

Report of the TAF TSI Implementation for 2021

RU/IM Telematics Joint Sector Group (JSG)

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Document history

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EXECUTIVE SUMMARY

This TAF TSI implementation report 2021 summarizes the results received via the JSG Reporting Tool in November/December 2021 and thus shows the status of implementation by the end of 2021.

For this reporting session a total of 762 invitations were sent out and 323 responses were received from 28 countries across Europe, resulting to an overall response rate of 42 %.

Together with responses taken from the 2020 reporting session, a total of 471 company responses were taken into consideration, which represents a rise of almost 20 % compared to the previous reporting session and the highest data set ever. Additional responses came mainly from RUs-F and Wks and especially Czech Republic, Germany, Italy and Poland managed a very high participation.

The questionnaire covers all functions mandated by the TAF and TAP TSI. Thus, this 2021 report can be considered as complete.

68 questions in 17 question groups are a big number of questions. But not all companies must answer all questions and could do it for the first time in their native language. The questionnaire was translated into 18 European languages with the help of National Contact Points (NCPs).

Looking at the different TAF TSI functions, the following facts can be observed:

- Most IMs reported to have completed the initial upload of Primary Location Codes on their network. Update, maintenance and use of codes are not part of this report.
- 337 companies or 84 % of the companies in the reporting are identified by Company Code, which means a rise of 20 % compared to the previous reporting session.
- For the Common Interface a positive trend is visible for all type of companies. RUs-F report the highest growth of plus 46 %.
- About 19 % (77) of the companies have started and about 16 % (65) have finished the implementation of New Identifiers. So far only 6 IM's report complete implementation of this function.
- The number of RUs-F having introduced Path Request messages has increased, while it did not improve for IMs, both still on a low level, however. 84 companies are in the process of implementing the function.
- Implementation of Path Details is reported to be very similar to the Path Request function, with a slightly better complete implementation of almost 30 % (73 companies).
- 12 countries reported not implementing Train Ready messages based on TAF/TAP standard but using domestic solutions. 42 RUs-F and 8 IMs report complete implementation of the function.
- The Train Running Information is widely used in operations management and 26 IMs and 79 RUs-F reported full implementation. In addition, 25 companies which have not yet complete implementation use the Train Information System (TIS) a common sector tool managed by RNE.
- Evolution of Train Running Interruption Message is positive still on a low level for both IMs and RUs-F. Most companies have not yet started implementation, 50 companies are in implementation and 64 have completed TRIM.
- Implementation of Train Running Forecast is on a similar level as TRIM with 58 (23%) companies reporting complete implementation of TRF function.
- Implementation of Train Composition Message is ongoing at a good pace (+ 6 % versus 2020) at IMs and RUs-F, with 18 IM's and 73 RUs-F reporting completed TCM.
- With 199 company feedback almost half (102) have not yet started Consignment Note Data function. 52 are in development and 45 have finished the task. Some companies indicate using the common sector tool ORFEUS, but the implementation status is not included in the displayed data.

- Implementation is ongoing for the TAF Wagon Movement messages and also in the common sector tool ISR. 44 companies reporting complete implementation.
- Shipment ETA function is reported to be finished by 37 companies (18 %) and ongoing in 53 companies (26 %).
- A large number Wks fulfil the Rolling Stock Reference Database functionality via the common sector tool RSRD2. There are 113 Wks having RSRD in production by the end of 2021.

Many companies participating in the 2021 reporting session gave information, why they did not yet start implementation of several TAF TSI functions. ‘Technical reasons’ and ‘insufficient awareness’ were mentioned most by the companies. The evolution of insufficient awareness of TAF/TAP requirements is steadily growing since 2017 to the absolute number of 330 companies declaring ‘Insufficient awareness of TAF/TAP TSI requirements’. Dedicated information sessions should be initiated as a mitigation measure. ERA should indicate NCPs those companies in their countries to raise awareness of TAF/TAP requirements.

The DI for the different TAF functions in the present report shows generally a mixed development:

- positive trends for IM functions PLC, CC, CI, PD, TRI, TRIM, TRF and TCM
- positive trends for all RUs-F functions except CC (unchanged)
- positive trends for all WK function except CC (unchanged)
- negative trends for IM functions NI, PR, TR

More than 42 % of the Companies sent a feedback to the questionnaire. This is a very high participation when compared with the growing number of invitations and results in the biggest data set ever to be considered. However still only a part of the companies invited to participate to the survey deliver feedback. Consequently, the degree of implementation relative to invitations is always considerably lower than the degree of implementation relative to responses. It is likely, that the degree of implementation as set out in this report does not reflect the real situation.

