

**15th MEETING OF THE IHO INTER-REGIONAL COORDINATING COMMITTEE
IHO-IRCC15**

Tokyo, Japan, 12-14 June 2023

Report of the Word-Wide Navigational Warning Service Sub-Committee (WWNWS-SC)

Submitted by:	Chair, World-Wide Navigational Warning Service
Related Documents:	Joint IMO/IHO/WMO Manual on Maritime Safety Information (IHO Publication S-53)
Related Projects:	S-124 development Project Team, Enhanced Group Call API Correspondence Group

Chair:	Mr. Christopher Janus, USA
Vice-Chair:	Mr. Trond Ski, Norway
Secretary:	Mr. Sam Harper, IHO
Member States:	Argentina, Australia, Brazil, Canada, Chile, China, Colombia, Cyprus, Ecuador, Egypt, France, Germany, Greece, India, IR of Iran, Italy, Japan, Malta, New Zealand, Norway, Oman, Pakistan, Peru, Russian Federation, South Africa, Spain, Sweden, Turkey, UK, USA
Members:	IMO, WMO, IOC, IMSO
Expert Contributors:	Inmarsat, SONSAT, CIRM, Iridium

1. Meetings Held During Reporting Period

1. The Joint meeting between the World Meteorological Organization (WMO) Advisory Group on the Worldwide Met-Ocean Information and Warning Service (WWMIWS) Sub-Committee (AG-WWMIWS-SubC) and the International Hydrographic Organization (IHO) World-Wide Navigational Warning Service Sub-Committee (WWNWS) was held on 12 to 16 September 2022 at WMO Headquarters, Geneva, Switzerland. This meeting brought together the METAREA and NAVAREA communities with 80 participants, mostly in person. Representatives from the International Maritime Organization (IMO), International Mobile Satellite Organization (IMSO) and Satellite Communication companies attended as well. The joint session was chaired by Ms. Justyna Wodziczko (Vice-Chair AG-WWMIWS-SubC, Norway) and Mr. Christopher Janus (Chair WWNWS, United States). The IHO Secretariat was represented by Assistant Director Sam Harper

During the joint sessions of the meeting, various areas of mutual interest to NAVAREA and METAREA communities were discussed. Key outputs included:

- Improved understanding of roles and responsibilities, particularly towards providing services and assistance to coastal states within their own MET/NAV Area;
- Consideration of the need to have contingency plans and awareness of METAREA and NAVAREA working together in country, and as well, working with neighbouring ones;
- Progress the revision of the Joint IMO/IHO/WMO Manual on Maritime Safety Information;
- Focus on emergency response responsibilities (e.g. in response to volcanic hazards) in light of the multiple hazards that ships at sea can face on a voyage;

- Identified gaps and need for establishing the framework for the recognition and operational implementation of future services in the Global Maritime Distress and Safety System (GMDSS) for the provision of maritime safety information (MSI).

WWNWS Documentation

The work of the 20th and 21st meetings of the Document Review Working Group (DRWG) was reviewed in conjunction with the outcomes of the 9th session of the IMO Sub-Committee on Navigation, Communications and Search and Rescue (NCSR 9) and how they directly impacted the documents and manuals under the responsibility of the WWNWS-SC. The focused on revisions to MSC.468 1010, MSC.469 101, MSC.470 101 and MSC1 Cric1645. A particular area requiring significant effort was the presence of duplicate terms and definitions across multiple documents, as IMO has made clear that due consideration of consequential changes must be made when submitting documents for approval.

All draft documents under development by the Sub-Committee are available via the WWNWS page of the IHO web site. Member States are encouraged to review the documents and submit comments to the Chair (Mr Christopher Janus, e-mail: IHO_WWNWS_Chair@nga.mil) and the IHO Secretariat (Assistant Director Samuel Harper, e-mail: adso@iho.int).

GMDSS / MSI Briefing

The Sub-Committee received Maritime Safety Information (MSI) self-assessment reports from 19 NAVAREAs, the Baltic Sea Sub-Area and a national report from China. A recurring theme was the status of implementation of the Iridium SafetyCast System, which a number of NAVAREAs are still working towards. It was noted that a key outcome of MSC105 was that the use of all Recognised Mobile Satellite Services (RMSS) is now mandatory. The IMO made it clear that if any member state was experiencing issues with the implementation of SafetyCast, regardless of the nature of the issue, they should contact the IMO to discuss what support could be provided. The difficulties with the difficulties with promulgating information related to space MSI, particularly with interpreting unfamiliar formats from a range of sources was noted. They undertook to form a Space Activity Working Group to collaborate further on this.

