



IHO File No S3/8151/HSSC

CIRCULAR LETTER 36/2023
31 October 2023

**ADOPTION OF EDITION 5.1.0 OF IHO PUBLICATION S-100
UNIVERSAL HYDROGRAPHIC DATA MODEL**

Reference:

- A. IHO CL 23/2023 dated 20 July – *Call for Approval of Edition 5.1.0 of IHO Publication S-100 – Universal Hydrographic Data Model.*
- B. Decisions and Actions of HSSC15 (June 2023).

Dear Hydrographer,

1. Reference A proposed the adoption of Edition 5.1.0 of IHO Publication S-100 – *Universal Hydrographic Data Model* – as recommended by the IHO S-100 Working Group (S-100WG); and endorsed by the IHO Hydrographic Services and Standards Committee (HSSC).
2. The Secretariat of the IHO thanks the 37 Member States that replied to Reference A: Argentina, Australia, Bangladesh, Belgium, Brazil, Canada, Chile, Colombia, Cyprus, Cuba, Denmark, Egypt, Estonia, Fiji, Finland, France, Greece, India, Indonesia, Iran (Islamic Republic of), Ireland, Latvia, Malaysia, Mexico, Netherlands, New Zealand, Nigeria, Oman, Poland, Republic of Korea, Singapore, Slovenia, Sri Lanka, Sweden, Thailand, United Kingdom and the United States of America.
3. All 37 Member States supported the adoption of Edition 5.1.0 of S-100, with three Member States providing comments in addition to their support. These comments and the outcome of their review by the S-100WG Chair and IHO Secretariat are provided in Annex A to this Circular Letter.
4. When the Reference was issued, there were 98 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 32. As a result the proposed Edition 5.1.0 of S-100 has been adopted.
5. Edition 5.1.0 of IHO Publication S-100 (*English version only*) is available on the IHO website > Publications > Standards and Specifications (<https://iho.int/en/standards-and-specifications>).

Yours sincerely,
On behalf of the Secretary-General

John Nyberg
Director

Annex A: Member States' responses to IHO CL 23/2023 and comments from the S-100WG Chair and IHO Secretariat

**MEMBER STATES' RESPONSES TO IHO CL 23/2023 AND COMMENTS
FROM THE S-100WG CHAIR and IHO SECRETARIAT**

DENMARK (Vote = YES)

1) Part 1-4.9 Relationships and associations: Suggest removing terms Refinement and Realization in relation to Part 1, Figure 1-9 and corresponding text, as they do not agree.

2) Part 17-4.2 S-100 Exchange Set Folder Structure: Suggest inserting 'If used, all associated ISOMetadataFile must follow MD_<data file base name>.XML file naming convention.' in place of the final three sentences of point 5.

Comments by the S-100WG Chair and IHO Secretariat:

The S-100WG Chair and IHO Secretariat thank Denmark for their technical feedback in regard to S-100 Parts 1 and 17. The changes as suggested by Denmark, which are editorial and provide consistency within the text of S-100, have been included in the finalised S-100 Edition 5.1.0.

THAILAND (Vote = YES)

[Several suggested corrections for document arrangement, identified as inconsistencies between the draft S-100 Edition 5.1.0 and the summary of changes included in the "Change Proposals Summary" document, were provided by Thailand in a separate document.]

Comments by the S-100WG Chair and IHO Secretariat:

The S-100WG Chair and IHO Secretariat thank Thailand for their observations in regard to inconsistencies between the draft S-100 Edition 5.1.0 and the summary of changes included in the "Change Proposals Summary" document. The S-100WG Chair and IHO Secretariat have confirmed that the changes as included in the draft S-100 Edition 5.1.0 are correct; and the Table of Contents for Part 14 and the "Change Proposals Summary" document have been amended as identified. The revised "Change Proposals Summary" document can be accessed from this [link](#).

UNITED STATES OF AMERICA (Vote = YES)

Clarification on the use of the RVER (record version sub-field) for several records are necessary since otherwise implementers choose illegal values or don't know what to put in. In addition, some encoding rules still have references to attributes, which is not in line with the General Feature Model and not supported by the encoding structure. The text is corrected. The proposed changes do not alter any structure, model, or other resources. (Proposed changes were included in a separate track changed version of S-100 Part 10a, pages 29, 30, 32, 37, 38, 39, 40.)

Comments by the S-100WG Chair and IHO Secretariat:

The S-100WG Chair and IHO Secretariat thank the United States of America for their technical feedback in regard to S-100 Part 10a. After consultation between the S-100WG Chair, IHO Secretariat and ISO/IEC 8211 encoding subject-matter experts, the changes as suggested by the United States of America have been included in the finalised S-100 Edition 5.1.0. For information, the redline version of Part 10a showing the recommended changes as submitted by the United States of America can be accessed from this [link](#).