



IALA COUNCIL

76th session



12-16 December 2022
Rio de Janeiro
Brazil

10 – TECHNICAL ACTIVITIES

10.4 – ENG

10.4.1 – ENG16 summary report

Note by the Secretariat

1. INTRODUCTION

The 16th meeting of the ENG Committee (ENG16) was held from 17 to 28 October 2023, chaired by Simon Millyard and vice-chaired by Michel Cousquer. The Secretary for the meeting was Jaime Alvarez.

The session was attended by 103 registered participants from 27 countries. 30 participants attended for the first time. Working in four working groups, the Committee considered 56 inputs and produced 14 output documents.

The overall status of the committee has been annexed to this document.

2. OUTPUTS

One draft Recommendation has been finalised for the Council approval.

- C76-10.4.2 (ENG16-12.1.1) Revised R0203 Ed2.0 definition of marine signal lights terms and measurement

Two draft Guidelines have been finalised for the Council approval.

- C76-10.4.3 (ENG16-12.2.1) New draft guideline on radar reflectors on marine aids to navigation
- C76-10.4.4 (ENG16-12.2.2) New draft guideline on AtoN equipment and structures exposed to extreme environmental conditions

One draft product specification has been finalised for the Council to note.

- C76-10.7.1.1 (ENG16-12.3.3) S-245 Ed1.0 eLoran ASF data Product Specification

3. IALA PAPER SUBMISSION TO OTHER ORGANISATIONS

The following liaison note was prepared for the Council approval:

- C76-12.3.2 (ENG16-12.3.1) Liaison to IMO ITU EG on Development of the draft IMO position on World Radiocommunication Conference 2023 (WRC-23) Agenda item 10
- C76-12.1.1 (ENG16-12.3.2) Liaison note to RTCM SC104
- C76-12.2.6 (ENG16-12.3.4) Liaison note to IMO MSC on Proposal for a new output minimum performance standard for dual frequency multi-constellation SBAS



4. LIGHTHOUSE OF THE YEAR 2022

As regards the lighthouse of the year 2023, ENG shortlisted the following 3 nominations;

- Cap Spartel Lighthouse, Morocco
- Lizard Lighthouse, England
- Kõpu Lighthouse, Estonia

And, ENG commend Homigot Lighthouse to IALA Council as the lighthouse it considers should be IALA Heritage Lighthouse of the Year 2022. Please refer to C76- 14.6.1 Heritage lighthouse of the year 2023.

5. THE COUNCIL IS REQUESTED TO

NOTE the information provided in this document.



Annex - Overall status of the ENG Committee 2018-2023 Work Programme after ENG16:

Task		WG	Start Session	Planned End Session	Revised End Session	Progress Indicator			Status Overview
						Green	Yellow	Red	
Standard 1010 – AtoN planning and service requirements									
1.1.1	Revised guidance on Simulation Technology to revise G1097 in cooperation with ARM task 1.2.4	2	8	14					This task is continued by ARM
1.2.1	Develop Guidance on checking that 3rd party AtoN providers are providing what they are obliged to provide– 3rd party AtoN provider quality control. (Joint ARM cooperation)	2	9	14	15				Completed
Standard 1020 – AtoN Design and delivery									
2.1.1	Review and update V-119 on the Implementation of Vessel Traffic Services (R0119) (Output to be a revised Recommendation and associated Guideline),(includes task 1.1.3)	1	8	12					Both for approval to Council
2.1.2	Develop Guideline on Port Traffic Signals	1	11	14					Likely to be next work plan
2.1.3	Develop E-112 Leading Lights and 1023 Leading Lines into a Guideline	1	9	14					Likely to be next work plan
2.1.4	Complete Guideline 1061 Illumination of structures	1	10	14					Likely to be next work plan
2.1.5	Update Guideline 1048 LED technologies and their use in signal lights	1	10	14					Next work plan
2.1.6	Review & update guideline 1043 on Light sources Note: The old task in the 2014-2018 work period was Merge and update Guideline 1043 On Light Sources and Guideline 1048 on LED Technologies and Guideline 1049 on the Use of Modern Light Sources in Traditional Lighthouses (Task 5.1.9). Should this old task replace 2.1.5 and 2.1.6 as Task 2.1.5?	1	10	14					
2.1.7	Develop a guideline for E-106 Retroreflective materials	1	8	9					Completed
2.2.1	Develop E200-3 on light measurement into a Guideline	1	11	14					Likely to be next work plan
2.2.2	Develop new recommendation on marine light Terms of Measurement	1	12	14					Completed
2.2.3	Develop E200-5 on Optical Performance into a Guideline	1	12	14					
2.2.4	Revise Guideline on effective intensity	1	9	11					Completed
2.2.5	Develop Guidance on monitoring of function and degradation of AtoN light sources	1	9	14					
2.2.6	Develop Guidance on service factor	1							



