

# Meeting: 3<sup>rd</sup> SSN / LRIT Group Meeting

Place and date: Lisbon, 30 May 2018

Agenda item: SSN and LRIT Data Quality Report

Document number: SSN/LRIT 3.5.1

### Submitted by EMSA

# Summary Action to be taken Related documents

This document presents:

- SSN implementation at national level and the related data quality issues, including the interface with THETIS.
- LRIT services performance and use of the system, including the IMSO annual audit results.

### As per paragraph 11.

- a. 2<sup>nd</sup> SSN/LRIT Group Meeting Report
- b. SSN/LRIT 1.4.1 SSN and LRIT Roadmap
- c. SSN/LRIT 2.5.1 SSN and LRIT Data Quality Report
- d. SSN/LRIT 3.4.3 SSN LOCODEs Guidelines update

### 1. INTRODUCTION m

The purpose of the SSN and LRIT Data Quality Report is to present the status of SSN implementation at national level and the related data quality issues, including the interface with THETIS. The report includes figures which can be used to analyse overall SSN performance and the particular behaviour of each national SSN system, and focuses on issues to be resolved. The report also presents the status of LRIT applications maintained by EMSA.

# 2. SSN IMPLEMENTATION

SSN version 3.5 was deployed on 6 December 2017. This version included the changes approved at the SSN / LRIT Group Meeting 1 ("SSN/LRIT 1.4.1 – SSN and LRIT Roadmap"):

- Improvements to the Central Organisation Database and Central Ship Database.
- A new SSN web user interface layout.
- Integration of SSN with the new Central Location Database.
- Improvements relating to the new SSN Ecosystem Graphical Interface.

In December 2017, SSN NCAs were granted access to the Central Location Database (CLD) and the user manual was made available via the EMSA webpage. On 23 January 2018, the most recent list of UNECE LOCODEs (i.e. version 2017-2, released on 21 December 2017) was uploaded in the CLD. SSN LOCODEs guidelines were updated and submitted for approval ("SSN/LRIT 3.4.3 – SSN LOCODEs Guidelines update").

The status of SSN implementation and notifications activity for each MS is shown in Annex I. Table 1 shows the implementation status by MS report summary, and table 2 shows the number of notifications by MS and by type of notification.

Since the last reporting period, Greece decommissioned PortPlus notifications in V2 format and Malta resolved its problems with the request/response mechanism and the provision of ATA and ATD. Portugal is not yet commissioned for the SSN V.3 format, and Greece and the United Kingdom (for the port of Gibraltar) have not yet implemented Waste and Security notifications.

The implementation status by notification type is described in the following sections:

### 2.1 PortPlus notifications

PortPlus notifications are widely reported by all MSs. However, some need to amend their implementation and/or operational procedures in the following areas:

- The percentage of missing Port information from Finland, Germany, Greece, Norway and the United Kingdom is very high (more than 2%, see Table 9).
- The percentage of missing Hazmat information from Denmark, France, Germany, Italy, Malta, Spain, Sweden and the United Kingdom is very high (more than 6%, see Table 10).
- Waste and Security notifications were not provided for 41% and 27% of ship calls respectively (see Table 1).
- The lack of availability of the detailed part of notifications (see Section 5.3) is still an issue for some MSs (i.e. Portugal and the United Kingdom system for the port of Gibraltar).
- Rejections are still an issue for some MSs (see Section 5.4), with over 1% of PortPlus notifications being rejected (Finland, Germany, the Netherlands, Portugal and Spain).
- Denmark, Finland, France, Greece, Portugal and the United Kingdom do not always provide the
  mandatory "PreArrival24HoursNotificationDetails" element (which includes POB information), and/or they
  use the "unknown" value (99999) to identify POB for a significant number of ship calls.
- Bulgaria, France, Malta, the Netherlands, Portugal, Sweden and the United Kingdom (mainly the port of Gibraltar) report non-EU Departure Hazmat information for vessels coming from EU ports for a significant number of ship calls. It should be noted that, in these situations, the information provided overlaps with the information legitimately provided by departure ports.
- The percentage of notifications lacking the ATA and/or the ATD from Denmark, Finland, Germany, Greece, Iceland, Norway and Sweden is very high (over 3%, see Table 14).

Recommendation 1: The MSs mentioned in paragraphs 2.1 are invited to provide feedback.

# 2.2 Exemptions

For information provided in SSN, MSs can grant four types of exemptions. These are: port notifications (Article 15 of Directive 2002/59/EC), Hazmat notifications (Article 15 of Directive 2002/59/EC), Security notifications (Article 7 of Regulation (EC) No 725/2004) and Waste notifications (Article 9 of Directive 2000/59/EC).

The central SSN system includes a functionality whereby MSs may report these exemptions. In the case of Waste exemptions, MSs still have the option to report directly to the Commission (until December 2018, SSN v4 in operation).

Since the deployment of SSN version 3.5, Member States can issue the same exemption type for a vessel in overlapping periods. With the deployment of SSN version 4.0 (expected for May 2018), Member States should also identify which ports along a specific route are exempted from reporting port, Hazmat, Waste and/or Security notifications. In addition, it will also be possible to identify the specific types of waste that are exempted (for Waste exemptions), and in the case of Security exemptions, the exempted port facility or facilities.

On 27 March 2018, the number of exemptions registered in SSN was 6,695 (5,376 were active, 1,305 had expired and 14 were scheduled, see Table 3). Table 4 shows the number of ship calls that took place in January 2018 (i.e. ship calls with ATD in the reporting period), and the ways in which the detailed part of the notifications (24h Pre Arrival, Hazmat, Waste and Security) was reported by MSs.

The figures show that:

- 17 MSs (Belgium, Croatia, Denmark, Estonia, Finland, France, Greece, Iceland, Italy, Lithuania, Malta, Netherlands, Norway, Poland, Romania, Sweden and the United Kingdom) have exemptions registered in SSN. It should also be noted that the table may identify exemptions for MSs that never issued exemptions in SSN. This may happen because each exemption refers to a route that may include ports in another MS.
- The proportion of exemptions granted to MS ports were 28% for Waste and 24% each for Pre-Arrival, Hazmat and Security.

The low number of exemptions shows that the majority of MSs either: do not benefit from the exemption possibilities offered by the existing legal framework, so they do not reduce the reporting burden for their shipping industry or; grant exemptions, but do not report these exemptions in SSN, thereby giving the impression that due notifications are missing.

**Recommendation 2:** Member States are invited to provide feedback on the problems encountered in relation to granting exemptions and registering them in SSN.

# 2.3 Ship MRS notifications

Table 6 shows the number of reporting systems that have been adopted by the IMO, and which should be reported to SSN. No reports have been received for BAREP (Norway), CALDOVREP (United Kingdom) or WETREP (Ireland and Portugal).

Portugal is still commissioned for the Ship MRS V.2 format, while all other MSs are using the SSN V.3 XML messaging framework for Ship MRS notifications. It should be noted that the detailed part of the Ship MRS notifications reported via V.2 (i.e. Hazmat, bunkers, COG, SOG and navigational status) cannot be retrieved by those MSs using the SSN V.3 XML MRS interface.

**Recommendation 3:** MSs facing delays and problems in implementing their MRS reporting obligations [i.e. BAREP (Norway), CALDOVREP (United Kingdom) or WETREP (Ireland and Portugal)] are invited to consider requesting the assistance of EMSA in order to speed up their implementations.

**Recommendation 4:** Portugal is invited to implement the V.3 XML messaging framework for Ship MRS notifications, and to phase-out the notifications in the V2 format. It was agreed at the first SSN/LRIT group meeting ("SSN/LRIT 1.4.5" document) that v2 messages would be phased out in SSN v4.0 (scheduled to be deployed in Production by the end of May 2018).

# 2.4 Incident Reports (IR)

The exchange of IR information between MSs has not yet been widely implemented (see Table 7). Denmark and Latvia successfully completed the commissioning tests, but are not yet using this functionality. Lithuania and Slovenia use the old framework Alert notifications, while the remaining MSs use the SSN Textual Interface to send Incident Reports.

**Recommendation 5:** Member States are invited to use the new IR framework (either through XML/SOAP or the SSN Textual Interface), and to phase-out the previous Alert notifications. Member States are reminded that, at the first SSN/LRIT group meeting ("SSN/LRIT 1.4.5" document), it was agreed that Alert notifications would be phased out in SSN v4.0 (scheduled to be deployed in Production end-May 2018).

### 3. SSN COMMON OPERATIONAL PROCEDURES

Among other things, the COP includes procedures for LOCODE management and steps to follow whenever the EMSA/MSS detects missing, inconsistent or erroneous data. MSs regularly receive short reports via email indicating: missing ship calls or Hazmat information (whether or not the request/response mechanism is working); issues affecting LOCODES and rejected messages and; the provision of Waste, Security and ATAs and ATDs. It should be noted that, for issues associated with LOCODES, monthly reports are also provided to national PSC administrators in order to provide guidance on possible corrective action to be taken in THETIS.

**Recommendation 6:** MSs are invited to acknowledge the receipt of these individual monthly reports, and to take corrective actions, including liaising with the National Authority for PSC in order to avoid differences between supporting systems.

# 4. SSN SYSTEM AVAILABILITY AND PERFORMANCE

# 4.1 System availability

The performance levels for 2017 were as follows:

- a) The central SSN system was down five times, with a total duration of 17 hours 40 minutes. The maximum permissible period of continuous interruption was not exceeded, and the availability of the central SSN system was 99.80%.
- b) The SSN-THETIS interface was down once, with a total duration of 1 hour, and no information was lost (just delayed).
- c) Lithuania and the Netherlands experienced one full downtime (i.e. failures affecting the streaming interface to the SSN Graphical Interface (GI) and the messaging interface to the SSN EIS simultaneously). The total duration of each downtime was 3d 21h 30m and 15h 20m respectively.
- d) Significant partial downtimes were observed for some national SSN systems. These affected the delivery of PortPlus information and the service delivered by the THETIS system: Cyprus (14h 47m), Croatia (16h 31m), Estonia (12h 17m) Finland (14h 58m, 21h 28m and 15h 3m, 14h 1m, 18h 45m), France (13h 40m), Ireland (19h 51m), Italy (18h 15), Latvia(1d 4h 52m), Lithuania (20h 10m, 14h 35m), Malta (12h 39m, 47h 06m), the Netherlands (24h 30m) Romania (21h19m, 12h 26m) and Sweden (4d 16h 52m).
- e) Portugal experienced a major failure in its national SSN system that prevented the delivery of PortPlus and MRS notifications to SSN between 25 August 2016 and 19 July 2017.

**Recommendation 7:** MSs are invited to take appropriate measures to reduce downtimes as far as possible.

# 4.2 Member State back-up procedures

In accordance with the IFCD (v1.1.1, section 4.4), back-up procedures should be in place for each SSN system component, and should be implemented in the event of a failure or a scheduled interruption (as described in the SSN technical and operational documentation).

In the event of a failure or scheduled interruption, NCAs must ensure that SSN messages are stored and then transmitted to the central SSN system when communications and/or systems have recovered (a statement that is reinforced in the Common Operational Procedures document). The national and central SSN systems should be able to re-send messages for up to 2 weeks (ship position information may be down-sampled for this purpose).

This section shows which MSs are making use of back-up procedures, and the ways in which their systems behave during central SSN system downtimes (section 4.2.1). On certain occasions, due to the low number of notifications provided and/or the short downtime, no conclusions were reached.

### 4.2.1 Central SSN downtime

The information was analysed for the period following the deployment of SSN version 3.5, which took place on 7 November 2017, and the results observed by MS and type of notification were as follows:

- a) 23 MSs (Belgium, Bulgaria, Cyprus, Denmark, Estonia, France, Germany, Greece, Iceland, Ireland, Italy, Latvia, Lithuania, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovenia, Spain, Sweden and the United Kingdom) are carrying out PortPlus data buffering.
  - 1 MS (Croatia) is not carrying out data buffering for PortPlus notifications.
- b) 7 MSs (Croatia, Denmark, Estonia, Finland, France, Italy and Poland) are carrying out Ship MRS data buffering (not conclusive for Belgium, Iceland, Slovenia and Spain).
  - 1 MS (Portugal) is not carrying out data buffering for Ship MRS notifications.

**Recommendation 8:** MSs are invited to store notifications during SSN intervention time windows, and to ensure that they are transmitted to the central SSN system when communications and/or systems have recovered (in accordance with Section 4.4 of the IFCD).

# 5. SSN DATA QUALITY

The main data quality issues detected are listed below:

- a) Missing PortPlus notifications (see Section 5.1 and Table 9, Annex III)
- b) Missing Hazmat information (see Section 5.2 and Table 10, Annex III)
- c) Missing Waste and Security information (see Section 5.3 and Table 1, Annex I)
- d) Availability of the detailed part of notifications (see Section 5.4 and Table 11, Annex III)
- e) Rejected notifications (see Section 5.5 and Table 12 and Table 13, Annex III)

In most cases, the reporting period was January 2018, but for missing Port and Hazmat information and Hazmat details, it was the second half of 2017. A summary of the findings is shown in Sections 5.1 - 5.4 below, and full details are available in Annex III.

In early 2018, the EMSA MSS began to analyse the content of Hazmat, Incident and MRS notifications, and the results are sent to Member States in the annual "Implementation of SafeSeaNet and LRIT" reports.

# 5.1 Missing PortPlus notifications (ship calls)

EMSA checked 4,415 ships that visited EU ports, and found that 51 of the due notifications were not sent to SSN (1.2% of ships). Figure 1 shows the overall trend by comparing the percentage figures for the previous reporting periods:

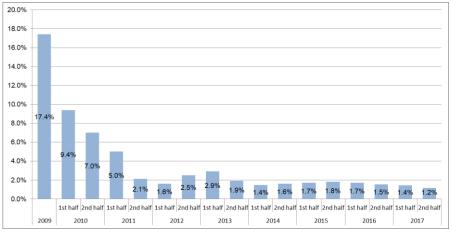


Figure 1 – Missing PortPlus notifications (ship calls) by reporting period

Table 9, Annex III includes the detailed results by MS.

**Recommendation 9:** MSs are invited to ensure that all notifications are provided in compliance with the requirements of Article 4 of Directive 2002/59/EC (as amended) and Article 24 of Directive 2009/16 (as amended).

