Minutes of the meeting

1st Meeting of the Pilot Project for the Facilitation of Ship to Shore Reporting

Held in Lisbon on

03 April 2019

Date: 16 April 2019

EMSA

1. Background

The meeting was opened and chaired by Mr Lazaros Aichmalotidis, Head of Unit for Vessel and Port Reporting. Mr Jacob Terling from Unit D2 Maritime Safety represented the **European Commission** (DG MOVE).

Delegations from **Belgium**, **Croatia**, **Denmark**, **Estonia**, **France**, **Germany**, **Italy, Norway**, **Poland**, **Romania and Sweden** attended the meeting.

All meeting documentation is available at: http://emsa.europa.eu/ssn-main/documents/workshop-presentations-a-reports/item/3514-1st-meeting-of-the-pilot-project-for-the-facilitation-of-ship-to-shore-reporting.html

The meeting agenda is attached in Annex 1.

2. Objective of the meeting

The objective of the meeting was to:

- present the scope of the project and the expected deliverables;
- present the working methodology and timeline of the project;
- obtain feedback from the project participants on the proposed use cases and collect new ideas aiming at simplifying ship to shore reporting, and;
- discuss and answer any outstanding questions from the project participants.

3. Meeting outcome

3.1 Introduction

The chairman welcomed the participants and recalled that this pilot project has been established under the project for the promotion of interoperability between industry and competent authorities in the European Maritime Single Window (EMSW) environment under the CISE Process (so called "Interoperability Project"). He mentioned that, in November 2018, EMSA sent an invitation letter to directors of maritime administrations of the EU Member States and of EEA Countries suggesting their participation in a pilot project for the facilitation of ship-to-shore reporting, and that there had been 14 positive replies.

He informed the participants that the pilot project aims to develop and test solutions to facilitate ship-to-shore reporting procedures and improve coastal stations' situation awareness. He highlighted that the VTS topic, although mentioned in the VTMIS Directive, had been put aside due to high workload on reporting formalities, so the work of this group would be a good opportunity to put VTS back in the picture.

3.2 Introduction to the project and approval of the agenda

EMSA reminded the participants that the work of the group is carried out under the Interoperability Project, and that the grant agreement for this project was signed by EMSA with DG MARE on 18 September 2018. The project is financed by the European Maritime and Fisheries Fund, with a duration of 3 years and a budget of 3M€. The general objectives of the Interoperability Project are to:

- enable more efficient data exchange regarding port documentation between authorities using SafeSeaNet including cargo information;
- enhance connectivity between authorities and end-users in the different Member States;
- develop an EMSW environment demonstrator, including harmonised NSW interfaces, and;
- improve information exchange on ship-to-shore using VHF Data Exchange-satellite (VDE-SAT) communications by setting up a data processing capability.

The objective of the pilot project on "Facilitation of ship- to-shore reporting" is to test technical solutions to re-use information that is already available in the SSN Ecosystem in order to minimise the reporting burden for Mandatory Reporting Systems (MRS) and Vessel Traffic Services (VTS). This is done by combining and re-using existing data and improving coastal stations' awareness in their areas of control.

The agenda for the meeting was **agreed** by the project participants.

3.3 Current status of MRSs and VTSs in EU

EMSA presented the differences between MRSs and VTSs. Currently, there are 16 IMO adopted MRSs in EU waters, and 15 of them share MRS data via the SSN system. This corresponds to around 45.000 reports per month (data from February 2019). Regarding the VTSs, there are 140 organisations registered in the European Shore-based Traffic Monitoring Infrastructure Database (STMID) with VTS function.

The MRS data exchanged in SSN is of high importance because it is the only source of information on dangerous and polluting goods carried by ships that are transiting EU waters (but not calling at EU ports). In addition, it provides early notice to ports of call about ships' arrival, with this source considered very reliable as it is provided directly from the ship.

EMSA has also shown that, despite being a remarkable source of information, MRS data is being used very little. In February 2019, only 6 requests for MRS details were recorded in SSN. Data is not re-used between different MRSs or VTSs, and ships are obliged to report the same date more than once on their voyages. As an example, EMSA showed attendees the voyage of a tanker between Alexandria (Egypt) and Gdansk (Poland). Throughout the 8 days voyage, the ship had to report to 9 MRS centres. Most of the required data was the same and could be re-used. There is untapped potential to simplify the reporting work of both ship and coastal station operators.

Croatia stated that it is important to re-use data, not only from MRS reports, but also from National Single Window (NSW) systems, since the NSW is often the first point of reporting.