Task	WG	Start Session	Planned End Session	Revised End Session	Progress Indicator			Status Overview
					Green	Yellow	Red	
2.2.7	1	10	14					Completed
2.2.8	1	8	10					Completed
2.2.9	1	9	14					Next work plan
2.3.1	2/1	10	16					Approved in ENG16 and will be submitted to the Council
2.3.2	2	8	12					Completed
2.3.3	2	8	14	16				Cancelled
2.3.4	2	8	10					Completed
2.3.5	2	8	12	14				Completed
2.3.6	2	14	14					Completed
2.4.1	2	10	14	16				Completed
2.4.2	1	11	13	14				Next work plan
2.4.3	2	8	14					
2.5.1	2	8	13	16				merged with 2.5.3, run over into the new work period
2.5.2	2	8	13	16				Approved in ENG16 and will be submitted to the Council
2.5.3	2	8	13	14				merged in 2.5.1
2.6.1	2	10	14					Next work plan



Task		WG	Start Session	Planned End Session	Revised End Session	Progress Indicator			Status Overview
						Green	Yellow	Red	
2.6.2	Monitor Climate Change to inform IALA of impact and potential adaptation requirements for AtoN providers	2	8	14					
2.6.3	1.1.1. IALA Heritage website: - Establish a World Heritage Lighthouse Cyber Centre, accessible via the IALA website. - Establish a database on World Heritage Lighthouses.	4	8	14					
2.6.4	Establish a concept for nominating one lighthouse as World Heritage Lighthouse of the year for each 'World AtoN Day'.	4	8	14					
2.6.5	Deliver Heritage Workshop	4	8	11	14				
2.7.1	Revise Recommendation R1004 to reference the UN Sustainable Development Goals	2	8	10	14				Completed
Standard 1030 – Radionavigation services									
3.1.1	Resilient PNT (applicable to all technical domains) – (identification, potential impact and mitigations)	3	8	11	16				Next work plan
3.2.1	Terrestrial radionavigation systems	3	10	12					Completed
3.2.2	R-Mode (MF)	3	10	14	16				Next work plan
3.2.3	R-Mode (AIS/VDES)	3	10	14					Task closed – VDES GL moved to ENAV
3.2.4	Workshop on R-Mode in 2019	3	9	10					Completed
3.2.5	Develop and maintain relevant Product Specifications eg. S-245 eLoran ASF data, S-246 eLoran transmitting station alamanc, S-247 Differential Loran reference station etc.	3	10	14	16				Completed and following activities in next work plan
3.2.6	Guidance on timing and synchronisation	3	8	14	-				Run over into the new work period
3.2.7	eRacon (standard approach) ; Review recommendations ENAV146 & R-101 & Guideline 1010	3	11	14	16				New Guideline produced as output of ENG15. Review of documents to run over into the new work period
3.3.1	Consideration of how and when to use SBAS in maritime.	3	9	13					Completed
3.4.2	Review existing DGNSS infrastructure and provide guidance for current system	3	10	12	14	16			Next work plan
3.4.3	New Recommendation on augmentation for maritime use	3	8	10	13				Completed



Task		WG	Start Session	Planned End Session	Revised End Session	Progress Indicator			Status Overview
						Green	Yellow	Red	
3.4.4	Provide guidance, strategy and advice on potential new uses of marine beacon DGNSS infrastructure	3	9	11					Item merged with 3.4.2
3.4.5	High accuracy systems	3	10	14	15				Completed in ENG15, following next work plan
3.5.1	Review and update current documentation under the preview of PNT WG	3	8	14	16				
3.5.2	Monitor developments in GNSS, DGNSS, radar, resilient PNT, e-Pelorus, terrestrial systems, R-Mode, inertial and any other relevant areas etc.	3	8	14	16				
3.6.1	Update to ITU M.823, potential replacement for A.915, Liaison with IMO, ITU, RTCM, etc on related topics and project areas.	3	8	14	16				
3.7.1	Input to MSP, Integrity considerations for resilient PNT, cybersecurity impact for PNT data, DATUM considerations	3	10	14	16				
Standard 1050 Training and Certification									
4.1.1	Development and review of WWA courses	1,2,3	8	14					
4.2.1	Navguide updates and review	VC	9	14					
Standard 1060 – Digital communication technologies									
5.1.1	Review telemetry Guideline 1008	2	10	14					Next work plan
5.1.2	Review of engineering support for e-navigation services, (including hot/cold climates & radio propagation). TO BE CONFIRMED	3	8	14	16				

Legend:

Green – progress as planned

Yellow – task needs more time, target time prolonged

Red – very little progress on the task, target time prolonged

Grey – task completed / deleted

Blank – task not started