# 5.2 Missing Hazmat information

9.86% of the due Hazmat EU and Hazmat non-EU Departure notifications were not sent to SSN (i.e. 391 out of 3,964 notifications for ships carrying dangerous or polluting goods).

With respect to the percentage figures for vessels having departed from MS ports with Hazmat cargoes on board (Hazmat EU Departure), the percentage of missing notifications decreased from 11.1% to 10.3% (Figure 2 – blue data). For Hazmat non-EU Departures, the percentage of missing notifications decreased from 11.5% to 9.1% (Figure 2 – green data).

Figure 2 shows the overall trend by comparing the percentage figures for the previous reporting periods, and it can be seen that, although the figures worsened during the initial implementation of SSN V3, the situation continues to improve. Some MSs should revise their internal procedures for reporting Hazmat information (e.g. Cyprus, Denmark, France, Germany, Italy, Malta, Spain, Sweden and the United Kingdom), as they are the source of a significant percentage of the reported issues.

The checks are based on the data already available in the SSN database, as each MRS notification provided to SSN contains information, whether or not Hazmat is carried on board when passing through the MRS.

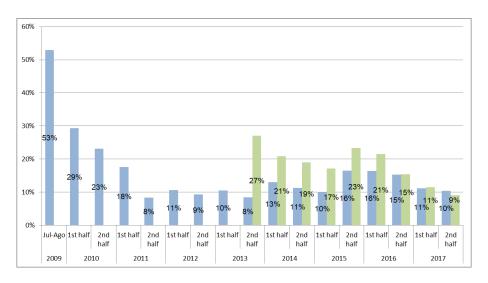


Figure 2 – Missing Hazmat information by reporting period (Hazmat EU Departure – Blue; and Hazmat non-EU Departure – Green)

Table 10, Annex III includes the detailed results by MS.

**Recommendation 10:** Member States are invited to ensure that all notifications are provided in compliance with the requirements of Article 13 of Directive 2002/59/EC (as amended).

# 5.3 Missing Waste and Security information

Directive 2010/65/EU (i.e. the "Reporting Formalities Directive") applies to ships arriving at, and departing from, ports situated in MSs. It requires MSs to "accept the fulfilment of reporting formalities in electronic format and their transmission via a single window" no later than 1 June 2015. Article 6 of the Directive requires MSs to ensure that information received in accordance with the reporting formalities provided in a legal act of the

union is made available in their national SafeSeaNet systems, and to make relevant parts of such information available to other MSs via the central SafeSeaNet system.

Waste and Security notifications were missing in 41% and 27% of ship calls respectively (see Table 1), as compared to 54% and 27% in the previous period. These numbers need to be further analysed in order to understand the difference between the numbers of ship calls and the associated Waste and Security notifications. When analysing the figures, exemptions registered in SSN system, ship type (regarding availability of Waste and Security information), gross tonnage and domestic voyages (regarding availability of Security information) were taken into account.

**Recommendation 11:** Member States are invited to ensure that all notifications are provided in compliance with the requirements of Directives 2002/59/EC (as amended) and 2010/65/EU, and to analyse the difference between the numbers of ship calls and the relevant Waste and Security notifications.

# 5.4 Availability of the detailed part of notifications

Since the detailed part of PortPlus notifications (Hazmat, Waste and Security details) is available to MSs via the machine-to-machine interface upon request, it must be ensured that the request-response mechanism is operational at all times.

Within the current design of SSN, should the request-response mechanism not be working, the contact details of the reporting authority are provided to the requester. MSs should therefore ensure that these details are kept updated and available on a 24/7 basis as a back-up solution for the provision of the detailed part of notifications.

The status of the availability of the detailed part of notifications provided by MSs is shown in Table 11, Annex III. The table shows that Portugal does not provide responses (MS2SSN\_ShipCall\_Res) to the SSN system because its request/response mechanism is not working. In addition, it was found that Estonia does not provide responses to Ship MRS requests, and that Norway and Spain do not always provide the complete information in the detailed part of notifications. For example, Waste details do not include some waste type elements.

**Recommendation 12:** Portugal is invited to ensure that the detailed part of the relevant notifications is made available to MS data requesters in electronic format.

**Recommendation 13:** MSs are invited to ensure that their contact details are kept updated and made available to MS data requesters on a 24/7 basis as a back-up solution for the provision of the detailed part of notifications.

# 5.5 Rejected notifications

The most frequent causes for the rejection of PortPlus notifications were as follows:

- Port Plus notifications not having ETAtoNextPort subsequent to the ETDFromPortOfCall. ETAtoNextPort greater than ETDFromPortOfCall. (31%);
- Messages identified by MsRefld [MSREFID] already registered in SSN (Sent by [SENDER]) (13%);
- At least one contact detail must be provided (Phone, Fax or Email 12%);
- A Port Plus notification must have ETAToPortOfCall prior to the ETDFromPortOfCall: ETAToPortOfCall less than ETDFromPortOfCall (8%);
- Reported Locode [LOCODE] not technically correct (8%).

The results can be found in Annex III (Tables 12 and 13). It should be noted that missing messages affect the proper implementation of both the VTMIS and PSC Directives. In comparison with the previous reporting period, the overall percentage of rejected PortPlus notifications has improved from 1.40% to 0.60%. Most of

the rejected messages (31%) relate mainly to an ETAtoNextPort prior to ETDFromPortOfCall. The "re-use of the same MsRefId" issue, which previously caused a large number of rejections, was investigated by EMSA and affected MSs, and has now been largely solved.

In order to better support MSs in analysing the rejected notifications, and to decrease the number of rejections, it was agreed that the list of errors and warnings generated by central SSN will be revised, and that it will be included in the XML RG. The "SSN/LRIT 2.4.3" document describes the proposed changes and amendments to messages implemented at central level.

**Recommendation 14:** MSs are invited to rectify the reported quality problems in order to ensure that rejected messages are eliminated, in particular by implementing checking rules in order to minimise inconsistent data in national SSN systems.

# 6. SSN INTERFACE WITH THETIS

# 6.1 ATA and ATD not provided via PortPlus notifications

MSs have the responsibility for providing the actual times of arrival (ATA) and departure (ATD) for ships calling at their ports and anchorages<sup>1</sup> to the THETIS inspection database via SSN within a reasonable time (THETIS only recognises a ship call when the ATA has been provided). This section evaluates the availability of ATA/ATD information in SSN for vessels falling within the scope of Directives 2009/16/EC and 1999/35/EC.

39,162 of the ship calls created in SSN during January 2018 (via PortPlus) fell within the scope of these Directives (see Table 14, Annex IV). On average, 2.0% of ship call notifications lacked both the ATA and the ATD. In addition, a further 1.2% lacked only the ATD, despite the ships having already departed. The overall situation has improved since the last reporting period (July 2017), but still requires further effort from Member States (see Figures 3 and 4 in Annex IV).

**Recommendation 15:** MSs are invited to ensure that correct ATA and ATD information is always provided in compliance with the requirements of Article 24 of Directive 2009/16/EC (as amended).

# 6.2 Timeliness of ATA and ATD reported in SSN

Article 24 of Directive 2009/16/EC on PSC requires that ATA and ATD information for all ships calling at MS ports or anchorages "is transferred within a reasonable time to the inspection database through SafeSeaNet, together with an identifier of the port concerned."

THETIS implemented a new rule in June 2012 in order to reject ATAs or ATDs which are provided more than 3 hours in advance of the system date and time.

EMSA compared the timeliness of ATA and ATD information with the date/time sent (the "SentAt" element in the notification), and Annex IV (Table 15) shows the results by MS. Croatia, Denmark, Finland, Germany, Greece, Italy, Norway, Portugal, Spain and the United Kingdom are the MSs mostly affected. ATAs provided more than 3 hours in advance, and which were therefore rejected by THETIS, affect 0.06% of overall ship calls. ATA and ATD information provided more than 3 hours late affected 11.6% and 11.1% of overall ship calls respectively. These notifications were not rejected by THETIS.

**Recommendation 16:** MSs are invited to provide the actual times of arrival (ATA) and departure (ATD) for ships calling at their ports and anchorages via SSN within a reasonable time in compliance with the requirements of Article 24 of Directive 2009/16/EC (as amended).

<sup>&</sup>lt;sup>1</sup> For THETIS, the ATA/ATD to anchorage shall be notified (through SSN) only when the anchorage is within the jurisdiction of the port and there is a ship-shore interface.

### 7. LRIT IMPLEMENTATION

Release v3.2 of the EU LRIT CDC is currently under development, and will be deployed in the production environment during Q2 2018. It will allow the automatic change of the reporting rate for ships entering a specified area in an activated standing order, plus some minor features and bug corrections.

The development of a new release (v2.1) of the EU LRIT SHIP Database was completed, and tests are almost finished. It is expected that it will be deployed in the production environment during April 2018, and it will mainly involve small improvements and bug corrections.

A new release (v3.1) of the LRIT IDE software was developed and tested in 2017, and will be deployed in the production environment in Q2 2018. This new release addresses findings identified in a previous audit, as well as including additional IMO and IMSO requirements.

### 8. LRIT AVAILABILITY AND PERFORMANCE

The availability of the EU LRIT CDC was 99.91% from 4 June 2016 to 3 June 2017, according to IMSO audit nº8. The availability of its User Web Interface was 99.35% during Q1 2018. The availability of the EU LRIT Ship Database User web Interface during Q1 2018 was 99.96%.

During the period 18 October 2017 - 31 March 2018, the availability of LRIT IDE PRODUCTION was 99.97%, with a one hour downtime, and the LRIT IDE processed 99.99% of the messages in less than 30 seconds in accordance with the IMO performance standard.

# 9. USE OF THE LRIT SERVICES

# 9.1 EU LRIT CDC

The following table illustrates the user activity in the UWI of the EU CDC during Q1 2018:

|                            | January | February | March |  |  |
|----------------------------|---------|----------|-------|--|--|
| Number of users            | 741     | 748      | 775   |  |  |
| Number of user connections | 1986    | 2050     | 1965  |  |  |

The EU CDC XML interface is based on Web Services (SOAP v. 1.2), and allows external systems (ES) to request and receive LRIT Information in an automatic way via a system-to-system interface. Currently, eight XML interfaces are in operation with the EU CDC participating countries:

- The LRIT2ES interface allows EU CDC participating countries to receive LRIT information from the EU CDC (typically the 6h mandatory position reports and position reports resulting from activated Coastal Standing Orders).
- The ES2LRIT interface allows EU CDC participating countries to receive the above information, and also to request LRIT information, including making specific requests. Belgium, Italy, Montenegro, and Poland implemented this type of interface.

The table below shows the countries that are using XML interfaces, the information received and the number of requests made through ES2LRIT interfaces during Q1 2018.

| Country       | Mandatory and polled position reports | Position requests | Ship particulars requests |
|---------------|---------------------------------------|-------------------|---------------------------|
| BELGIUM-ES    | 40890                                 | 0                 | 0                         |
| DENMARK-ES    | 143090                                | N/A               | N/A                       |
| GREENLAND-ES  | 4402                                  | N/A               | N/A                       |
| IRELAND-ES    | 43054                                 | N/A               | N/A                       |
| ITALY-ES      | 209305                                | 1103              | 0                         |
| MONTENEGRO-ES | 1401                                  | 0                 | 0                         |
| NORWAY-ES     | 211477                                | N/A               | N/A                       |
| POLAND-ES     | 7550                                  | 0                 | 12730                     |

# 9.2 LRIT IDE

During the period from 18 October 2017 - 31 March 2018, LRIT IDE production processed 8,058,332 messages, and the number of position reports of all types was 6,695,643.

### 10. LRIT DATA QUALITY

This section deals with data that is processed by the EU LRIT CDC or contained in the EU LRIT Ship Database.

The "SSN status report," which is sent to MSs once per year by EMSA and highlights SSN-related topics that need to be improved, has also included a section on the status of LRIT since the beginning of 2017. The report refers to issues linked with possibly invalid flags, and with ships that are not integrated or not reporting properly. It has been updated with the inclusion of terminals incorrectly registered as "Other" in the EU LRIT Ship Database.

### **10.1 EU LRIT CDC**

This section refers to the EU CDC Quality of Service (QoS), which assesses whether messages were properly delivered. According to the MSC Res. 263(84) §13 document, the IMO definition of QoS is:

The QoS refers to Periodic (Type 1), Poll (Type 2) and SAR (Type 3) position reports which were <u>delivered</u> by the EU LRIT CDC in accordance with the IMO requirements. The target QoS is 95% over any 24-hour period (24h QoS) and 99% over any 1 month (30d QoS).

The table below presents the monthly QoS covering both the periodic and polled messages:

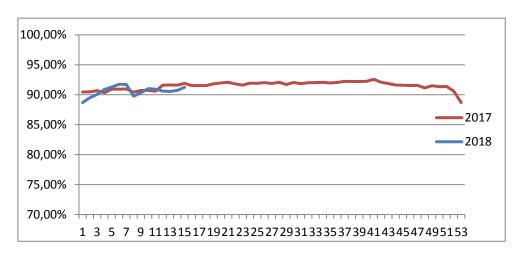
|  | January | February | March  |
|--|---------|----------|--------|
| Monthly IMO-30d QoS (target 99%)                                   | 99.84%  | 99.71%   | 99.28% |
| Number of delivered reports that did not meet the IMO requirements | 1,421   | 2,437    | 6,586  |
| Percentage of delivered reports that did not meet                  | 0.16%   | 0.29%    | 0.72%  |

| the IMO requirements                   |         |         |         |
|--|---------|---------|---------|
| Total number of reports sent by EU CDC | 915,793 | 836,674 | 917,210 |

The graph below shows the percentage of ships reporting properly in the EU LRIT CDC for 2017 and the beginning of 2018, and two significant reporting dips can be seen:

- In December 2017, hundreds of ships were not reporting properly because the Inmarsat C network had a problem with the satellite covering the Indian Ocean region.
- In February 2018, although ships were still reporting correctly in the EU LRIT CDC, the dip was caused by invalid reporting statuses of ships which were linked with the deployment of a patch in the EU LRIT Ship Database.

After these incidents, the reporting returned to standard values in April 2018.



**Recommendation 17:** LRIT Operational Contact points are invited to regularly check the reporting status of their ships in the EU LRIT CDC, and to take the appropriate actions listed there in order to ensure high reporting rates for their fleets.