Information from the companies regarding the usage of common tools are not further investigated and only the company self-declaration for each TAF Function is considered in the reporting.

When analysing the status of implementation per countries it is remarkable that many IMs with the longest network plan to implement TSI TAF TAP functions within the next two years.

1. BACKGROUND TO THE ASSIGNMENT

According to Article 5, Section 1, of Commission Regulation (EU) No 1305/2014¹ relating to the Telematics Applications for Freight subsystem (TAF TSI), the European Union Agency for Railways (ERA) shall assess and oversee its implementation.

The Agency has established the ‘TAF TSI Implementation Cooperation Group’ to evaluate the reports of the sector. The remit of this group is monitoring the parameters for RU/IM communication of both TAF and TAP TSIs. Members of the European railway sector are encouraged to submit their reports through the JSG to the Agency.

¹ COMMISSION REGULATION (EU) No 1305/2014 of 11 December 2014 on the technical specification for interoperability relating to the telematics applications for freight subsystem of the rail system in the European Union and repealing the Regulation (EC) No 62/2006 amended by

- Commission Implementing Regulation (EU) 2018/278 of 23 February 2018
- Commission Implementing Regulation (EU) 2019/778 of 16 May 2019
- Commission Implementing Regulation (EU) 2021/541 of 26 March 2021

2. METHODOLOGY

General assumptions

Starting with the 6th Reporting session in 2017, the monitoring of RU/IM functions is being carried out using one common questionnaire for both TAF and TAP TSIs. However, results from the survey are presented in two separate reports.

The progress of implementation of the TAF and TAP TSI has been reported twice a year until 2018. Since 2019 data are collected once a year for RU/IM communication based on the following assumptions:

- Companies are requested to report per mandatory TAF or TAP TSI function and report the target implementation date if the function is not yet implemented completely.
- The level of fulfilment will be displayed in predetermined percentage steps at 0%, 25%, 50%, 75% and 100%.
- Each message-based function is realized at 100%, if there is at least one implementation of message exchange in production, even if with a single partner only.

The level of fulfilment in terms of percentage steps are defined as follows:

- 0% - Level 1: Not started - Project not launched
- 25% - Level 2: Initiating phase - Implementation plan is available in the company
- 50% - Level 3: Planning phase - Project development
- 75% - Level 4: Executing phase - Pilot project / System testing
- 100% - Level 5: In-Production & Monitor and Control: Finished means Telematics data exchange is implemented

The obligation to meet functions of the TAF and TAP TSI is sometimes limited to specific stakeholders of the railway sector. Evaluation of the results of this survey is therefore stakeholder-specific. For that reason and in accordance with European legislation the following stakeholders are considered:

- Infrastructure Manager (IM)
- Railway Undertaking for Freight transport (RU-F)
- Railway Undertaking for Passenger transport (RU-P)
- Wagon Keeper (WK)
- Allocation Body (AB)

Establishment of this report

The present report also integrates data from wagon keepers using RSRD2 submitted by UIP.

This report summarised the results received via the JSG Reporting Tool² during the 2021 reporting period lasting from 15 November 2021 to 10 December 2021 and thus shows the status of implementation by 31 December 2021. Diagrams in the following chapters of this report show results per RU/IM function summarised in an anonymous way.

² The JSG uses the tool 'EUSurvey' for collecting the data and managing the survey about TAF and TAP RU/IM implementation. 'EUSurvey' is supported by the European Commission's ISA programme, which promotes interoperability solutions for European public administrations.

Table 1 gives an overview about the history of reporting periods.

Report session	Reporting period	Number of questions ³
1 st Report	01.07.2014 - 31.12.2014	21
2 nd Report	01.01.2015 - 30.06.2015	40
3 rd Report	01.07.2015 - 31.12.2015	42
4 th Report	01.01.2016 - 30.06.2016	53
5 th Report	01.07.2016 - 31.12.2016	57
6 th Report TAF/1 st Report TAP	01.01.2017 - 30.06.2017	91
7 th Report TAF/2 nd Report TAP	01.07.2017 - 31.12.2017	65
8 th Report TAF/3 rd Report TAP	01.01.2018 - 30.06.2018	66
9 th Report TAF/4 th Report TAP	01.07.2018 - 31.12.2018	59
2019 Report TAF and TAP	01.01.2019 - 31.12.2019	52
2020 Report TAF and TAP	01.01.2020 - 31.12.2020	68
2021 Report TAF and TAP	01.01.2021 - 31.12.2021	68