Poland commented that the concept is very good, but that in some areas, national legislation requires information to be reported even though it is already available in SSN. **COM** replied that the new Regulation for the European Maritime Single Window (EMSW) should help to address this type of issue. **Denmark** stated that, even if it is possible to re-use data from a legal point of view, there are still technical obstacles (e.g. usability and reliability of data) which should be addressed.

3.4 Pilot project organisation

EMSA presented the expected deliverables for the pilot project as follows:

    a. Define a harmonised Integrated Ship Report (ISR) which covers the needs of MRS and VTS authorities.
    b. Develop the technical solution to build the ISR.
    c. Develop a solution for preparing and distributing the ISR using the existing SSN Ecosystem.
    d. Test the concept with MRS/VTS authorities.
    e. Investigate possible opportunities for amending existing IMO and EU legal acts for MRS and VTS reporting.

EMSA reminded participants that, should relevant ideas emerge during the execution of the pilot project, they will be assessed and the list of deliverables may be revised.

EMSA will provide the secretariat, and will coordinate, collect and integrate the inputs from the participants into working documents. Member States are expected to be involved in the definition and design of the solutions, in real case testing with coastal stations, and in the evaluation of the outcome of the tests. Most of the work will be carried out by correspondence, but a limited number of meetings will also be held at EMSA or Member States' premises, combined with visits to coastal stations/centres where related activities are taking place.

Four (4) meetings are planned during the project:

    - 3 April 2019 – Kick-off meeting
    - September 2019 – Meeting to agree on the ISR and technical requirements
    - June 2020 – Meeting to prepare the operational tests
    - December 2020 – Meeting to review results of operational tests and final report

EMSA presented the schedule of the pilot project as follows:

- **January - June 2019:** Define the content of the Integrated Ship Report (ISR) and the distribution method.
- **June - September 2019**: Draft the system requirements.
- **December - May 2020:** Develop the technical solution.
- **May - June 2020:** Prepare operational tests with Authorities and Industry and deploy solution to coastal stations.
- **June - July 2020:** Test the concept with Authorities and Industry.
- **July - December 2020:** Assess the test results and produce the project report.

Denmark asked about the project duration, and whether there was any possibility to extend it. **EMSA** responded that this would have to be agreed with the Interoperability project's Steering Committee. The chairman explained that, as the grant is coming from another Directorate General (DG MARE), the Steering Committee includes representative from different DGs (i.e. MOVE, MARE, TAXUD, DIGIT) and EMSA, and every decision on project execution and eventual changes needs to be agreed with this Committee. **Croatia** asked whether the project is linked with the new Regulation on EMSW. **EMSA and COM** replied that there is no link, although the results of the work could be re-used in the future when the technical work on EMSW begins.

3.5 Summary of questionnaire

EMSA presented MS feedback on the questionnaire on the current status of MRSs and VTSs at national level, the re-use of data or simplification of the reporting in place and ideas for future development. Only 4 out 13 MSs which responded to the questionnaire declared that SSN data is re-used to simplify ship-to-shore reporting. The main reasons why data is not re-sued by MSs are summarised below:

- Lack of a push mechanism to provide data reported by previous ports or MRSs.
- Lack of a query mechanism to retrieve data reported in previous ports (e.g. ISPS Pre-arrival).
- SSN system and SSN data is not reliable enough.
- SSN interface is not user friendly and requires many steps to retrieve data.
- Report must come directly from the vessel.
- It is risky to re-use data, because it could change and false information would be propagated.
- Incompatibility in data formats between systems.

Regarding the VTS/MRS question**, EMSA** received the following feedback:

- All MSs are in favour of modernisation and harmonisation.
- No actions should be taken before a revision of the Resolution A.857(20) is completed. Many MSs participate in the IALA VTS working group on updating resolution, and this should be the forum to work on this topic.
- The importance of harmonising the requirements of EU and IMO VTS and SRS procedures was highlighted, as VTS and MRS are international activities and any discrepancy could lead to misinterpretation.
- There were some proposals to update the requirements of Directive 2002/59 in regard to MRS reporting (i.e. simplification, to distinguish EU and non-EU trade).
- Electronic transmission of data should be the future, but direct voice communication is still of very high importance.

The chairman commented that the findings were very useful in enabling the group to better understand the problems and identify solutions.

3.6 Member State experience

Croatia, Denmark, France and **Norway gave** presentations of their systems, developed solutions and ideas for future developments. Some examples were given of the re-use of data, either from National SSN systems (**HR** and **NO**) or between national MRS systems (**FR**). In addition, **DK** and **NO** presented web applications allowing ships to submit MRS reports via the Internet (for BAREP, BELTREP and SOUNDREP systems).