### 10.2 EU LRIT SHIP Database

Since 2016, the EMSA MSS has been checking the flags of ships registered in the EU LRIT Ship Database by cross-checking with external sources. This information is now included in annual SSN/LRIT status reports.

With respect to the data entered by national LRIT Ship Database managers, it appears that around 2% of the terminals uploaded have at least one invalid entry, or have been replaced on board. Therefore, these terminals cannot neither be integrated, nor report properly, in the EU LRIT CDC until corrections have been made.

**Recommendation 18:** LRIT Ship Database managers are invited to thoroughly check data entered in the EU LRIT Ship Database in order to avoid delays related to the integration or non-reporting of ships in the EU LRIT CDC. Also, changes of flag should be reflected as soon as possible in the EU LRIT Ship Database in order to ensure that the correct vessels are tracked.

### 11. ACTIONS PROPOSED

Member States are invited to provide feedback on the reported issues.

# **Annex I: SSN system implementation by Member State**

|              |          | SS                  | N Data Qua            | lity                  |                        |                     | SSN I                | nterface with Thetis   |                                 |                |  |
|--------------|----------|---------------------|-----------------------|-----------------------|------------------------|---------------------|----------------------|--|---------------------------------|----------------|--|
|              |          | Missing In          | formation             |                       |                        | ATA / ATD           | Availability         | Timeliness of  | reporting                       |                |  |
| Member State | PortPlus | Hazmat              | Waste                 | Security              | PortPlus<br>Rejections | Only ATD<br>missing | ATA & ATD<br>missing | ATA / ATD more than<br>3h in advance<br>(rejected by Thetis) | ATA / ATD more<br>than 72h late | SSN<br>Version | Relevant issues affecting Member State   |
| Belgium      | 0.0%     | 2.5%                | 17.7%                 | 2.3%                  | 0.00%                  | 0.1%                | 0.0%                 | 0.0%   | 0.0%                            | v3             | - High number of missing Waste information (Mar 2017)  |
| Bulgaria     | 0.0%     | n.a. <sup>(1)</sup> | 1.9%                  | 0.0%                  | 0.17%                  | 0.0%                | 0.0%                 | 0.0%   | 0.0%                            | v3             | - Hazmat nonEU departure reported for vessels coming from EU ports (Sep 2016)  |
| Croatia      | 0.0%     | 4.9%                | 6.1%                  | 0.0%                  | 0.08%                  | 0.0%                | 0.0%                 | 0.0%   | 1.2%                            | v3             | <ul> <li>- High number of missing Waste information (Mar 2017)</li> <li>- Use of the dummy Persons on Board (POB) value (Aug 2015)</li> <li>- High number of Hazmat nonEU departure provided after arrival to the port (Mar 2018)</li> </ul>   |
| Cyprus       | 0.8%     | n.a. <sup>(1)</sup> | 4.3%                  | 3.2%                  | 0.34%                  | 0.0%                | 0.0%                 | 0.3%   | 0.0%                            |                | <ul> <li>- High number of Hazmat nonEU/EU departure provided after arrival/departure to/from the port (Mar 2018)</li> <li>- Use of the 'unknown ZZUKN' Next Port of Call value in Hazmat EU departure (Mar 2018)</li> </ul>  |
| Denmark      | 1.5%     | 7.2%                | 7.2%                  | 3.5%                  | 0.38%                  | 3.8%                | 0.3%                 | 0.1%   | 2.8%                            | v3             | <ul> <li>High number of missing Hazmat (Sep 2016) and Waste information (Mar 2017)</li> <li>High number of ship calls missing ATD (Jun 2015)</li> <li>High number of ship calls reporting ATA and/or ATD more than 72h late (Aug 2016)</li> <li>Missing to provide Persons on Board (POB) information (Apr 2009)</li> </ul>  |
| Estonia      | 0.0%     | 0.6%                | 22.8%                 | 2.0%                  | 0.11%                  | 0.0%                | 0.5%                 | 0.0%   | 0.1%                            | v3             | <ul> <li>High number of missing Waste information (Mar 2017)</li> <li>Ship MRS details (XML) not available upon request (Mar 2016)</li> <li>Use of the dummy Persons on Board (POB) value or missing to provide this value (Sep 2016)</li> </ul>   |
| Finland      | 2.6%     | 3.8%                | 31.7%                 | 0.0%                  | 1.32%                  | 0.9%                | 9.9%                 | 0.0%   | 0.3%                            | <b>v</b> 3     | <ul> <li>- High number of missing PortPlus (Mar 2018), Hazmat (Sep 2016) and Waste information (Mar 2017)</li> <li>- Abnormal high number of rejected PortPlus notifications (Mar 2018)</li> <li>- High number of ship calls missing ATA / ATD (Mar 2017)</li> <li>- Use of the dummy Persons on Board (POB) value or missing to provide this value (Sep 2014)</li> <li>- High number of Hazmat nonEU departure provided after arrival to the port (Mar 2018)</li> </ul> |
| France       | 1.0%     | 18.3%               | 52.2%                 | 30.1%                 | 0.16%                  | 0.0%                | 0.1%                 | 0.0%   | 0.2%                            | v3             | <ul> <li>- High number of missing Hazmat (Sep 2016), Waste and Security information (Mar 2017)</li> <li>- Hazmat nonEU departure reported for vessels coming from EU ports (Aug 2017)</li> <li>- Use of the dummy Persons on Board (POB) value or missing to provide this value (Jun 2009)</li> <li>- Use of the 'unknown ZZUKN' Next Port of Call value in Hazmat EU departure (Feb 2016)</li> </ul>  |
| Germany      | 2.5%     | 6.5%                | 47.2%                 | 53.9%                 | 1.13%                  | 0.7%                | 4.4%                 | 0.0%   | 1.1%                            | <b>v</b> 3     | <ul> <li>- High number of missing PortPlus (Mar 2018), Hazmat (Mar 2018), Waste and Security information (Mar 2017)</li> <li>- Abnormal high number of rejected PortPlus notifications (Sep 2016)</li> <li>- High number of ship calls missing ATA / ATD (Mar 2017)</li> <li>- Missing to provide Persons on Board (POB) information (Mar 2017)</li> </ul>   |
| Greece       | 2.8%     | 2.4%                | still not<br>provided | still not<br>provided | 0.56%                  | 1.9%                | 2.4%                 | 0.6%   | 2.1%                            | v3             | <ul> <li>High number of missing PortPlus and Hazmat (Mar 2018) information</li> <li>High number of ship calls missing ATA / ATD (Mar 2017)</li> <li>High number of ship calls reporting ATA and/or ATD more than 72h late (Mar 2018)</li> <li>Use of the dummy Persons on Board (POB) value (Apr 2009)</li> <li>Waste and Security notifications not implemented</li> <li>Remaining gaps in AIS coverage in Greek waters (Apr 2009)</li> </ul>                           |
| Iceland      | 0.7%     | n.a. <sup>(1)</sup> | 0.0%                  | 0.0%                  | 0.00%                  | 0.0%                | 5.1%                 | 0.0%   | 0.0%                            | v3             | - High number of ship calls missing ATA / ATD (Sep 2015)   |
| Ireland      | 1.4%     | 3.4%                | 0.0%                  | 0.0%                  | 0.64%                  | 0.1%                | 0.2%                 | 0.2%   | 1.4%                            | v3             | <ul> <li>High number of missing Hazmat information (Mar 2017)</li> <li>Missing MRS reports from WETREP (Jan 2009)</li> <li>Hazmat details (XML) not available upon request (Mar 2018)</li> </ul>   |
| Italy        | 1.9%     | 9.2%                | 18.7%                 | 8.8%                  | 0.01%                  | 0.2%                | 0.2%                 | 0.1%   | 2.7%                            | v3             | <ul> <li>High number of missing Hazmat (Sep 2016), Waste and Security information (Mar 2017)</li> <li>High number of ship calls reporting ATA and/or ATD more than 72h late (Mar 2018)</li> </ul>  |

<sup>(1)</sup> Percentages were disregarded for those MSs with a low number of samples employed

Table 1 – Implementation status by Member State on 4 April 2018

|                |          | SS         | N Data Qua            | lity                  |                        |                     | SSN I                | nterface with Thetis   |                                 |                |   |
|----------------|----------|------------|-----------------------|-----------------------|------------------------|---------------------|----------------------|--|---------------------------------|----------------|---|
|                |          | Missing In | formation             |                       |                        | ATA / ATC           | Availability         | Timeliness of  | reporting                       |                |   |
| Member State   | PortPlus | Hazmat     | Waste                 | Security              | PortPlus<br>Rejections | Only ATD<br>missing | ATA & ATD<br>missing | ATA / ATD more than<br>3h in advance<br>(rejected by Thetis) | ATA / ATD more<br>than 72h late | SSN<br>Version | Relevant issues affecting Member State  |
| Latvia         | 0.0%     | 5.1%       | 0.7%                  | 0.0%                  | 0.37%                  | 0.0%                | 0.0%                 | 0.0%   | 0.2%                            | v3             | - High number of missing Hazmat information (Aug 2017)  |
| Lithuania      | 0.0%     | 2.2%       | 0.0%                  | 3.5%                  | 0.05%                  | 0.0%                | 0.0%                 | 0.0%   | 0.0%                            | v3             | - High number of missing Hazmat information (Mar 2018)  |
| Malta          | 0.7%     | 27.0%      | 43.7%                 | 45.1%                 | 0.99%                  | 1.6%                | 0.0%                 | 0.0%   | 0.8%                            | v3             | <ul> <li>High number of missing Hazmat, Waste and Security information (Mar 2017)</li> <li>Non-EU Departure Hazmat reported for vessels coming from EU ports (Mar 2018)</li> <li>High number of Hazmat nonEU departure provided after arrival to the port (Mar 2018)</li> </ul>   |
| Netherlands    | 0.0%     | 3.0%       | 18.9%                 | 10.7%                 | 1.41%                  | 0.7%                | 0.3%                 | 0.0%   | 0.1%                            | <b>v</b> 3     | - High number of missing Hazmat (Mar 2018), Waste and Security information (Mar 2017) - Abnormal high number of rejected PortPlus notifications (Mar 2017) - Hazmat nonEu departure reported for vessels coming from EU ports (Aug 2017) - High number of ship call updates repeating previously sent information (Aug 2017)  |
| Norway         | 2.5%     | 5.2%       | 24.0%                 | 9.5%                  | 0.00%                  | 7.4%                | 8.0%                 | 0.0%   | 1.8%                            | <b>v</b> 3     | - High number of missing PortPlus (Aug 2016), Hazmat, Waste and Security information (Mar 2017) - High number of ship calls missing ATA / ATD (Sep 2015) - Missing MRS reports from BAREP (Aug 2013) - High number of Hazmat nonEU departure provided after arrival to the port (Mar 2018)  |
| Poland         | 0.0%     | 0.5%       | 0.9%                  | 0.1%                  | 0.03%                  | 0.0%                | 0.0%                 | 0.0%   | 0.2%                            | v3             |   |
| Portugal       | 1.4%     | 5.2%       | still not<br>provided | still not<br>provided | 1.49%                  | 1.2%                | 1.2%                 | 0.1%   | 3.7%                            | <b>v</b> 2     | <ul> <li>High number of missing Hazmat information (Mar 2018)</li> <li>Abnormal high number of rejected PortPlus notifications (Mar 2018)</li> <li>High number of ship calls reporting ATA and/or ATD more than 72h late (Aug 2017)</li> <li>Hazmat nonEU departure reported for vessels coming from EU ports (Aug 2017)</li> <li>Missing MRS reports from WETREP (Jan 2009)</li> <li>SSN version 3 not yet implemented</li> <li>Hazmat and Ship MRS details (XML) not available upon request (Aug 2016)</li> <li>High number of Hazmat nonEU departure provided after arrival to the port (Mar 2018)</li> </ul>  |
| Romania        | 0.7%     | 0.0%       | 0.3%                  | 0.3%                  | 0.21%                  | 0.4%                | 0.4%                 | 0.0%   | 0.3%                            | v3             |   |
| Slovenia       | 0.7%     | 4.0%       | 0.0%                  | 0.0%                  | 0.21%                  | 0.0%                | 0.0%                 | 0.0%   | 0.0%                            | v3             |   |
| Spain          | 1.5%     | 35.1%      | 51.4%                 | 3.1%                  | 1.05%                  | 0.3%                | 1.5%                 | 0.0%   | 2.4%                            | v3             | <ul> <li>High number of missing Hazmat (Sep 2016) and Waste information (Mar 2017)</li> <li>Abnormal high number of rejected PortPlus notifications (Mar 2018)</li> <li>High number of ship calls reporting late Hazmat, ATA and/or ATD information (Mar 2017)</li> <li>Waste details (XML) not allways available upon request (Mar 2018)</li> <li>Use of the dummy Persons on Board (POB) value or missing to provide this value (Jan 2009)</li> <li>High number of Hazmat EU departure provided after departure from the port (Mar 2018)</li> </ul>   |
| Sweden         | 0.0%     | 16.2%      | 61.4%                 | 20.9%                 | 0.08%                  | 1.5%                | 2.2%                 | 0.1%   | 0.3%                            | v3             | <ul> <li>High number of missing Hazmat, Waste and Security Information (Mar 2017)</li> <li>Hazmat nonEu departure reported for vessels coming from EU ports (Sep 2016)</li> <li>Use of the dummy Persons on Board (POB) value (Mar 2018)</li> </ul>   |
| United Kingdom | 2.6%     | 19.9%      | 48.8%                 | 35.7%                 | 0.03%                  | 0.6%                | 0.5%                 | 0.0%   | 1.0%                            | v3             | <ul> <li>High number of missing PortPlus (Aug 2017), Hazmat, Waste and Security information (Mar 2017)</li> <li>Hazmat nonEu departure reported for vessels coming from EU ports (Sep 2016)</li> <li>Missing MRS reports from CALDOVREP (Jan 2009)</li> <li>Waste and Security notifications not implemented for port of Gibraltar (Feb 2016)</li> <li>Hazmat details (XML) not available upon request for port of Gibraltar (Mar 2016)</li> <li>Use of the dummy Persons on Board (POB) value (Jan 2009)</li> <li>High number of Hazmat nonEU departure provided after arrival to the port (Mar 2018)</li> </ul> |
| Total          | 1.2%     | 9.9%       | 41.2%                 | 26.8%                 | 0.60%                  | 1.2%                | 2.0%                 | 0.1%   | 1.4%                            | -              | Updated: 04 April 2018  |
|                |          |            |                       |                       |                        |                     |                      |  | -                               |                |   |

<sup>(1)</sup> Percentages were disregarded for those MSs with a low number of samples employed

Table 1 – Implementation status by Member State on 4 April 2018 (cont.)

