

TRANSITION COUNCIL
3rd session



10-13 December 2024
Headquarters, France

10 – TECHNICAL ACTIVITIES

10.9 – Digital@Sea

10.9.1 – Digital@Sea conferences

Note by the Secretariat

1. INTRODUCTION

Since the last session of the Council, the Digital@Sea Asia-Pacific Conference and a capacity-building workshop have been held. Further information about the initiative can be found at the Digital@Sea portal: <http://digitalatsea.org/>. This paper updates the Council on the results and plans for the year 2024 and beyond.

2. DIGITAL@SEA ASIA PACIFIC 2024

The Digital@Sea Asia-Pacific Conference 2024 was held from September 10 to 11, 2024, at the SIGNIEL HOTEL in Busan, Republic of Korea. Co-organized by the Korean Ministry of Oceans and Fisheries (MOF) and IALA, among other organizations, this event was part of Korea Maritime Week. The conference highlighted cutting-edge technological advancements poised to revolutionize maritime operations and emphasized the importance of global cooperation in fostering maritime digitalization.

3. PLAN FOR UPCOMING 4 YEARS

The Digital@Sea initiative will continue its influential series of conferences and workshops. The tentative schedule for the upcoming four years includes:

- **2025**
 - Asia Pacific conference scheduled for 3–7 November in Seoul, Korea, to be held during Korea Maritime Week. The event will be organized back-to-back with D@S Capacity Building seminar.
- **2026**
 - D@S Asia Pacific conference in Korea
 - D@S North America conference in the US
- **2027**
 - D@S International conference in Denmark
 - D@S Asia Pacific conference in Korea
- **2028**
 - D@S Asia Pacific conference in Korea
 - D@S North America in Canada

4. THE COUNCIL IS REQUESTED TO

NOTE the information provided in this document.

Annex
Conclusion of the D@S Asia Pacific 2024

Conclusions & Recommendations

CONCLUSIONS

1. Harmonization is underway but not complete. (S-100, API's, MRN, MSW, Etc.)
2. What is most critical is that the chart on board and the chart on shore are harmonized and use the same names for locations, with the same data, especially for depths.
3. S-100 Standards have yet to be finalized, but ECDIS vendors have already started development and testing of new S-100 based products and services.
4. Development of new S-100 services requires joint efforts of multiple Government Agencies both in Canada and the US which complicates their development/testing/implementation and issuance of the required associated rules and regulations. This is further complicated in waterways shared by US and Canada.
5. Gov't Agencies need to plan for transition and delivery of new S-100 based services while continuing delivery of current services ("Dual Fuel") for the foreseeable future for both SOLAS and Non-SOLAS users.
6. Participants preferred fully automatic delivery of S-100 services without end user intervention. Additionally, Government Agencies would like to receive confirmation of receipt/opened of S-100 services by end users.
7. Government Agencies noted the importance of being able to collect data and field observations including weather observations, icing conditions, and marine mammal sightings from mariners.
8. Implementation of new S-100 based services will require update of associated IMO "Model Courses".
9. Authorities and industry will have to articulate the cost and safety benefit to encourage transition and additionally manage the impacts all in the maritime eco system.
10. The delivery of real time information through digital means is a critical component of managing dynamic changes such as changes to speed regulations in marine protected areas. The continued diminishment of natural resources such as protected marine mammals will make these capabilities more and more important in the future.
11. *Internet Protocol (IP) based communications is the most widely available current means of delivering digital services in the bandwidth required.* The use of RESTful API's seems to be a promising way for Gov't Agencies to facilitate delivery of digital products and services to industry and the mariner both directly and indirectly in a way that can then be transferred to mariners ECS/ECDIS over the "last mile".
12. *Administrations should not implement S-100 at the products specification level, but as an overall framework.*
13. There is no IHO identified end date for the production of S-57 based ENC's.

RECOMMENDATIONS

1. Updates to S-100 standards should be published periodically and users should be provided with change notices, Should be a means for pertinent entities to be notified of updates to the standards.
2. Government Agencies should make S-100 service easily and readily available to all users.
3. U.S. and Canada should continue to coordinate effort related to S-100 development and deployment.
4. Renewed emphasis on development of S-128 to provide end user the ability to validate they have the most current version of available products. The preferred implementer is the ECS/ECDIS vendor.
5. Collect end user feedback on tests of automatic delivery of S-100 information to his/her screen.
6. Update IMO Model Courses on consuming S-100 information.
7. Market the benefits of S-100 to Ship Owners/Operators.
8. IMO should consider adoption of a transition and training plan and timeline for the deprecation of S-57.
9. IHO should set an end date for production of S-57 based ENC's IHO.