Following the presentations, MSs provided the following comments:

- Data from the SSN Central system is not re-used because it takes too long to retrieve necessary information

- Voice communication is very important to ensure that there is an officer on the bridge, and that the vessel can respond to a coastal station call in case of need, but many reporting obligations can be reduced by reusing information existing in other systems.
- A comprehensive ship report should be used for SAR purposes (**FR**) or for coast guard services (**BE**).

Sweden made a presentation on the Sea Traffic Management (STM) project. The presentation was focused on sharing the voyage plan from ship to shore. There is no need to install extra hardware on board ships, since ECDIS and existing communication systems are used. Although there is no need for hardware, the ECDIS software on board the vessel and the coastal station software ashore need to be upgraded to support the STM service. The communication link must be established using a Maritime Connectivity Platform (MCP) developed and operated for the purpose of the project.

The presentation was followed by a short live demo of STM showing the voyage plans and route plans on an STM demonstration platform. Responding to a question, **EMSA** clarified that SOLAS requires that, before departure from a port, each vessel must have a voyage plan, but that there is no obligation to share it. This is done on voluntary basis. **Sweden** clarified that there are currently around 300 ships participating in the STM project. **EMSA** proposed exploring the possibility of reusing the results of the STM project in order to include the sharing of the voyage plan data in the pilot project.

Belgium informed attendees that, for the WETREP MRS, all reports are sent via e-mail, and there is no voice communication. The operator needs to re-type data from e-mail for the MRS system in order to send it to Central SSN. It would be useful to develop an application which allows ships to provide MRS data to all EU systems.

Estonia proposed to look at the use of AIS Application-Specific Messages. There are some tests on-going in Estonia in order to obtain information on Persons on Board (PoB) and dangerous goods using this method. So far, it was found that only PoB information is transmitted, while other information is not available. **EMSA** responded that this solution is more and more in use, and mentioned the INTENSA project in the Adriatic, which also works on this topic. The display of information transmitted by AIS Application-Specific messages requires external hardware and dedicated software in addition to AIS equipment. To avoid system overload, the number of AIS Application-Specific Messages, and the frequency of transmission, should be limited, and the Very High Frequency (VHF) Data Link (VDL) needs to be monitored.

3.7 Concept of Integrated Ship Report (ISR)

EMSA presented a concept for the Integrated Ship Report (ISR) which aims at integrating data sets from different sources that are already available in the SSN Ecosystem into a report which contains the most updated information on a ship. This report will be built by consolidating information on the ship from SSN Ecosystem, which comprises pre-defined blocks and is configurable by end-users. This should allow users from different domains (MRS, VTS, SAR, etc.) to create a report with the information necessary to perform their duties. The report will use data which is already available in the SafeSeaNet Ecosystem (no additional reporting required). As far as possible, existing services and interfaces will be used, and it will be built progressively in several consecutive phases.

EMSA proposed that the ISR will use data from Ship Tracking Information (T-AIS and S-AIS), Ship database (vessel identifiers) and from the SSN EIS (Pre-arrival, ATA, ATD, Hazmat, Waste, Security, Bunkers, MRS, Incident Report). There will be a tool which will collect and process data from these systems in order to prepare the ship integrated report. The triggers for generating the report have to be defined in the pilot project as well as the distribution mechanism to MS systems.

EMSA presented the content of the first version of the ISR. Furthermore, **EMSA** presented the following triggers for generating and distributing the ISR:

- A vessel enters or leaves a specific area
- Upon request
- Change to ship related data for ships in an area (e.g. Incident Report provided for a vessel which is being monitored, arrival to a port)

End users will decide which of these triggers is used. The detection of entry or leaving to/from a specific area will be done by the Automated Behaviour Monitoring (ABM) system which already exists at EMSA, and is available to Member States.

To request the ISR, the system should offer the system2system option for those who would like to integrate it in their national or local system and web user interface which will be available at central level to all users. **EMSA** presented the following possibilities for receiving the report: system2system interface, web user interface and e-mail.

3.8 Discussion on technical options

EMSA presented the summary of responses to the questionnaire related to future developments in MRS/VTS area. The questionnaire responses showed that there is an interest from most MSs participating in the pilot project in receiving the Integrated Ship Report, and that there are different ideas for re-using this information (e.g. ships coming from EU to simplify reporting, ships in transit, increase of awareness in territorial waters or EEZ). Most MSs would like to use system2system communication for obtaining the report and, based on the feedback, the report should be generated either at the entry to a specific area, or upon request. MSs have also positively replied to operational tests to test technical solutions developed in the project with the comments that these tests and their scope need to be better defined.