SSN/LRIT 3.5.1 / Version: 1.0 / Date: 23.03.2018

| Member State   |         | Shipcalls |              | AIS <sup>(1)</sup> | MRS     | Incident               | Total         |
|----------------|---------|-----------|--------------|--------------------|---------|------------------------|---------------|
| Member State   | New     | Updates   | Cancelations | AIS ' '            | IVING   | Reports <sup>(2)</sup> | Iotai         |
| Belgium        | 13,465  | 137,365   | 314          | 136,284,608        | 324     | 1                      | 136,436,077   |
| Bulgaria       | 1,935   | 10,589    | 51           | 13,983,354         | -       | 2                      | 13,995,931    |
| Croatia        | 6,582   | 32,642    | 67           | 20,368,839         | 3,245   | 36                     | 20,411,411    |
| Cyprus         | 1,887   | 20,751    | 93           | 25,039,654         | -       | 1                      | 25,062,386    |
| Denmark        | 12,269  | 31,692    | 276          | 141,258,035        | 29,544  | 30                     | 141,331,846   |
| Estonia        | 6,273   | 32,472    | 113          | 23,191,679         | 47,198  | 10                     | 23,277,745    |
| Finland        | 19,337  | 184,143   | 40           | 54,472,024         | 23,160  | 61                     | 54,698,765    |
| France         | 31,683  | 132,832   | 1,819        | 74,342,936         | 70,551  | 232                    | 74,580,053    |
| Germany        | 32,435  | 134,577   | 343          | 176,616,673        | -       | 21                     | 176,784,049   |
| Greece         | 45,853  | 97,397    | 1,147        | 52,080,021         | -       | 91                     | 52,224,509    |
| Iceland        | 1,702   | 3,387     | 106          | 60,208,656         | 633     | -                      | 60,214,484    |
| Ireland        | 6,762   | 25,749    | 52           | 28,975,257         | 2       | 6                      | 29,007,828    |
| Italy          | 42,825  | 242,093   | 1,487        | 187,522,820        | 9,266   | 322                    | 187,818,813   |
| Latvia         | 3,460   | 22,740    | 62           | 11,683,435         | -       | 5                      | 11,709,702    |
| Lithuania      | 2,398   | 20,264    | 62           | 6,865,375          | -       | 10                     | 6,888,109     |
| Malta          | 5,755   | 35,902    | 341          | 9,311,787          | -       | 11                     | 9,353,796     |
| Netherlands    | 26,357  | 317,476   | 1,112        | 210,979,073        | -       | 77                     | 211,324,095   |
| Norway         | 54,334  | 278,362   | 3,333        | 323,426,104        | -       | 19                     | 323,762,152   |
| Poland         | 8,137   | 77,752    | 724          | 31,538,079         | 9,140   | 3                      | 31,633,835    |
| Portugal       | 7,019   | 37,369    | 472          | 34,319,376         | 12,404  | 2                      | 34,376,642    |
| Romania        | 2,899   | 11,565    | 112          | 32,558,413         | -       | 9                      | 32,572,998    |
| Slovenia       | 939     | 5,590     | 32           | 5,703,524          | 606     | 6                      | 5,710,697     |
| Spain          | 81,096  | 567,056   | 5,660        | 226,199,854        | 8,458   | 27                     | 226,862,151   |
| Sweden         | 28,171  | 154,485   | 788          | 155,607,918        | -       | 59                     | 155,791,421   |
| United Kingdom | 66,457  | 285,312   | 4,409        | 152,003,591        | 321     | 69                     | 152,360,159   |
| Total          | 510,030 | 2,899,562 | 23,015       | 2,194,541,085      | 214,852 | 1,110                  | 2,198,189,654 |

<sup>(1)</sup> Includes AIS information transmitted through message-based and streaming mechanisms

Table 2 – Number of notifications by Member State and by type of notification

Reporting period: July – December 2017

<sup>(2)</sup> Includes Alert notifications and Incident reports

| Mamban Ctata   |        | Expired ex  | cemptions |          |        | Valid exe   | emptions |          | Sche   | Total       |       |          |       |
|----------------|--------|-------------|-----------|----------|--------|-------------|----------|----------|--------|-------------|-------|----------|-------|
| Member State   | Hazmat | Pre-Arrival | Waste     | Security | Hazmat | Pre-Arrival | Waste    | Security | Hazmat | Pre-Arrival | Waste | Security | Total |
| Belgium        | -      | -           | -         | 170      | -      | -           | -        | 78       | -      | -           | -     | -        | 248   |
| Bulgaria       | -      | -           | -         | -        | -      | -           | -        | -        | -      | -           | -     | -        | -     |
| Croatia        | -      | 69          | -         | -        | -      | 122         | -        | -        | -      | -           | -     | -        | 191   |
| Cyprus         | -      | -           | -         | -        | -      | -           | -        | -        | -      | -           | -     | -        | -     |
| Denmark        | -      | 2           | -         | -        | 83     | 39          | 42       | -        | -      | -           | -     | -        | 166   |
| Estonia        | 4      | -           | 16        | 2        | -      | -           | 68       | 47       | -      | -           | -     | -        | 137   |
| Finland        | 2      | -           | 120       | 7        | 5      | 20          | 359      | 81       | -      | -           | -     | -        | 594   |
| France         | 20     | 6           | 6         | 15       | 18     | -           | 16       | 269      | -      | -           | -     | -        | 350   |
| Germany        | -      | -           | -         | -        | -      | -           | -        | -        | -      | -           | -     | -        | -     |
| Greece         | -      | 2           | -         | -        | -      | 191         | -        | -        | -      | 12          | -     | -        | 205   |
| Iceland        | -      | 7           | -         | -        | -      | 4           | 14       | -        | -      | -           | -     | -        | 25    |
| Ireland        | -      | -           | -         | -        | -      | -           | -        | -        | -      | -           | -     | -        | -     |
| Italy          | 22     | -           | 217       | -        | 704    | 675         | 347      | 163      | -      | -           | -     | -        | 2,128 |
| Latvia         | -      | -           | -         | -        | -      | -           | -        | -        | -      | -           | -     | -        | -     |
| Lithuania      | -      | -           | -         | 5        | -      | -           | -        | 13       | -      | -           | -     | -        | 18    |
| Malta          | -      | -           | -         | -        | -      | -           | 15       | -        | -      | -           | -     | -        | 15    |
| Netherlands    | -      | -           | 13        | 32       | -      | -           | 356      | 166      | -      | -           | -     | -        | 567   |
| Norway         | 4      | -           | -         | -        | -      | -           | -        | -        | -      | -           | -     | -        | 4     |
| Poland         | -      | -           | 10        | -        | -      | 2           | 59       | 46       | -      | -           | -     | -        | 117   |
| Portugal       | -      | -           | -         | -        | -      | -           | -        | -        | -      | -           | -     | -        | -     |
| Romania        | -      | -           | -         | -        | 123    | 123         | 123      | 123      | -      | -           | -     | -        | 492   |
| Slovenia       | -      | -           | -         | -        | -      | -           | -        | -        | -      | -           | -     | -        | -     |
| Spain          | -      | -           | -         | -        | -      | -           | -        | -        | -      | -           | -     | -        | -     |
| Sweden         | -      | -           | -         | -        | 8      | 8           | -        | -        | -      | -           | -     | -        | 16    |
| United Kingdom | 253    | 269         | 11        | 21       | 329    | 62          | 111      | 364      | -      | 2           | -     | -        | 1,422 |
| Total          | 305    | 355         | 393       | 252      | 1,270  | 1,246       | 1,510    | 1,350    | -      | 14          | -     | -        | 6,695 |

Table 3 – Number of exemptions by type of notification registered in SSN on 27 March 2018

| Member State   | Shipcalls |                         |                         |                          |                       |                         |                         |                         |               |                         |                         |
|----------------|-----------|-------------------------|-------------------------|--------------------------|-----------------------|-------------------------|-------------------------|-------------------------|---------------|-------------------------|-------------------------|
|                | Total     | With Pre-               |                         | With Hazmat              |                       |                         | With Waste              |                         | With Security |                         |                         |
|                |           | Information<br>Reported | Exemption<br>Registered | Hazmat nonEu<br>Reported | Hazmat Eu<br>Reported | Exemption<br>Registered | Information<br>Reported | Exemption<br>Registered | Domestic      | Information<br>Reported | Exemption<br>Registered |
| Belgium        | 2,216     | 2,216                   | -                       | 132                      | 1,290                 | 101                     | 1,729                   | 47                      | 176           | 1,814                   | 111                     |
| Bulgaria       | 262       | 262                     | -                       | 57                       | 53                    | -                       | 259                     | -                       | 35            | 224                     | -                       |
| Croatia        | 230       | 230                     | -                       | 12                       | 46                    | -                       | 214                     | -                       | 66            | 150                     | -                       |
| Cyprus         | 300       | 300                     | =                       | 40                       | 62                    | =                       | 287                     | =                       | 21            | 243                     | -                       |
| Denmark        | 1,734     | 1,668                   | -                       | 28                       | 379                   | 3                       | 1,540                   | 27                      | 470           | 993                     | 20                      |
| Estonia        | 835       | 832                     | -                       | 26                       | 362                   | -                       | 534                     | 112                     | 15            | 291                     | 505                     |
| Finland        | 2,591     | 2,579                   | -                       | 55                       | 646                   | -                       | 878                     | 876                     | 778           | 1,757                   | -                       |
| France         | 4,244     | 3,959                   | 264                     | 469                      | 1,057                 | 123                     | 928                     | 1,250                   | 845           | 899                     | 1,453                   |
| Germany        | 4,689     | 4,689                   | -                       | 114                      | 1,211                 | 1,812                   | 2,104                   | 375                     | -             | 2,074                   | 46                      |
| Greece         | 3,653     | 3,639                   | 4                       | 325                      | 862                   | -                       | -                       | 66                      | 4             | -                       | -                       |
| Iceland        | 209       | 209                     | -                       | 2                        | 30                    | -                       | 201                     | 8                       | 113           | 96                      | -                       |
| Ireland        | 1,007     | 1,007                   | -                       | 12                       | 383                   | 43                      | 1,002                   | -                       | 94            | 907                     | -                       |
| Italy          | 5,144     | 5,144                   | -                       | 374                      | 1,640                 | 194                     | 3,257                   | 922                     | 2,814         | 1,986                   | 53                      |
| Latvia         | 597       | 597                     | =                       | 12                       | 222                   | -                       | 590                     | -                       | 32            | 551                     | -                       |
| Lithuania      | 396       | 396                     | -                       | 16                       | 126                   | -                       | 397                     | -                       | -             | 322                     | 61                      |
| Malta          | 772       | 772                     | -                       | 405                      | 381                   | -                       | 238                     | 5                       | 116           | 341                     | -                       |
| Netherlands    | 3,975     | 3,975                   | -                       | 1,835                    | 1,693                 | 70                      | 2,788                   | 404                     | 517           | 2,684                   | 231                     |
| Norway         | 2,913     | 2,909                   | -                       | 29                       | 579                   | 29                      | 2,106                   | 25                      | 1,749         | 901                     | -                       |
| Poland         | 1,169     | 1,167                   | =                       | 38                       | 420                   | -                       | 905                     | 249                     | 98            | 941                     | 79                      |
| Portugal       | 1,012     | 964                     | =                       | 93                       | 477                   | -                       | -                       | 5                       | 405           | -                       | 5                       |
| Romania        | 378       | 377                     | -                       | 66                       | 69                    | -                       | 379                     | -                       | 40            | 332                     | -                       |
| Slovenia       | 130       | 130                     | -                       | 36                       | 75                    | -                       | 130                     | -                       | -             | 130                     | -                       |
| Spain          | 11,417    | 11,417                  | -                       | 317                      | 895                   | -                       | 5,451                   | -                       | 5,915         | 3,979                   | 7                       |
| Sweden         | 3,058     | 3,058                   | -                       | 62                       | 427                   | 6                       | 846                     | 349                     | 472           | 1,465                   | 423                     |
| United Kingdom | 9,639     | 9,458                   | 22                      | 414                      | 1,796                 | 152                     | 3,733                   | 1,095                   | 4,243         | 2,183                   | 1,028                   |
| Total          | 62,570    | 61,954                  | 290                     | 4,969                    | 15,181                | 2,533                   | 30,496                  | 5,815                   | 19,018        | 25,263                  | 4,022                   |

Table 4 – Number of ship calls and the way in which the detailed part of notifications is reported by Member States

|                | Messaging Interface |             | Streaming Interface                       |
|----------------|---------------------|-------------|---|
| Member State   | Ship AIS            | AIS Reports | Regional Server / Proxy                   |
| Belgium        | -                   | 20,192,934  | North Sea                                 |
| Bulgaria       | -                   | 1,667,907   | MARES                                     |
| Croatia        | -                   | 3,337,719   | MARES                                     |
| Cyprus         | -                   | 1,934,848   | MARES                                     |
| Denmark        | -                   | 16,922,772  | HELCOM                                    |
| Estonia        | -                   | 3,560,350   | HELCOM                                    |
| Finland        | -                   | 6,304,639   | HELCOM                                    |
| France         | -                   | 10,182,797  | North Sea and MARES (Mediterranean Coast) |
| Germany        | 669,475             | 28,458,795  | SSN SI Germany                            |
| Greece         | -                   | 7,619,797   | MARES                                     |
| Iceland        | -                   | 7,253,635   | North Atlantic                            |
| Ireland        | -                   | 4,060,415   | North Sea                                 |
| Italy          | -                   | 24,000,662  | MARES                                     |
| Latvia         | -                   | 1,743,474   | HELCOM                                    |
| Lithuania      | -                   | 932,274     | HELCOM                                    |
| Malta          | -                   | 1,440,707   | MARES                                     |
| Netherlands    | -                   | 30,772,246  | North Sea                                 |
| Norway         | -                   | 44,444,117  | North Atlantic                            |
| Poland         | -                   | 4,443,277   | HELCOM                                    |
| Portugal       | -                   | 5,354,443   | MARES                                     |
| Romania        | -                   | 4,638,598   | MARES                                     |
| Slovenia       | -                   | 592,834     | HELCOM                                    |
| Spain          | -                   | 30,590,662  | MARES                                     |
| Sweden         | -                   | 18,652,133  | HELCOM                                    |
| United Kingdom | -                   | 24,996,424  | North Sea and MARES (Gibraltar)           |
| Total          | 669,475             | 304,098,459 |   |