Table 1: Reporting periods

The ‘2021 TAF/TAP TSI Implementation Report’ questionnaire contains seventeen question groups, fifteen of which are about the current implementation of TAF and TAP TSI functions:

TAF/TAP TSI functions for RU/IM communication to be implemented/reported per type of company		Type of company				
		IM	RU-F	RU-P	WK	AB
TAF/TAP TSI function	Primary Location Codes (PLC)	X				
	Company Code (CC)	X	X	X	X	X
	Common Interface (CI)	X	X	X	X	X
	New Identifiers (NI)	X	X	X	X	X
	Path Request (PR)	X	X	X		X
	Path Details (PD)	X	X	X		X
	Train Ready (TR)	X	X	X		
	Train Running Information (TRI)	X	X	X		
	Train Running Interrupted Message (TRIM)	X	X	X		
	Train Running Forecast (TRF)	X	X	X		
	Train Composition Message (TCM)	X	X			
	Consignment Note Data (CND)		X			
	Wagon Movement (WM)		X			
	Shipment ETA (ETA)		X			
	Rolling Stock Reference Database (RSRD)				X	

Table 2: TAF/TAP TSI functions as reported per type of company

Two more general question groups intend to find out the actual situation and intentions of companies:

- Company information
- Common Sector Tools in use

The 2021 questionnaire contains messages of all RU/IM functions mandated by the TAF and TAP TSIs and set out in the TAF and TAP masterplan. It was translated into eighteen European languages with the help of the NCPs. The participating companies could choose their native language for replying to the survey.

³ Please note, the questions in the TAF and TAP RU/IM questionnaire are context specific. The number of questions to be responded, depend on the type of company and is not the total number listed in the table 1.

This report was drafted by the Implementation Reporting Group (IRG), the members of which are listed in Annex 1. As a result, it was endorsed at the JSG meeting on 1 February 2022 and published accordingly. It will be presented to the ERA TAF TSI Implementation Cooperation Group on 10 March 2022.

3. PARTICIPATION IN THE 2021 REPORTING SESSION

Responses to the survey

The number of project managers invited to report about the implementation of the TAF TSI and TAP TSI is shown in diagram 1 together with the number of responses received thereof. Since the last report one year ago, invitations and responses have grown again to a new record high.

The 2021 report includes 243 responses provided via the JSG reporting tool and 80 WKs submitted by UIP using RSRD². Feedback to the survey did increase by 21 % compared to 2020.

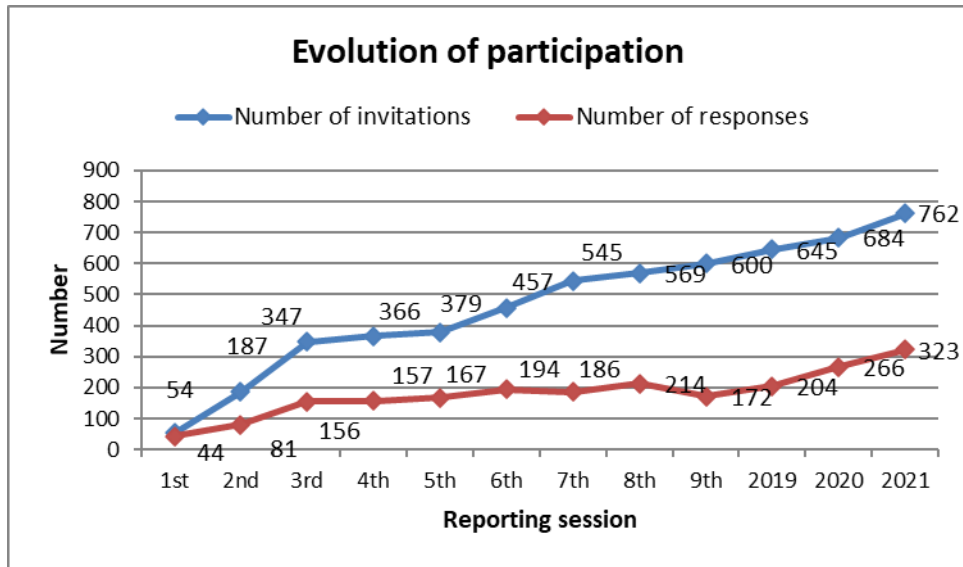


Diagram 1: Evolution of participation over time

Hence, the response rate, calculated as number of responses in relation to number of invitations, has grown to 42,4 % (see diagram 2).

