsection B3" "Assessing Weather"	Numbering / Typo error	B.3 "Assessing Weather" incorrect numbering	Should be numbered as B5.3 "Assessing Weather"	Should be numbered as B5.3

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and the IHO Secretariat express their appreciation to Chile for its support and for the corrections provided. With regard to the comments concerning taxonomic levels, it is noted that the consultation process initiated through IHO Circular Letter 48/2025 was conducted from 19 December 2025 to 3 March 2026. Consequently, it is no longer possible to incorporate substantive changes, other than minor editorial corrections, into the editions currently submitted for approval. The IBSC will duly take note of these comments and give them due consideration in a future revision of the S-5A Standard.

MALAYSIA (Vote for adoption = Yes)

General comment:

Malaysia agrees with the adoption of Edition 2.0.0 of IHO Publication S-5A and supports its implementation.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank Malaysia for its support.

NETHERLANDS (Vote for adoption = No)

General comment:

NL thanks IBSC for their hard work on S-5A/B but considers that the current versions cannot be approved without reasonable doubt. Indeed, all stakeholders were invited to comment (IHO CL48/2025), which both certified institutions in NL did. Their contributions were well-formulated and in-depth. IBSC included some of their contributions, but not all and substantial concerns remain. The institutions did not receive a response, explaining why some suggestions were not applied. IHO Secretariat commented that the lack of response was likely due to the high work load of the Board. In order for an updated standard to be authoritative, a feedback step is absolutely necessary. As a matter of principle, the PDCA circle has to be closed for all new editions of standards: a stakeholder check without a corresponding feedback action has significant impact on the acceptance of the result by those stakeholders. Moreover, the lack of clarity prevents the HO from formulating an opinion on the severity of their concerns. Therefore, NL cannot vote in favour of the new standard.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC greatly appreciates the valuable comments received from MIWB (S-5 Cat. A), Skilltrade (S-5 Cat. B), and all other institutions during the consultation process. While the Board had intended to provide individual feedback on the comments received, the high number of contributions, together with the tight timeframe for finalizing the revised Standards and the unprecedented number of programme submissions for recognition at IBSC49, unfortunately did not allow sufficient time for the Board to prepare individual responses during the annual meeting. After the meeting the Board also had to prioritize the fourteen intersessional reviews offered and the urgent revision of the Guidelines to align them with the approved Standards to allow institutions to begin preparing their submissions under the new edition of the Standards.

The IBSC fully regrets this situation and recognizes both the importance of providing detailed feedback and the disappointment that the absence of individual responses may have caused. The Board has already started preparing the requested feedback, which is expected to be available shortly after the urgent revision of the Guidelines is completed.

UNITED KINGDOM (Vote for adoption = No)

General comment:

Selecting 'No' as a default answer, as this is not relevant to UKHO.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank the United Kingdom for its comment but would like to emphasize that the approval process is intended to reflect the collective support of the Members for the revised publication, rather than only the interests of Member States with programmes directly affected by the Standard.

URUGUAY (Vote for adoption = Yes)

General comment:

SOHMA Uruguay supports the adoption of this Edition.

Comments by the IBSC Chair and IHO Secretariat:

The IBSC Chair and IHO Secretariat thank SOHMA Uruguay for its support.

MALAYSIA (Vote for adoption = Yes)

General comment:

Malaysia agrees with the adoption of Edition 2.0.0 of IHO Publication S-5A and supports its implementation.

Comments by the IBSC Chair and IHO Secretariat:

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Comments by the IBSC Chair and IHO Secretariat:

The IBSC greatly appreciates the valuable comments received from MIWB (S-5 Cat. A), Skilltrade (S-5 Cat. B), and all other institutions during the consultation process. While the Board had intended to provide individual feedback on the comments received, the high number of contributions, together with the tight timeframe for finalizing the revised Standards and the unprecedented number of programme submissions for recognition at IBSC49, unfortunately did not allow sufficient time for the Board to prepare individual responses during the annual meeting. After the meeting,

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