Table 5 – Number of AIS reports by Member State and Interface

Reporting period: January 2018

SSN/LRIT 3.5.1 / Version: 1.0 / Date: 23.03.2018

|                |              |  | Ship   | MRS Notificat | tions  |
|----------------|--------------|--|--------|---------------|--------|
| Member State   | MRS          | Area   | SSN V2 | SSN V3        | TOTAL  |
| Belgium        | WETREP       | EU Atlantic Coast (only for ships carrying heavy grade oils) | -      | 61            | 61     |
| Bulgaria       | -            | -  | -      | -             | -      |
| Croatia        | ADRIREP      | Adriatic Sea   | -      | 540           | 540    |
| Cyprus         | -            | -  | -      | -             | -      |
| Denmark        | BELTREP      | Great Belt   |        | 2,697         | 4,964  |
|                | SOUNDREP     | The Sound  | -      | 2,267         | 4,904  |
| Estonia        | GOFREP       | Gulf of Finland  | -      | 6,675         | 6,675  |
| Finland        | GOFREP       | Gulf of Finland  | -      | 3,325         | 3,325  |
| France         | BONIFREP     | Strait of Bonifacio (only DPG )                              |        | 261           |        |
|                | CALDOVREP    | Dover Strait/ Pas de Calais                                  |        | 2,993         |        |
|                | MANCHREP     | Off Les Casquests/ La Manche                                 | -      | 4,598         | 11,539 |
|                | OUESSREP     | Off Ouessant   |        | 3,679         |        |
|                | WETREP       | EU Atlantic Coast (only for ships carrying heavy grade oils) |        | 8             |        |
| Germany        | -            | -  | -      | -             | -      |
| Greece         | -            |  | -      | -             | -      |
| Iceland        | TRANSREP     | South & South West coast of Iceland                          | -      | 66            | 66     |
| Ireland        | WETREP       | EU Atlantic Coast (only for ships carrying heavy grade oils) | -      | -             | -      |
| Italy          | ADRIREP      | Adriatic Sea   |        | 1,143         | 4 200  |
|                | BONIFREP     | Strait of Bonifacio (only DPG )                              | -      | 237           | 1,380  |
| Latvia         | -            | -  | -      | -             | -      |
| Lithuania      | -            | -  | -      | -             | -      |
| Malta          | -            |  | -      | -             | -      |
| Netherlands    | -            |  | -      | -             | -      |
| Norway         | BAREP        | Barents Sea  | -      | -             | -      |
| Poland         | GDANREP      | Gulf of Gdansk   | -      | 1,566         | 1,566  |
| Portugal       | COPREP       | Coast of Portugal  | 2.000  | -             | 2.000  |
|                | WETREP       | EU Atlantic Coast (only for ships carrying heavy grade oils) | 2,906  | -             | 2,906  |
| Romania        | -            | -  | -      | -             | -      |
| Slovenia       | ADRIREP      | Adriatic Sea   | -      | 135           | 135    |
| Spain          | CANREP       | Canary Islands (only for ships carrying heavy grade oils)    |        | 51            |        |
|                | FINREP       | Finisterre (NW Coast of Spain)                               |        | 554           |        |
|                | GATREP (1)   | Gulf of Almeria (Gata Cape)                                  | -      | 454           | 1,745  |
|                | GIBREP       | Strait of Gibraltar  |        | 674           |        |
|                | WETREP       | EU Atlantic Coast (only for ships carrying heavy grade oils) |        | 12            |        |
| Sweden         | SOUNDREP (2) | The Sound  | -      | -             | -      |
| United Kingdom | CALDOVREP    | Dover Strait/ Pas de Calais                                  |        | -             | 45     |
|                | WETREP       | EU Atlantic Coast (only for ships carrying heavy grade oils) | -      | 45            | 45     |
| Total          |              |  | 2,906  | 32,041        | 34,947 |

<sup>(1)</sup> Voluntary Ship Reporting System

Table 6 – Number of MRS reports by Member State and SSN Protocol Reporting period: January 2018

Those MRSs not yet providing information to SSN are highlighted in red (status on 27 March 2018)

<sup>(2)</sup> Sweden SOUNDREP reports are transmitted to SSN by Denmark

| Member State   | Alert Noti | ifications |        |        |       | Incident          | Reports                |                        |                           |        | ١ ,                    | Sub-Total<br>Incident | Panarta | Total |
|----------------|------------|------------|--------|--------|-------|-------------------|------------------------|------------------------|---------------------------|--------|------------------------|-----------------------|---------|-------|
| Welliber State | SITREP     | Others     | SITREP | POLREP | WASTE | L&F<br>Containers | Failed<br>Notification | Pilot / Port<br>Report | VTS Rules<br>Infringement | Others | Alert<br>Notifications | XML                   | WEB     | TOTAL |
| Belgium        | -          | -          | 1      | -      | -     | -                 | -                      | -                      | -                         | -      | -                      | 1                     | -       | 1     |
| Bulgaria       | -          | -          | -      | -      | -     | -                 | 1                      | -                      | 1                         | -      | -                      | -                     | 2       | 2     |
| Croatia        | -          | -          | 15     | -      | -     | -                 | -                      | -                      | 18                        | 3      | -                      | 36                    | -       | 36    |
| Cyprus         | -          | -          | -      | 1      | -     | -                 | -                      | -                      | -                         | -      | -                      | -                     | 1       | 1     |
| Denmark        | -          | -          | 26     | 2      | -     | -                 | -                      | -                      | -                         | 2      | -                      | -                     | 30      | 30    |
| Estonia        | -          | -          | 9      | -      | -     | -                 | -                      | -                      | 1                         | -      | -                      | 10                    | -       | 10    |
| Finland        | -          | -          | 31     | -      | -     | 1                 | 10                     | -                      | 2                         | 17     | -                      | -                     | 61      | 61    |
| France         | -          | -          | 197    | 4      | -     | -                 | 4                      | 10                     | 3                         | 14     | -                      | 230                   | 2       | 232   |
| Germany        | -          | -          | 8      | 4      | -     | -                 | -                      | -                      | -                         | 9      | -                      | -                     | 21      | 21    |
| Greece         | -          | -          | 70     | 7      | -     | -                 | -                      | -                      | 3                         | 11     | -                      | -                     | 91      | 91    |
| Iceland        | -          | -          | -      | -      | -     | -                 | -                      | -                      | -                         | -      | -                      | -                     | -       | -     |
| Ireland        | -          | -          | 2      | 4      | -     | -                 | -                      | -                      | -                         | -      | -                      | -                     | 6       | 6     |
| Italy          | -          | -          | 234    | -      | -     | -                 | 1                      | 13                     | 3                         | 71     | -                      | -                     | 322     | 322   |
| Latvia         | -          | -          | 5      | -      | -     | -                 | -                      | -                      | -                         | -      | -                      | -                     | 5       | 5     |
| Lithuania      | 7          | -          | 1      | -      | -     | -                 | -                      | -                      | 2                         | -      | 7                      | 3                     | -       | 10    |
| Malta          | -          | -          | 6      | -      | -     | -                 | -                      | 1                      | 1                         | 3      | -                      | -                     | 11      | 11    |
| Netherlands    | -          | -          | 59     | 2      | -     | 2                 | -                      | -                      | -                         | 14     | -                      | -                     | 77      | 77    |
| Norway         | -          | -          | 16     | -      | -     | 2                 | -                      | -                      | -                         | 1      | -                      | -                     | 19      | 19    |
| Poland         | -          | -          | 2      | -      | -     | -                 | -                      | -                      | -                         | 1      | -                      | 3                     | -       | 3     |
| Portugal       | -          | -          | 2      | -      | -     | -                 | -                      | -                      | -                         | -      | -                      | -                     | 2       | 2     |
| Romania        | -          | -          | 7      | -      | -     | -                 | -                      | -                      | -                         | 2      | -                      | -                     | 9       | 9     |
| Slovenia       | 5          | 1          | -      | -      | -     | -                 | -                      | -                      | -                         | -      | 6                      | -                     | -       | 6     |
| Spain          | -          | -          | 19     | -      | -     | -                 | -                      | -                      | -                         | 8      | -                      | 27                    | -       | 27    |
| Sweden         | -          | -          | 3      | -      | -     | -                 | -                      | 1                      | -                         | 55     | -                      | -                     | 59      | 59    |
| United Kingdom | -          | -          | 62     | 1      | -     | 1                 | -                      | -                      | 2                         | 3      | -                      | 49                    | 20      | 69    |
| Total          | 12         | 1          | 775    | 25     |       | 6                 | 16                     | 25                     | 36                        | 214    | 13                     | 359                   | 738     | 1,110 |

Table 7 – Number of Alert Notifications and Incident Reports by Member State and by Type

Reporting period: July - December 2017

**Annex II: Operational status by Member State** 

| Member State   |                         | Requests             |                         | Total     |
|----------------|-------------------------|----------------------|-------------------------|-----------|
| Member State   | Shipcall <sup>(1)</sup> | Ship (AIS/MRS)       | Incident <sup>(2)</sup> | lotai     |
| Belgium        | 7                       | 4,502 <sup>(3)</sup> | 52                      | 4,561     |
| Bulgaria       | 1                       | -                    | 20                      | 21        |
| Croatia        | 12                      | -                    | 23                      | 35        |
| Cyprus         | 13                      | 5                    | 30                      | 48        |
| Denmark        | 26                      | 12                   | 50                      | 88        |
| Estonia        | 549,727 (4)             | -                    | 12                      | 549,739   |
| Finland        | 6                       | -                    | 38                      | 44        |
| France         | 59                      | 19                   | 29                      | 107       |
| Germany        | 7                       | -                    | 29                      | 36        |
| Greece         | 268                     | -                    | 29                      | 297       |
| Iceland        | -                       | 6                    | 37                      | 43        |
| Ireland        | -                       | -                    | 8                       | 8         |
| Italy          | 523                     | 3                    | 33                      | 559       |
| Latvia         | 6                       | -                    | 19                      | 25        |
| Lithuania      | 4,730                   | -                    | 47                      | 4,777     |
| Malta          | 5                       | -                    | 36                      | 41        |
| Netherlands    | 86                      | -                    | 68                      | 154       |
| Norway         | 765,628 <sup>(5)</sup>  | -                    | 18                      | 765,646   |
| Poland         | 37,248                  | 22                   | 8,549                   | 45,819    |
| Portugal       | 3                       | -                    | 20                      | 23        |
| Romania        | 5                       | -                    | 2                       | 7         |
| Slovenia       | 1                       | -                    | 2                       | 3         |
| Spain          | 16                      | -                    | 89                      | 105       |
| Sweden         | 22                      | -                    | 48                      | 70        |
| United Kingdom | 8                       | -                    | 6                       | 14        |
| Total          | 1,358,407               | 4,569                | 9,294                   | 1,372,270 |

- (1) Requests used to retrieve Voyage, Hazmat, Waste or Security details
- (2) Requests used to retrieve Alert or Incident report details
- (3) Periodic requests for checking availability of central SSN
- (4) RecentAndCurrentShipCallsOfSelectedShip and GetActiveHazmatForSelectedShip requests in order fill in missing data in the Estonian National Single Window
- (5) Hazmat summary requests for risk assessment of vessels transiting in Member State waters

Table 8 – Number of requests by Member State and by type of notification Reporting period: July-December 2018

# **Annex III: Data quality**

|                | Second half 2017<br>(Jul 2017 - Dec 2017) |               |         |         |         |         |         |         |         |         |         |           |
|----------------|---|---------------|---------|---------|---------|---------|---------|---------|---------|---------|---------|-----------|
| Member State   |   | Notifications | 2013    | 2014    |         | 201     | 15      | 201     | 16      | 2017    |         | Francisco |
|                | Nr. Checks                                | Missing       | Jul-Dec | Jan-Jun | Jul-Dec | Jan-Jun | Jul-Dec | Jan-Jun | Jul-Dec | Jan-Jun | Jul-Dec | Evolution |
| Belgium        | 211                                       | 0             | 2%      | 2%      | 2%      | 1%      | 1%      | 0%      | 0%      | 0%      | 0.00%   |           |
| Bulgaria       | 146                                       | 0             | 0%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0.00%   |           |
| Croatia        | 140                                       | 0             | -       | -       | -       | 5%      | 2%      | 0%      | 0%      | 0%      | 0.00%   |           |
| Cyprus         | 129                                       | 1             | 1%      | 0%      | 0%      | 0%      | 0%      | 1%      | 0%      | 1%      | 0.78%   |           |
| Denmark        | 196                                       | 3             | 7%      | 7%      | 4%      | 3%      | 8%      | 6%      | 1%      | 3%      | 1.53%   | Harla     |
| Estonia        | 130                                       | 0             | 1%      | 0%      | 5%      | 4%      | 0%      | 0%      | 0%      | 0%      | 0.00%   |           |
| Finland        | 195                                       | 5             | 2%      | 0%      | 1%      | 2%      | 0%      | 1%      | 0%      | 0%      | 2.56%   |           |
| France         | 192                                       | 2             | 2%      | 0%      | 4%      | 2%      | 1%      | 1%      | 0%      | 1%      | 1.04%   |           |
| Germany        | 204                                       | 5             | 7%      | 5%      | 4%      | 5%      | 11%     | 3%      | 1%      | 3%      | 2.45%   | mulaa     |
| Greece         | 211                                       | 6             | 3%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0%      | 1%      | 2.84%   |           |
| Iceland        | 140                                       | 1             | 0%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0.71%   |           |
| Ireland        | 139                                       | 2             | 1%      | 1%      | 1%      | 1%      | 1%      | 0%      | 1%      | 1%      | 1.44%   |           |
| Italy          | 209                                       | 4             | 1%      | 1%      | 0%      | 0%      | 1%      | 3%      | 0%      | 1%      | 1.91%   |           |
| Latvia         | 140                                       | 0             | 0%      | 0%      | 0%      | 1%      | 0%      | 0%      | 0%      | 0%      | 0.00%   |           |
| Lithuania      | 142                                       | 0             | 1%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0%      | 0.00%   |           |
| Malta          | 142                                       | 1             | 5%      | 3%      | 4%      | 6%      | 5%      | 6%      | 9%      | 12%     | 0.70%   | السيد     |
| Netherlands    | 210                                       | 0             | 0%      | 0%      | 0%      | 1%      | 0%      | 1%      | 1%      | 1%      | 0.00%   |           |
| Norway         | 197                                       | 5             | 1%      | 2%      | 3%      | 1%      | 2%      | 0%      | 4%      | 2%      | 2.54%   |           |
| Poland         | 140                                       | 0             | 0%      | 0%      | 0%      | 1%      | 1%      | 1%      | 0%      | 0%      | 0.00%   | <u>-</u>  |
| Portugal       | 142                                       | 2             | 1%      | 2%      | 2%      | 4%      | 3%      | 6%      | 7%      | -       | 1.41%   |           |
| Romania        | 140                                       | 1             | 1%      | 0%      | 1%      | 0%      | 0%      | 1%      | 1%      | 0%      | 0.71%   |           |
| Slovenia       | 140                                       | 1             | 0%      | 1%      | 0%      | 0%      | 0%      | 0%      | 0%      | 1%      | 0.71%   |           |
| Spain          | 205                                       | 3             | 5%      | 2%      | 1%      | 2%      | 2%      | 4%      | 2%      | 0%      | 1.46%   | la-asta - |
| Sweden         | 226                                       | 0             | 1%      | 2%      | 0%      | 1%      | 0%      | 1%      | 10%     | 3%      | 0.00%   |           |
| United Kingdom | 349                                       | 9             | 1%      | 2%      | 3%      | 2%      | 2%      | 3%      | 1%      | 3%      | 2.58%   |           |
| Total          | 4,415                                     | 51            | 1.9%    | 1.4%    | 1.6%    | 1.7%    | 1.8%    | 1.7%    | 1.5%    | 1.4%    | 1.2%    |           |