The IMO provided a brief overview of the IMO Global Integrated Shipping Information System (GISIS) GMDSS Master Plan, focusing on Annexes 7 & 8. It was noted that it is an IMO Member State (MS) decision to consolidate information digitally, and the GISIS was the implementation of this decision. Further, participants were reminded of the obligations resulting from signing the International Convention for the Safety of Life at Sea (SOLAS convention) and the including the sharing of information on the structures and systems established to fulfil these obligations, which included keeping the information up to date

Briefings on the activities of the IMO NAVTEX and the IMO Enhanced Group Call (EGC) Coordinating panels were provided by their respective chairs as well as developments in the provision of mobile satellite GMDSS services from Inmarsat and Iridium

The IMO EGC Coordinating Panel Chair provided a comprehensive presentation report on the activities of the Panel, including details of the report to NCSR 9 and items requested to be addressed by NCSR 8, with details of ongoing activities.

MSI Capacity Building

The sessions considered progress reports on the delivery of MSI training courses, and discussed the processes for reporting the status of MSI provision at Regional Hydrographic Commission meetings and methods for identifying to the Capacity Building Sub-Committee the regions and coastal States most in need of training and assistance.

The following charts detail WWNWS support from three perspectives: NAVAREA Warnings issued, coastal state support, and an estimate of Inmarsat EGC data usage and its implications.

Figure 1 details the number of individual NAVAREA warnings broadcast annually by the WWNWS. While the total number declined in 2020 and 2021, the trend remains on an increasing trajectory.