Denmark commented that, before starting the discussion on a technical option, the business rules should be defined. Article 5 of Directive 2002/59 specifies that data must come from vessels directly. **EMSA** acknowledged that this is a valid comment, noting that the objective of the project is to test technical solutions which re-use information already available in the SSN Ecosystem in order to minimise the reporting burden for Mandatory Reporting Systems (MRS) and Vessel Traffic Services (VTS) by combining and reusing existing data. Instead of the business rules, EMSA will draft a document describing the business and technical concept and share it with the project participants.

France noted that data confidence is a very important topic, and that the sources of information need to be well defined. Data sources already give an indication of whether data is reliable. **EMSA** replied that the report will be updated to clearly show sources of information (e.g. ship, NSW, etc.).

Croatia stated that it is interested in this solution, as the ISR contains information which is currently not available in its National SSN system for ships in transit. They will use a system2system solution to integrate this information in the national system, as they do not want to add a new external system and an additional burden for operators.

Belgium added that it would be interested in alternative methods for ship-to-shore reporting (e.g. on board application). Currently, information comes via e-mail, which is not easy for re-use, and creates an extra workload for operators.

Germany commented that it sees use cases when this solution could be used at the national level. Responding to a question on access rights, **EMSA** clarified that all access rights will be respected as defined in the IFCD document.

Poland stated that it would like to use this solution for requesting information on ships arriving at its anchorages for shelter and for ships in transit. They stated that data quality is a major concern, and that the source and also the time when data is reported needs to be included in the ISR. **EMSA** took note of these suggestions and will update the report accordingly.

Norway commented that the EMSA proposal is very interesting and stressed the importance of increasing the overall usability of the systems. **EMSA** responded that the data integrated in the ISR comes from MSs, and that the Agency will continue to work with MSs on quality issues.

Denmark proposed that the reporting tool should possibly also be made available to ships in order that they can carry out their obligations. **EMSA** noted that giving access to ship masters is a very interesting idea that deserves consideration, and that this may evolve in technical implementations at a later stage of the project.

Romania asked EMSA about the business rules that would be used for the on-board application. **EMSA** replied that is too early to say, but that the rules would be similar to those which already exist in SSN or NSW.

Responding to a question on exempted vessels, **EMSA** acknowledged that exemptions need to be included in the ISR.

The group approved the content of a first version of the ISR, taking into account the above feedback, the triggers and the distribution mechanism proposed by EMSA.

4. Follow up actions

The chairman thanked all participants for their active participation, and commented that the meeting was very useful in defining the further work of the group. The participants agreed on the following actions:

    a. EMSA will provide attendees with copies of the meeting presentations and the responses to the questionnaire received from the project participants.

    b. Taking into account the feedback received during the meeting, EMSA will draft a document defining the business and technical concept and distribute it to the project participants.

    c. With respect to further developments, EMSA will investigate how to: establish ship-to-shore communications in order to provide the possibility for ships to report to MRS/VTS by electronic means, and; integrate the results of the STM project into the pilot project.

    d. The next meeting is planned for September 2019, when the technical requirements will be presented. The group will work by correspondence in the interim.

Annex 1 – Meeting Agenda

Time	Agenda Item	Speakers
09:00 – 09:30	Registration	
09:30 – 09:45	Welcome and approval of the agenda	EMSA
09:45 – 10:20	Current status of MRSs and VTSs in EU Finding of MSS survey	EMSA
10:20 – 10:45	Working methodology (expected deliverables and planning)	EMSA
10:45 – 11:15	Summary of questionnaire	EMSA
11:15 – 11:30	Coffee break	
11:30 – 13:00	Discussion on different use cases and Member States experiences.	Presentations from: Croatia, Denmark, France, Norway and Sweden
13.00 – 14.00	Lunch break	
14:00 – 15:00	Concept of Integrated Ship Report (ISR) Means of communication (S2S, email web user interface)	EMSA
15:00 – 15:30	Discussion on technical options (content of ISR, distribution mechanism, triggering mechanism)	All
15:30 – 15:45	Coffee break	
15:45 – 16:30	Discussion on technical options (content of ISR, distribution mechanism, triggering mechanism) (continues)	All
16:30 – 17:00	Discussion and summary of the follow up actions	EMSA