Table 9 – Missing Port notifications by Member State and by reporting period

Highlighting those values not complying with the IFCD

|                |            |                              |         |         | Haz     | mat El   | J Depa  | rture   |         |                 |   |           |                |            |               | Hazma          | at non-l | EU Dep    | arture  | <b>;</b> |         |         |           |
|----------------|------------|------------------------------|---------|---------|---------|--|---------|---------|---------|-----------------|---|-----------|----------------|------------|---------------|----------------|----------|-----------|---------|----------|---------|---------|-----------|
| Member State   |            | d half 2017<br>7 - Dec 2017) |         |         | Pre     | revious and Current Reporting Periods<br>Notifications Missing (%) |         |         |         |                 | Second half 2017 Previous and Current Reporting Periods (Jul 2017 - Dec 2017) Notifications Missing (%) |           |                |            |               |                |          |           |         |          |         |         |           |
|                |            | Notifications                | 2013    | 20      | 14      | 20°  | 15      | 201     | 6       | 20 <sup>-</sup> | 17  |           | Member State   |            | Notifications | 2014 2015 2016 |          |           | 6       | 2017     |         |         |           |
|                | Nr. Checks | Missing                      | Jul-Dec | Jan-Jun | Jul-Dec | Jan-Jun  | Jul-Dec | Jan-Jun | Jul-Dec | Jan-Jun         | Jul-Dec   | Evolution |                | Nr. Checks | Missing       | Jul-Dec        | Jan-Jun  | Jul-Dec . | Jan-Jun | Jul-Dec  | Jan-Jun | Jul-Dec | Evolution |
| Belgium        | 119        | 2                            | 1%      | 1%      | 5%      | 5%   | 5%      | 0%      | 2%      | 1%              | 1.68%   |           | Belgium        | 118        | 4             | 1 8%           | 7%       | 3%        | 9%      | 0%       | 7%      | 3.4%    |           |
| Bulgaria       | 9          | 1                            | 0%      | 17%     | 14%     | 0%   | 0%      | 17%     | 18%     | 0%              | 11.11%  |           | Bulgaria       | 0          | (             | n.a.           | n.a.     | n.a.      | n.a.    | n.a.     | n.a.    | n.a.    |           |
| Croatia        | 99         | 3                            | n.a     | . n.a.  | n.a.    | n.a.   | n.a.    | n.a.    | n.a.    | 2%              | 3.03%   |           | Croatia        | 43         | 4             | 1 n.a.         | n.a.     | n.a.      | n.a.    | n.a.     | n.a.    | 9.3%    |           |
| Cyprus         | 13         | 2                            | 50%     | 60%     | 50%     | 0%   | 33%     | n.a.    | n.a.    | 23%             | 15.38%  |           | Cyprus         | 0          | C             | n.a.           | n.a.     | n.a.      | n.a.    | n.a.     | n.a.    | n.a.    |           |
| Denmark        | 82         | 7                            | 14%     | 19%     | 10%     | 13%  | 54%     | 44%     | 58%     | 8%              | 8.54%   |           | Denmark        | 29         | 1             | 91%            | 86%      | 89%       | 0%      | 0%       | 10%     | 3.4%    |           |
| Estonia        | 111        | 1                            | 3%      | 0%      | 3%      | 0%   | 4%      | 0%      | 13%     | 0%              | 0.90%   | _         | Estonia        | 52         | C             | n.a.           | n.a.     | n.a.      | n.a.    | n.a.     | n.a.    | n.a.    |           |
| Finland        | 116        | 4                            | 20%     | 42%     | 27%     | 18%  | 14%     | 11%     | 11%     | 6%              | 3.45%   | -1        | Finland        | 66         | 3             | 67%            | 56%      | 67%       | n.a.    | 0%       | 4%      | 4.5%    |           |
| France         | 118        | 23                           | 6%      | 17%     | 17%     | 18%  | 21%     | 20%     | 7%      | 10%             | 19.49%  |           | France         | 117        | 20            | 16%            | 25%      | 47%       | 46%     | 37%      | 24%     | 17.1%   |           |
| Germany        | 114        | 8                            | 5%      | 2%      | 6%      | 4%   | 11%     | 10%     | 11%     | 4%              | 7.02%   |           | Germany        | 116        | 7             | 7 1%           | 11%      | 13%       | 7%      | 14%      | 4%      | 6.0%    |           |
| Greece         | 116        | 3                            | 0%      | 10%     | 10%     | 3%   | 0%      | 6%      | 6%      | 1%              | 2.59%   |           | Greece         | 9          | C             | 33%            | 0%       | n.a.      | n.a.    | n.a.     | n.a.    | 0.0%    |           |
| celand         | 2          | 1                            | n.a     | . 0%    | n.a.    | n.a.   | n.a.    | n.a.    | n.a.    | n.a.            | n.a.  |           | Iceland        | 0          | (             | n.a.           | n.a.     | n.a.      | n.a.    | n.a.     | n.a.    | n.a.    |           |
| reland         | 115        | 4                            | 0%      | 100%    | 50%     | 50%  | 50%     | 0%      | 42%     | 13%             | 3.48%   | Inn.      | Ireland        | 1          | (             | 100%           | 100%     | 50%       | 100%    | n.a.     | n.a.    | n.a.    |           |
| taly           | 117        | 12                           | 8%      | 8%      | 7%      | 7%   | 11%     | 15%     | 5%      | 6%              | 10.26%  |           | Italy          | 112        | 9             | 23%            | 16%      | 25%       | 32%     | 14%      | 12%     | 8.0%    |           |
| Latvia         | 94         | 6                            | 0%      | 0%      | 0%      | 0%   | 5%      | 15%     | 5%      | 8%              | 6.38%   |           | Latvia         | 23         | C             | 0%             | 33%      | n.a.      | n.a.    | n.a.     | n.a.    | 0.0%    | _         |
| Lithuania      | 99         | 3                            | 5%      | 11%     | 6%      | 5%   | 0%      | 0%      | 0%      | 0%              | 3.03%   |           | Lithuania      | 36         | (             | 100%           | 0%       | n.a.      | n.a.    | n.a.     | n.a.    | 0.0%    |           |
| Malta          | 109        | 33                           | 6%      | 2%      | 16%     | 14%  | 0%      | 5%      | 34%     | 61%             | 30.28%  |           | Malta          | 17         | 1             | I 0%           | 0%       | 0%        | 0%      | 20%      | 36%     | 5.9%    | =         |
| Netherlands    | 117        | 5                            | 10%     | 8%      | 8%      | 3%   | 8%      | 11%     | 6%      | 3%              | 4.27%   |           | Netherlands    | 116        | 2             | 24%            | 4%       | 8%        | 7%      | 9%       | 3%      | 1.7%    |           |
| Norway         | 99         | 5                            | 13%     | 16%     | 9%      | 14%  | 22%     | 6%      | 16%     | 7%              | 5.05%   |           | Norway         | 17         | 1             | I 0%           | 0%       | 7%        | 0%      | 0%       | 25%     | 5.9%    |           |
| Poland         | 117        | 1                            | 7%      | 7%      | 1%      | 2%   | 2%      | 10%     | 14%     | 1%              | 0.85%   |           | Poland         | 83         | C             | 3%             | 0%       | 0%        | 0%      | 0%       | 2%      | 0.0%    |           |
| Portugal       | 100        | 6                            | 7%      | 10%     | 8%      | 6%   | 7%      | 3%      | 31%     | n.a.            | n.a.  |           | Portugal       | 72         | 3             | 3 15%          | 3%       | 5%        | 3%      | 12%      | n.a.    | 4.2%    |           |
| Romania        | 15         | С                            | 0%      | 0%      | 0%      | 0%   | 11%     | 13%     | 0%      | 0%              | 0.00%   |           | Romania        | 1          | C             | n.a.           | n.a.     | n.a.      | n.a.    | n.a.     | n.a.    | n.a.    |           |
| Slovenia       | 98         | 5                            | n.a     | . 0%    | 0%      | 0%   | n.a.    | n.a.    | n.a.    | 2%              | 5.10%   |           | Slovenia       | 104        | 3             | 3 0%           | 0%       | n.a.      | n.a.    | n.a.     | n.a.    | 2.9%    |           |
| Spain          | 114        | 37                           | 11%     | 23%     | 32%     | 46%  | 53%     | 61%     | 45%     | 33%             | 32.46%  |           | Spain          | 117        | 44            | 50%            | 47%      | 53%       | 59%     | 35%      | 30%     | 37.6%   |           |
| Sweden         | 113        | 21                           | 24%     | 24%     | 17%     | 12%  | 14%     | 12%     | 14%     | 11%             | 18.58%  | ======    | Sweden         | 72         | 9             | 16%            | 16%      | 7%        | 13%     | 17%      | 17%     | 12.5%   |           |
| United Kingdom | 229        | 59                           | 7%      | 19%     | 16%     | 14%  | 15%     | 10%     | 12%     | 21%             | 25.76%  | _=        | United Kingdom | 208        | 28            | 3 10%          | 12%      | 16%       | 5%      | 7%       | 16%     | 13.5%   |           |
| Total          | 2,435      | 252                          | 8.4%    | 12.9%   | 11.2%   | 10.0%  | 16.5%   | 16.4%   | 15.3%   | 11.1%           | 10.3%   |           | Total          | 1529       | 139           | 19.0%          | 17.2%    | 23.3%     | 21.4%   | 15.4%    | 11.5%   | 9.1%    |           |

Table 10 – Missing Hazmat EU Departure and non-EU Departure notifications by Member State and by reporting period<sup>2</sup>

Highlighting those values not complying with the IFCD

<sup>&</sup>lt;sup>2</sup> Percentages are employed to allow MSs to verify their trends in a more user friendly way. Percentages should be disregarded for those MSs with a low number of samples employed.

| Member State   | Hazmat Details | MRS Details     | Waste Details   | Security Details |
|----------------|----------------|-----------------|-----------------|------------------|
| Belgium        | Available      | Available       | Available       | Available        |
| Bulgaria       | Available      | -               | Available       | Available        |
| Croatia        | Available      | Available       | Available       | Available        |
| Cyprus         | Available      | -               | Available       | Available        |
| Denmark        | Available      | Available       | Available       | Available        |
| Estonia        | Available      | Unavailable     | Available       | Available        |
| Finland        | Available      | Available       | Available       | Available        |
| France         | Available      | Available       | Available       | Available        |
| Germany        | Available      |                 | Available       | Available        |
| Greece         | Available      |                 | Not implemented | Not implemented  |
| Iceland        | Available      | Available       | Available       | Available        |
| Ireland        | Available (2)  | Not implemented | Available       | Available        |
| Italy          | Available      | Available       | Available       | Available        |
| Latvia         | Available      |                 | Available       | Available        |
| Lithuania      | Available      | -               | Available       | Available        |
| Malta          | Available      | -               | Available       | Available        |
| Netherlands    | Available      | -               | Available       | Available        |
| Norway         | Available      | Not implemented | Available (2)   | Available        |
| Poland         | Available      | Available       | Available       | Available        |
| Portugal (1)   | Unavailable    | Unavailable     | Not implemented | Not implemented  |
| Romania        | Available      |                 | Available       | Available        |
| Slovenia       | Available      | Available       | Available       | Available        |
| Spain          | Available      | Available       | Available (2)   | Available        |
| Sweden         | Available      |                 | Available       | Available        |
| United Kingdom | Available (3)  | Available       | Available (3)   | Available (3)    |