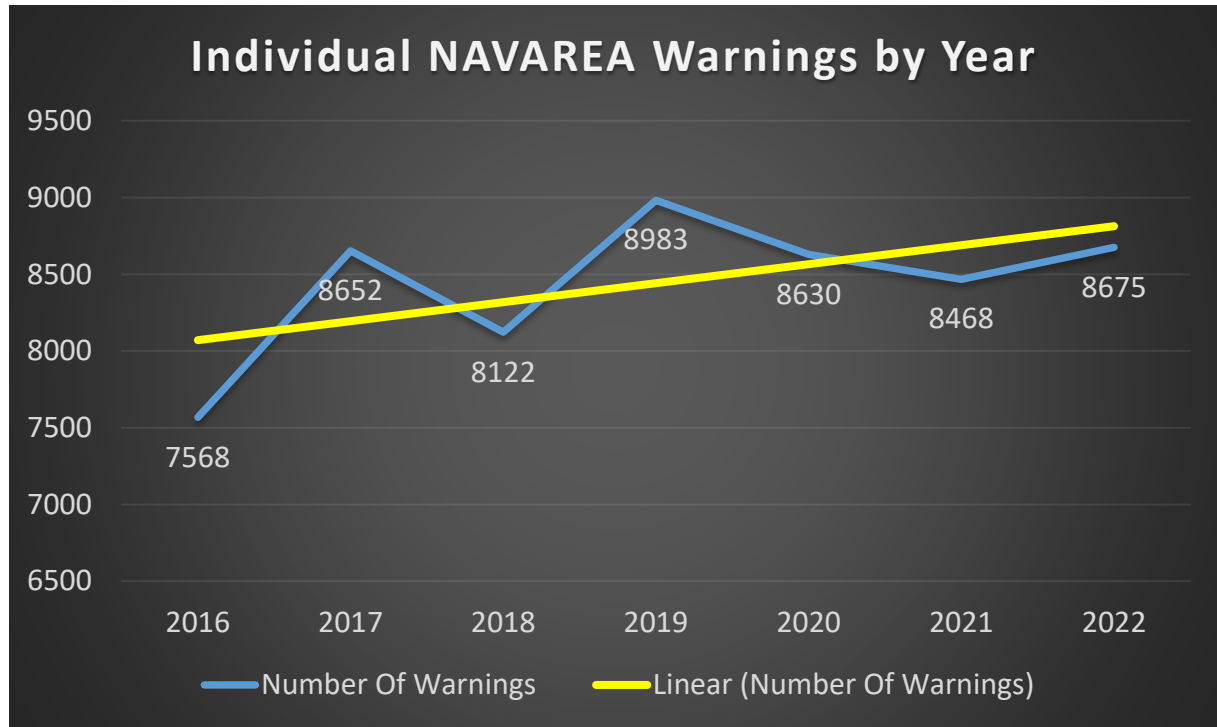


Figure 1 Number of NAVAREA Warnings

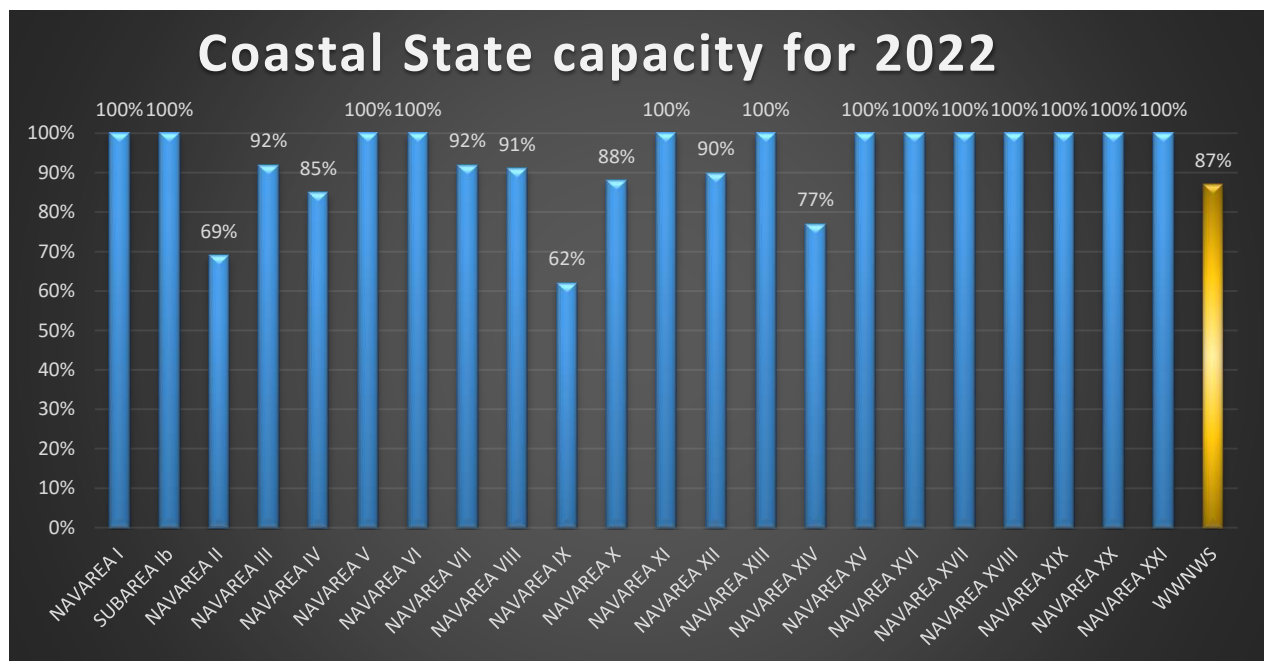


Figure 2 Percentage of Coastal States that are capable to provide marine safety (SPI 3.1.1)

The chart in Figure 2 details the percentage of Coastal States that are capable to provide maritime safety information (MSI). The definition the WNWNS uses to assess Coastal State support includes “regular communication” in addition to providing MSI; regular communication is defined as once per year. The data used to compile those metrics came from the NAVAREA self-assessment reports submitted to WNWNS14. Note that Brazil, (NAVAREA V), Chile (NAVAREA XV), Peru (NAVAREA XVI), the Russian Federation (NAVAREAs XIII, XX, and XXI), and Canada (NAVAREAs XVII, XVIII) are the only coastal state in their NAVAREA.

At the 21st meeting of the IHO WNWNS Document Review Working Group (DRWG) there was a concern expressed with the current methodology to determine if a NAVAREA Coordinator and Coastal State met the IHO’s strategic performance indicator for the WNWNS, SPI 3.1.1. The SPI might need to be adjusted to provide metrics that represent MSI capacity both from “having the capability” and, in addition, “providing MSI (or in the future, S-124) to the NAVAREA Coordinator”. The resultant action was to review the Self Assessment proforma at WNWNS15 and amend it as required to accurately and realistically represent Coastal State support.

Overall, for 2022, the WNWNS assessed MSI Coastal States capacity to be 87%

Figure 3 provides a representation of EGC broadcast data from 11 NAVAREA Coordinators that use Inmarsat’s SafetyNET II service. The data for NAVAREAs XIV (New Zealand) and XV (Chile) includes EGC coastal warnings. All NAVAREA data includes repeated broadcasts. The data on the following chart is an estimate based on actual data from those 11 NAVAREAs.