<sup>(1)</sup> Data provided in V2 format

Table 11 – Availability of the detailed part of notifications on 28 March 2018

<sup>(2)</sup> Response information not available or incomplete

<sup>(3)</sup> Not available/implemented for the system of port of Gibraltar

|                | Januar                     | y 2018                | Previous and Current Reporting Periods - Notifications Rejected (%) |                 |              |                 |              |                 |              |                 |              |                 |           |
|----------------|----------------------------|-----------------------|---|-----------------|--------------|-----------------|--------------|-----------------|--------------|-----------------|--------------|-----------------|-----------|
| Member State   | Port Plus<br>Notifications | Port Plus<br>Rejected | August<br>2013  | January<br>2014 | July<br>2014 | January<br>2015 | July<br>2015 | January<br>2016 | July<br>2016 | January<br>2017 | July<br>2017 | January<br>2018 | Evolution |
| Belgium        | 28,132                     | -                     | 0.02%   | 0.02%           | 0.04%        | 0.00%           | 0.14%        | 0.09%           | 0.42%        | 0.01%           | 0.01%        | 0.00%           |           |
| Bulgaria       | 1,807                      | 3                     | 0.09%   | 0.77%           | 0.59%        | 0.11%           | 0.48%        | 0.58%           | 0.14%        | 0.00%           | 0.59%        | 0.17%           |           |
| Croatia        | 1,255                      | 1                     | 0.00%   | 0.00%           | 0.00%        | 0.70%           | 0.80%        | 0.55%           | 0.07%        | 0.00%           | 0.02%        | 0.08%           |           |
| Cyprus         | 4,068                      | 14                    | 0.55%   | 1.24%           | 0.48%        | 0.55%           | 0.47%        | 0.20%           | 1.60%        | 1.09%           | 0.00%        | 0.34%           |           |
| Denmark        | 7,143                      | 27                    | 0.71%   | 0.55%           | 0.64%        | 0.88%           | 15.46%       | 5.07%           | 15.04%       | 6.61%           | 1.10%        | 0.38%           | I-I-      |
| Estonia        | 5,315                      | 6                     | 2.16%   | 0.38%           | 0.15%        | 0.40%           | 1.67%        | 0.19%           | 0.03%        | 19.03%          | 0.04%        | 0.11%           |           |
| Finland        | 33,072                     | 442                   | 0.66%   | 1.82%           | 2.65%        | 4.71%           | 8.39%        | 6.69%           | 2.86%        | 1.78%           | 0.50%        | 1.32%           |           |
| France         | 24,845                     | 41                    | 1.20%   | 0.70%           | 3.22%        | 1.81%           | 1.42%        | 1.02%           | 0.15%        | 0.16%           | 0.33%        | 0.16%           |           |
| Germany        | 25,812                     | 296                   | 0.02%   | 0.07%           | 0.18%        | 0.22%           | 6.51%        | 3.69%           | 2.15%        | 1.88%           | 1.18%        | 1.13%           |           |
| Greece         | 19,695                     | 111                   | 0.18%   | 0.09%           | 0.11%        | 0.04%           | 0.04%        | 0.04%           | 0.05%        | 0.75%           | 0.48%        | 0.56%           |           |
| Iceland        | 670                        | -                     | 0.00%   | 0.00%           | 0.63%        | 0.00%           | 17.31%       | 0.00%           | 0.00%        | 0.00%           | 0.06%        | 0.00%           |           |
| Ireland        | 4,984                      | 32                    | 0.27%   | 0.54%           | 0.20%        | 0.68%           | 0.18%        | 0.28%           | 0.70%        | 0.68%           | 0.21%        | 0.64%           |           |
| Italy          | 37,175                     | 4                     | 0.11%   | 0.11%           | 0.10%        | 0.16%           | 0.08%        | 0.19%           | 0.02%        | 0.05%           | 0.03%        | 0.01%           |           |
| Latvia         | 4,887                      | 18                    | 0.36%   | 0.23%           | 0.73%        | 0.00%           | 0.35%        | 1.18%           | 0.35%        | 0.90%           | 0.49%        | 0.37%           |           |
| Lithuania      | 3,829                      | 2                     | 0.76%   | 2.20%           | 0.00%        | 0.00%           | 0.00%        | 0.17%           | 0.00%        | 0.06%           | 0.22%        | 0.05%           |           |
| Malta          | 7,714                      | 77                    | 3.63%   | 1.80%           | 1.07%        | 0.86%           | 0.26%        | 0.80%           | 0.68%        | 12.82%          | 1.75%        | 0.99%           |           |
| Netherlands    | 59,305                     | 851                   | 0.57%   | 0.46%           | 0.47%        | 0.15%           | 1.71%        | 0.09%           | 0.70%        | 8.30%           | 9.94%        | 1.41%           |           |
| Norway         | 46,462                     | 2                     | 4.16%   | 0.00%           | 0.06%        | 0.01%           | 0.13%        | 0.05%           | 0.39%        | 0.03%           | 0.02%        | 0.00%           |           |
| Poland         | 13,906                     | 4                     | 1.52%   | 0.47%           | 0.00%        | 0.10%           | 0.14%        | 0.29%           | 0.01%        | 0.04%           | 0.16%        | 0.03%           |           |
| Portugal       | 7,026                      | 106                   | 0.15%   | 0.29%           | 0.22%        | 0.29%           | 0.45%        | 0.45%           | 2.41%        | -               | 0.93%        | 1.49%           |           |
| Romania        | 2,322                      | 5                     | 1.02%   | 13.66%          | 1.19%        | 0.46%           | 0.05%        | 1.02%           | 1.00%        | 0.07%           | 0.00%        | 0.21%           |           |
| Slovenia       | 963                        | 2                     | 0.43%   | 0.15%           | 0.23%        | 0.82%           | 0.83%        | 1.06%           | 1.56%        | 1.58%           | 0.81%        | 0.21%           |           |
| Spain          | 110,064                    | 1,164                 | 0.01%   | 0.20%           | 0.02%        | 0.03%           | 9.15%        | 0.98%           | 0.67%        | 1.00%           | 0.86%        | 1.05%           | _         |
| Sweden         | 31,797                     | 27                    | 0.14%   | 2.13%           | 0.63%        | 0.15%           | 0.07%        | 0.07%           | 0.62%        | 0.92%           | 0.10%        | 0.08%           |           |
| United Kingdom | 55,282                     | 14                    | 0.05%   | 0.17%           | 0.12%        | 0.04%           | 0.13%        | 0.12%           | 0.15%        | 0.03%           | 0.02%        | 0.03%           |           |
| Total          | 537,530                    | 3,249                 | 0.66%   | 0.72%           | 0.55%        | 0.56%           | 3.31%        | 1.17%           | 0.90%        | 1.91%           | 1.40%        | 0.60%           | _         |

Table 12 – PortPlus notification rejections and evolution

Highlighting those values not complying with the IFCD in red (rejected notifications should be less than 0.1%, as indicated in Section 4.5 of the IFCD)

SSN/LRIT 3.5.1 / Version: 1.0 / Date: 23.03.2018

| Rule  | Status message describing the reason for rejection (if more than one reason is quoted, all of them apply for the specific notification)   | Rejections | Expected actions                              |
|-------|---|------------|---|
| Group | o 1: the "Time" logic is not respected (relations between ETAs and ETDs, etc.)  |            |   |
| R01   | A Port Plus notification must have ETAtoNextPort subsequent to the ETDFromPortOfCall.ETAtoNextPort greater than ETDFromPortOfCall.  | 1,019      | To be corrected by MSs                        |
| R02   | A Port Plus notification must have ETAtoNextPort subsequent to the ATDFromPortOfCall: ETAtoNextPort greater than ATDPortOfCall  | _          | To be corrected by MSs                        |
| R03   | A Port Plus notification must have ETAToPortOfCall prior to the ETDFromPortOfCall: ETAToPortOfCall less than ETDFromPortOfCall.   | 261        | To be corrected by MSs                        |
| R04   | A Port Plus notification must have ATAToPortOfCall prior to the actual departure time from port of call: ATAPortOfCall less than ATDPortOfCall.   |            | To be corrected by MSs                        |
| R05   | A new Port Plus notification having ATAToPortOfCall 1 year prior to the time received could not be accepted.  |            | To be corrected by MSs                        |
| R06   | An update Port Plus notification having ATAToPortOfCall 1 year prior to the time received which is different from ATAToPortOfCall recorded in the corresponding voyage could not be accepted. |            | To be corrected by MSs and in the Central SSN |
| Group | 2: missing "mandatory" information  |            |   |
| R07   | A Port Plus notification must have ETDFromPortOfCall unless PortOfCall = "ZZCAN" or ATDFromPortOfCall is provided.  | 19         | To be corrected by MSs and in the Central SSN |
| R08   | A Port Plus notification must have EtaToPortOfCall unless PortOfCall = "ZZCAN" or ATAToPortOfCall is provided.  | 83         | To be corrected by MSs                        |
| R09   | A Port Plus notification with hazmat EUDeparture must have a NextPort.  | 2          | To be corrected by MSs                        |
| R10   | A Port Plus notification with hazmat EUDeparture must have ETAToNextPort.   | -          | To be corrected by MSs                        |
| R11   | A Port Plus notification having PortOfCall = 'ZZCAN' can only be accepted if no ATAToPortOfCall/ ATDFromPortOfCall has been provided up to now.   | 57         | To be corrected by MSs                        |
| R12   | A Port Plus notification including the PreArrival3DaysNotificationDetails element must have at least one of its attributes.   | -          | To be corrected by MSs                        |
| R13   | A Port Plus notification including the HazmatNotificationInfoNonEUDepartures must have quoted the POBVoyageTowardsPortOfCall.   | 13         | To be corrected by MSs                        |
| R14   | ATAToPortOfCall should be provided when ATDFromPortOfCall is reported.  | 110        | To be corrected by MSs                        |
| R15   | A Port Plus notification including the HazmatNotificationInfoEUDepartures element must have quoted the POBVoyageTowardsNextPort.  |            | To be corrected by MSs                        |
| R16   | Arrival Notification Details once provided should be repeated in all update messages.   |            | To be corrected by MSs                        |
| R17   | Departure Notification Details once provided should be repeated in all update messages.   | 125        | To be corrected by MSs                        |

Table 13 – Number of rejections by cause and expected actions from Member States

| Rule  | Status message describing the reason for rejection (if more than one reason is quoted, all of them apply for the specific notification)                          | Rejections | Expected actions                              |
|-------|--|------------|---|
| Group | 3: invalid values or references (IMO, MMSIs, LOCODES, ShipCallIds, etc.)   |            |   |
| R18   | The message identified by MSRefld [MSREFID] has already been registered in SSN (Sent by [SENDER])  | 427        | To be corrected by MSs and in the Central SSN |
| R19   | [SENDER]: A port plus notification with the specified shipCallId [SHIPCALLID] has already been registered in SSN by [SENDER]                                     | 63         | To be corrected by MSs and in the Central SSN |
| R20   | LastPort Locode [LOCODE] is not technically correct. PortOfCall Locode [LOCODE] is not technically correct. NextPort Locode [LOCODE] is not technically correct. | 253        | To be corrected by MSs                        |
| R21   | PortOfCall Locode [LOCODE] is not permitted. Verify your access rights as Portplus Notifier.   |            | To be corrected by MSs                        |
| R22   | The IMO number [IMONumber] is not valid  | 20         | To be corrected by MSs                        |
| R23   | The Port Plus notification having PortOfCall = 'ZZCAN' and shipCallId [SHIPCALLID] is invalid because no voyage was found with the specified shipCallId.         | 33         | To be corrected by MSs                        |
| R24   | PobVoyageTowardsPortOfCall has an invalid value  | -          | To be corrected by MSs                        |
| R25   | A Port Plus notification having PortOfCall equal to 'ZZCAN' must have UpdateStatus='U'.  | 6          | To be corrected by MSs                        |
| R26   | The UpdateNotifications information is not compatible with the updateStatus [U].   | 4          | To be corrected by MSs                        |
| R27   | MID [MID] does not identify any Flag according to the ITU list of MIDs.  | 11         | To be corrected by MSs                        |
| R28   | Invalid message. A port plus notification with the specified shipCallId [SHIPCALLID] has already been registered with different Vessel [VESSEL1] - [VESSEL2].    | 41         | To be corrected by MSs                        |
| R29   | At least one contact detail must be provided (Phone, Fax or Email)   | 397        | To be corrected by MSs                        |
| R30   | The notification must have quoted at least one of IMO or MMSI numbers  | -          | To be corrected by MSs                        |
| R31   | The phone number is invalid, The fax number is invalid   | -          | To be corrected by MSs                        |
| R32   | The email [EMAIL] is invalid   | 4          | To be corrected by MSs                        |
| R33   | Test vessel only allows IMO 9999999 and MMSI 999999999   | -          | To be corrected by MSs                        |
| R34   | The first name is invalid  | -          | To be corrected by MSs                        |

Table 13 – Number of rejections by cause and expected actions from Member States (cont.)

Annex IV: SSN - THETIS interface

|                    |                        |                    | Current repo               |                     |                        |                         | s reporting p         |              |                 |              |                 |              |                 |              |
|--------------------|------------------------|--------------------|----------------------------|---------------------|------------------------|-------------------------|-----------------------|--------------|-----------------|--------------|-----------------|--------------|-----------------|--------------|
| Member State       |                        | _                  |                            |                     |                        |                         |                       |              |                 |              | ATD missing     |              | ı               |              |
|                    | Shipcalls<br>under PSC | Existing ATA & ATD | Existing ATA (missing ATD) | Missing ATA&<br>ATD | ATA & ATD provided [%] | Only ATD<br>missing [%] | ATA & ATD missing [%] | July<br>2017 | January<br>2017 | July<br>2016 | January<br>2016 | July<br>2015 | January<br>2015 | July<br>2014 |
| Belgium            | 1,676                  | 1,674              | 2                          | -                   | 99.9%                  | 0.1%                    | 0.0%                  | 0.0%         | 0.0%            | 0.1%         | 0.1%            | 0.6%         | 0.7%            | 0.2%         |
| Bulgaria           | 186                    | 186                | -                          | -                   | 100.0%                 | 0.0%                    | 0.0%                  | 0.0%         | 0.0%            | 0.0%         | 0.5%            | 0.0%         | 0.5%            | 0.8%         |
| Croatia            | 144                    | 144                | -                          | -                   | 100.0%                 | 0.0%                    | 0.0%                  | 0.0%         | 0.0%            | 0.0%         | 0.0%            | 0.9%         | 0.0%            | -            |
| Cyprus             | 203                    | 203                | -                          | -                   | 100.0%                 | 0.0%                    | 0.0%                  | 0.0%         | 0.0%            | 0.0%         | 0.0%            | 0.0%         | 0.0%            | 0.0%         |
| Denmark            | 1,560                  | 1,497              | 59                         | 4                   | 96.0%                  | 3.8%                    | 0.3%                  | 1.2%         | 0.7%            | 1.6%         | 5.3%            | 6.7%         | 14.2%           | 16.0%        |
| Estonia            | 393                    | 391                | -                          | 2                   | 99.5%                  | 0.0%                    | 0.5%                  | 0.3%         | 0.5%            | 0.8%         | 0.0%            | 0.2%         | 0.0%            | 0.0%         |
| Finland            | 1,358                  | 1,211              | 12                         | 135                 | 89.2%                  | 0.9%                    | 9.9%                  | 3.1%         | 5.4%            | 2.6%         | 4.4%            | 3.5%         | 3.6%            | 2.7%         |
| France             | 1,601                  | 1,599              | -                          | 2                   | 99.9%                  | 0.0%                    | 0.1%                  | 0.6%         | 0.5%            | 0.5%         | 4.6%            | 14.2%        | 1.1%            | 2.3%         |
| Germany            | 3,198                  | 3,035              | 23                         | 140                 | 94.9%                  | 0.7%                    | 4.4%                  | 7.9%         | 5.8%            | 3.9%         | 6.2%            | 18.2%        | 28.9%           | 30.5%        |
| Greece             | 1,402                  | 1,341              | 27                         | 34                  | 95.6%                  | 1.9%                    | 2.4%                  | 2.8%         | 0.9%            | 0.4%         | 1.3%            | 0.1%         | 5.7%            | 7.4%         |
| Iceland            | 198                    | 188                | -                          | 10                  | 94.9%                  | 0.0%                    | 5.1%                  | 7.5%         | 8.8%            | 7.9%         | 10.3%           | 10.7%        | 10.4%           | 11.0%        |
| Ireland            | 918                    | 915                | 1                          | 2                   | 99.7%                  | 0.1%                    | 0.2%                  | 0.1%         | 0.0%            | 0.5%         | 0.1%            | 0.0%         | 0.2%            | 0.0%         |
| Italy              | 2,079                  | 2,069              | 5                          | 5                   | 99.5%                  | 0.2%                    | 0.2%                  | 1.4%         | 0.3%            | 2.6%         | 0.3%            | 0.6%         | 0.1%            | 0.3%         |
| Latvia             | 483                    | 483                | -                          | -                   | 100.0%                 | 0.0%                    | 0.0%                  | 0.2%         | 0.0%            | 0.2%         | 0.0%            | 0.0%         | 0.2%            | 0.4%         |
| Lithuania          | 270                    | 270                | -                          | -                   | 100.0%                 | 0.0%                    | 0.0%                  | 0.0%         | 0.0%            | 0.0%         | 0.0%            | 0.4%         | 0.0%            | 0.0%         |
| Malta              | 247                    | 243                | 4                          | -                   | 98.4%                  | 1.6%                    | 0.0%                  | 6.0%         | 5.8%            | 0.7%         | 7.0%            | 8.4%         | 11.1%           | 5.7%         |
| Netherlands        | 2,338                  | 2,316              | 16                         | 6                   | 99.1%                  | 0.7%                    | 0.3%                  | 0.6%         | 1.1%            | 0.7%         | 1.4%            | 1.7%         | 0.3%            | 0.8%         |
| Norway             | 3,045                  | 2,575              | 226                        | 244                 | 84.6%                  | 7.4%                    | 8.0%                  | 9.0%         | 8.6%            | 19.5%        | 16.5%           | 19.9%        | 20.8%           | 25.7%        |
| Poland             | 983                    | 983                | -                          | -                   | 100.0%                 | 0.0%                    | 0.0%                  | 0.1%         | 0.0%            | 0.0%         | 0.0%            | 0.0%         | 6.3%            | 5.6%         |
| Portugal           | 562                    | 548                | 7                          | 7                   | 97.51%                 | 1.25%                   | 1.25%                 | 5.7%         | -               | 3.5%         | 1.8%            | 4.5%         | 0.8%            | 1.3%         |
| Romania            | 260                    | 258                | 1                          | 1                   | 99.2%                  | 0.4%                    | 0.4%                  | 0.5%         | 0.7%            | 1.7%         | 1.2%            | 0.0%         | 0.9%            | 4.1%         |
| Slovenia           | 105                    | 105                | -                          | -                   | 100.0%                 | 0.0%                    | 0.0%                  | 0.9%         | 1.2%            | 1.4%         | 0.0%            | 0.0%         | 0.0%            | 0.0%         |
| Spain              | 7,563                  | 7,426              | 24                         | 113                 | 98.2%                  | 0.3%                    | 1.5%                  | 8.7%         | 0.5%            | 0.7%         | 1.2%            | 2.5%         | 2.2%            | 3.3%         |
| Sweden             | 2,628                  | 2,529              | 40                         | 59                  | 96.2%                  | 1.5%                    | 2.2%                  | 1.5%         | 1.8%            | 6.8%         | 4.1%            | 2.9%         | 2.5%            | 9.5%         |
| United Kingdom     | 5,762                  | 5,701              | 33                         | 28                  | 98.9%                  | 0.6%                    | 0.5%                  | 1.7%         | 0.9%            | 13.1%        | 1.7%            | 1.9%         | 2.2%            | 2.6%         |
| Total              | 39,162                 | 37,890             | 480                        | 792                 | 96.8%                  | 1.2%                    | 2.0%                  | 3.5%         | 2.0%            | 4.9%         | 3.7%            | 5.5%         | 7.1%            | 8.4%         |
| TOTAL July2017     | 50,666                 | 47,130             | 1,781                      | 1,755               | 93.0%                  | 3.5%                    | 3.5%                  |              |                 |              |                 |              |                 |              |
| TOTAL January 2017 | 43,269                 | · · ·              | 963                        |                     | 95.7%                  | 2.2%                    | 2.0%                  |              |                 |              |                 |              |                 |              |
| TOTAL July 2016    | 54,744                 | · · ·              | 1,975                      |                     | 91.4%                  | 3.6%                    | 4.9%                  |              |                 |              |                 |              |                 |              |
| TOTAL January 2016 | 33,417                 | -                  | 1,596                      | -                   | 91.5%                  | 4.8%                    | 3.7%                  |              |                 |              |                 |              |                 |              |
| TOTAL July 2015    | 45,292                 |                    | 3,231                      | 2,469               | 87.4%                  | 7.1%                    | 5.5%                  |              |                 |              |                 |              |                 |              |
| TOTAL January 2015 | 36,421                 | 32,536             | 1,303                      |                     | 89.3%                  | 3.6%                    | 7.1%                  |              |                 |              |                 |              |                 |              |
| TOTAL July 2014    | 47.672                 |                    | 1,994                      | 4.019               | 87.4%                  | 4.2%                    | 8.4%                  |              |                 |              |                 |              |                 |              |
| 10 Includy 2014    | 47,072                 | 41,033             | 1,334                      | 4,013               | 07.4/0                 | 4.2/0                   | 0.4/0                 |              |                 |              |                 |              |                 |              |

Table 14 – Availability of ATA and ATD information in SSN for vessels falling within the scope of Directives 2009/16/EC and 1999/35/EC <sup>3</sup>

<sup>&</sup>lt;sup>3</sup> ATA is a key element of THETIS, and ship calls missing this attribute are discarded (i.e. updates of new calls including ATD without ATA).

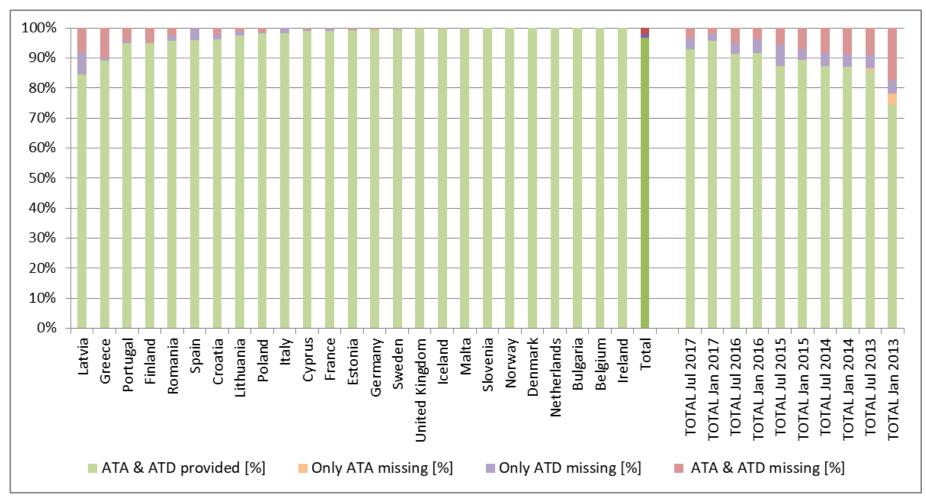


Figure 3 – Availability of ATA and ATD information in SSN for vessels falling within the scope of Directives 2009/16/EC and 1999/35/EC (corresponding to Table 15)

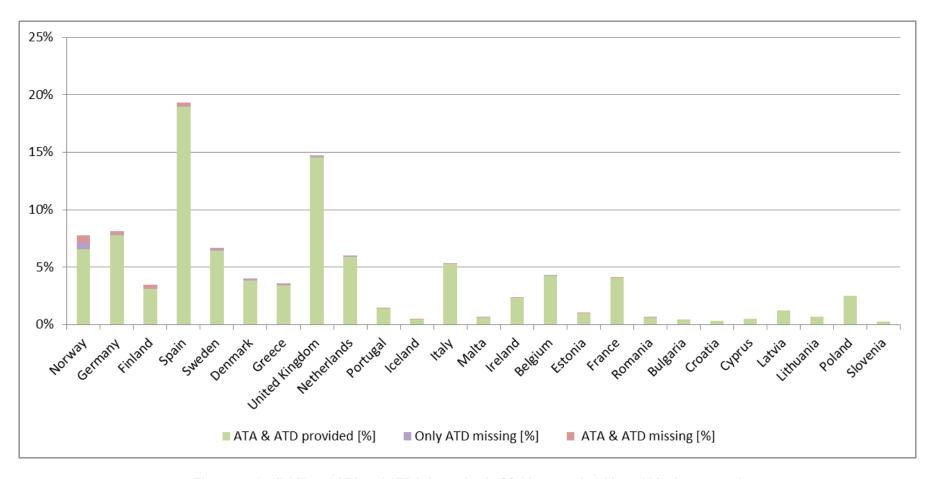


Figure 4 – Availability of ATA and ATD information in SSN for vessels falling within the scope of Directives 2009/16/EC and 1999/35/EC (corresponding to Table 15) – figures represent the percentage of overall EU ship calls Reporting period: January 2018

|                | A                       | CTUAL TIME OF A       | RRIVAL PROVIDE               | D                           |
|----------------|-------------------------|-----------------------|------------------------------|-----------------------------|
| Member State   | More than 3h in advance | Within 3 hours period | Between 3 and 72 hours after | More than 72<br>hours after |
| Belgium        | 0%                      | 98%                   | 2%                           | 0%                          |
| Bulgaria       | 0%                      | 98%                   | 2%                           | 0%                          |
| Croatia        | 0%                      | 65%                   | 32%                          | 3%                          |
| Cyprus         | 1%                      | 92%                   | 8%                           | 0%                          |
| Denmark        | 0%                      | 60%                   | 36%                          | 4%                          |
| Estonia        | 0%                      | 94%                   | 6%                           | 0%                          |
| Finland        | 0%                      | 86%                   | 14%                          | 0%                          |
| France         | 0%                      | 97%                   | 3%                           | 0%                          |
| Germany        | 0%                      | 87%                   | 11%                          | 1%                          |
| Greece         | 1%                      | 76%                   | 21%                          | 2%                          |
| Iceland        | 0%                      | 100%                  | 0%                           | 0%                          |
| Ireland        | 0%                      | 95%                   | 3%                           | 2%                          |
| Italy          | 0%                      | 91%                   | 7%                           | 2%                          |
| Latvia         | 0%                      | 95%                   | 5%                           | 0%                          |
| Lithuania      | 0%                      | 92%                   | 8%                           | 0%                          |
| Malta          | 0%                      | 94%                   | 5%                           | 2%                          |
| Netherlands    | 0%                      | 98%                   | 2%                           | 0%                          |
| Norway         | 0%                      | 84%                   | 14%                          | 2%                          |
| Poland         | 0%                      | 97%                   | 3%                           | 0%                          |
| Portugal       | 0%                      | 86%                   | 10%                          | 4%                          |
| Romania        | 0%                      | 99%                   | 1%                           | 1%                          |
| Slovenia       | 0%                      | 96%                   | 4%                           | 0%                          |
| Spain          | 0%                      | 84%                   | 14%                          | 3%                          |
| Sweden         | 0%                      | 92%                   | 7%                           | 0%                          |
| United Kingdom | 0%                      | 89%                   | 10%                          | 1%                          |
| Total          | 0.1%                    | 88.3%                 | 10.2%                        | 1.4%                        |

| AC1                     | ACTUAL TIME OF DEPARTURE PROVIDED |                              |                             |  |  |  |  |  |  |  |  |  |
|-------------------------|-----------------------------------|------------------------------|-----------------------------|--|--|--|--|--|--|--|--|--|
| More than 3h in advance | Within 3 hours period             | Between 3 and 72 hours after | More than 72<br>hours after |  |  |  |  |  |  |  |  |  |
| 0%                      | 98%                               | 1%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 99%                               | 1%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 85%                               | 15%                          | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 90%                               | 10%                          | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 69%                               | 29%                          | 2%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 99%                               | 1%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 87%                               | 13%                          | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 91%                               | 8%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 91%                               | 8%                           | 1%                          |  |  |  |  |  |  |  |  |  |
| 1%                      | 83%                               | 15%                          | 2%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 100%                              | 0%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 94%                               | 4%                           | 1%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 88%                               | 9%                           | 3%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 95%                               | 5%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 91%                               | 9%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 97%                               | 3%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 98%                               | 2%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 83%                               | 16%                          | 2%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 97%                               | 3%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 87%                               | 9%                           | 4%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 100%                              | 0%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 96%                               | 4%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 82%                               | 15%                          | 2%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 91%                               | 9%                           | 0%                          |  |  |  |  |  |  |  |  |  |
| 0%                      | 92%                               | 7%                           | 1%                          |  |  |  |  |  |  |  |  |  |
| 0.1%                    | 88.8%                             | 9.9%                         | 1.3%                        |  |  |  |  |  |  |  |  |  |

Table 15 –Timeliness of ATA and ATD reporting