There were several conclusions drawn from the data. The first was that the number of individual navigational warnings issued does not directly translate into a higher OR lower annual cost for a NAVAREA. Likewise, the number of broadcasts, including repetitions, does not directly

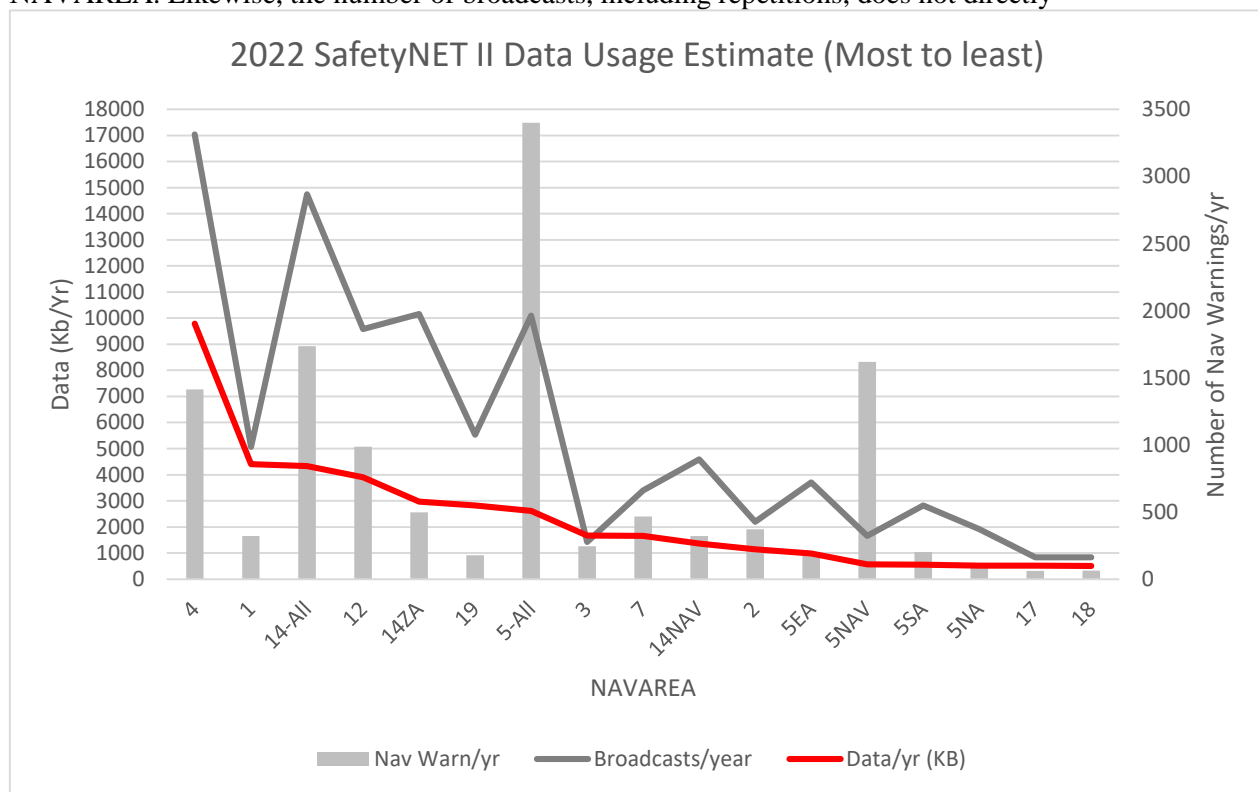


Figure 3 SafetyNET II Usage estimate for 2022

indicate a higher OR lower annual cost. All factors must be considered together: number of navigational warnings, number of broadcasts and the size of each message in bytes. Based on that approach, NAVAREAs I, IV, V would likely have had the highest SafetyNET EGC broadcast costs for 2022.

SafetyNET II allows each information provider to download usage data and accurately determine and forecast its annual costs and data usage. While this is important for cost, it can also be a representative indicator for planning how to support S-124 and its data requirements.

2. Progress on IRCC Action Items

S-124

The S-124 PT sought permission from WWNWS14 to submit S-124 Ed.1.0.0 to HSSC15 which was duly granted.

3. Problems Encountered

Nil

4. Any Other Items of Note

Nil

5. Conclusions and Recommended Actions

See paragraph 3.

6. Justification and Impacts

N/A.

7. Action Required of IRCC

The IRCC is invited to:

- a. **Note** the information provided in this report on the outcomes of WWNWS14;
- b. **Approve** S-124 Ed 1.0.0 for submission to MS for endorsement.
- b. **Encourage** relevant Member States to report to the IMO Secretariat and the Chair of the EGC Coordinating Panel on the progress and status of implementation of newly recognized mobile satellite services by MSI providers;
- c. **Note** that MSI providers, should they implement Iridium SafetyCast services, are compelled to bear the burden of all additional costs, as a consequence of the approval by IMO Member States of the Iridium SafetyCast as an RMSS; and
- d. **Take** any other action it considers appropriate.