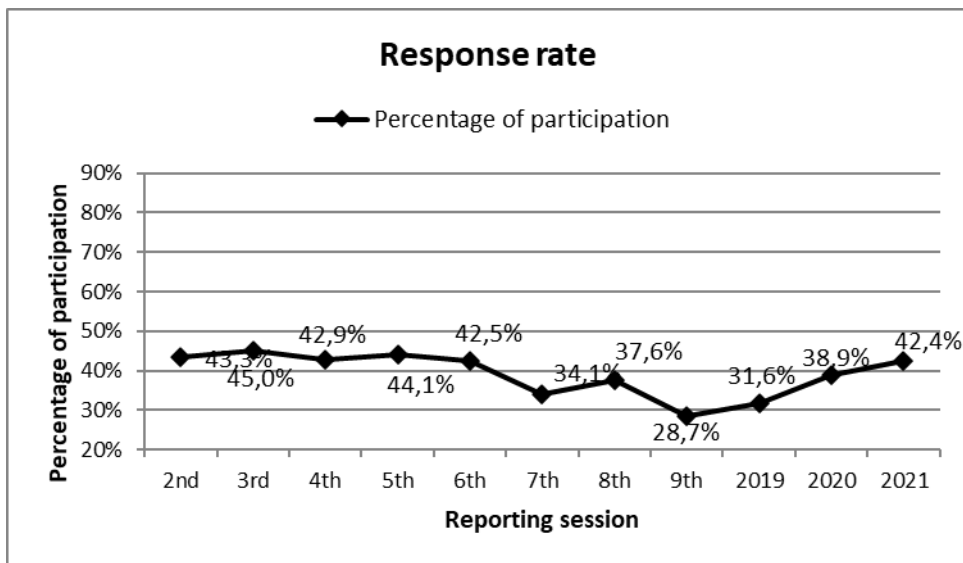


Diagram 2: Evolution of response rate over time

Diagram 3 displays the distribution of all 323 responses per country. The feedback comprises 24 EU Member States plus Serbia, Switzerland, Turkey and United Kingdom.

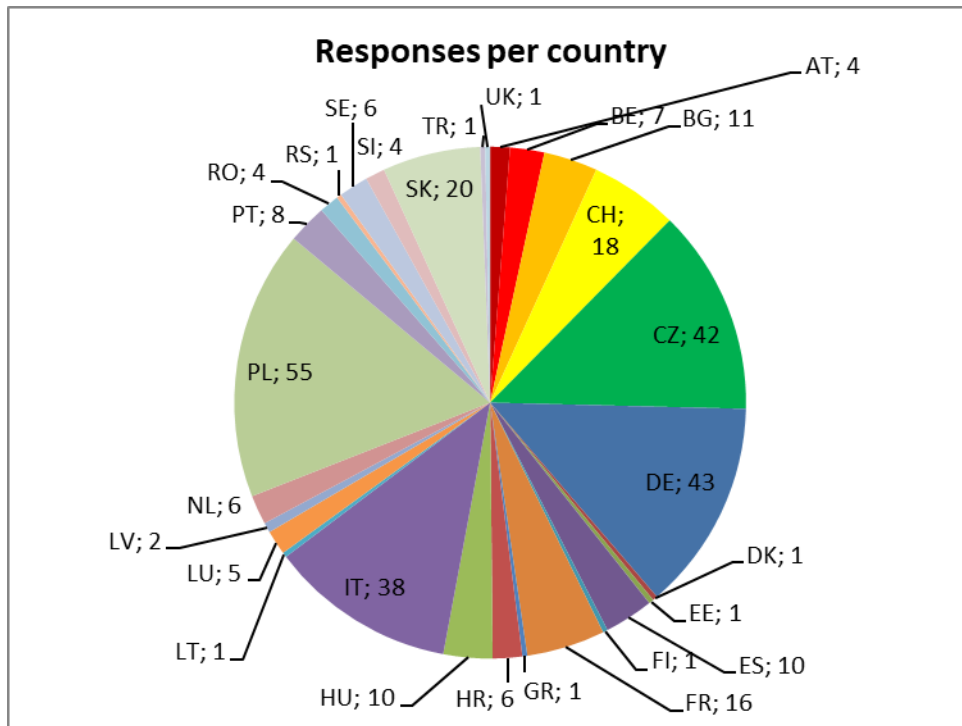


Diagram 3: Number of responses per country

Diagram 4 shows the distribution and the development of responses per country. The total number of responses in the 2021 reporting period is 323, which is 57 more than in the last session.

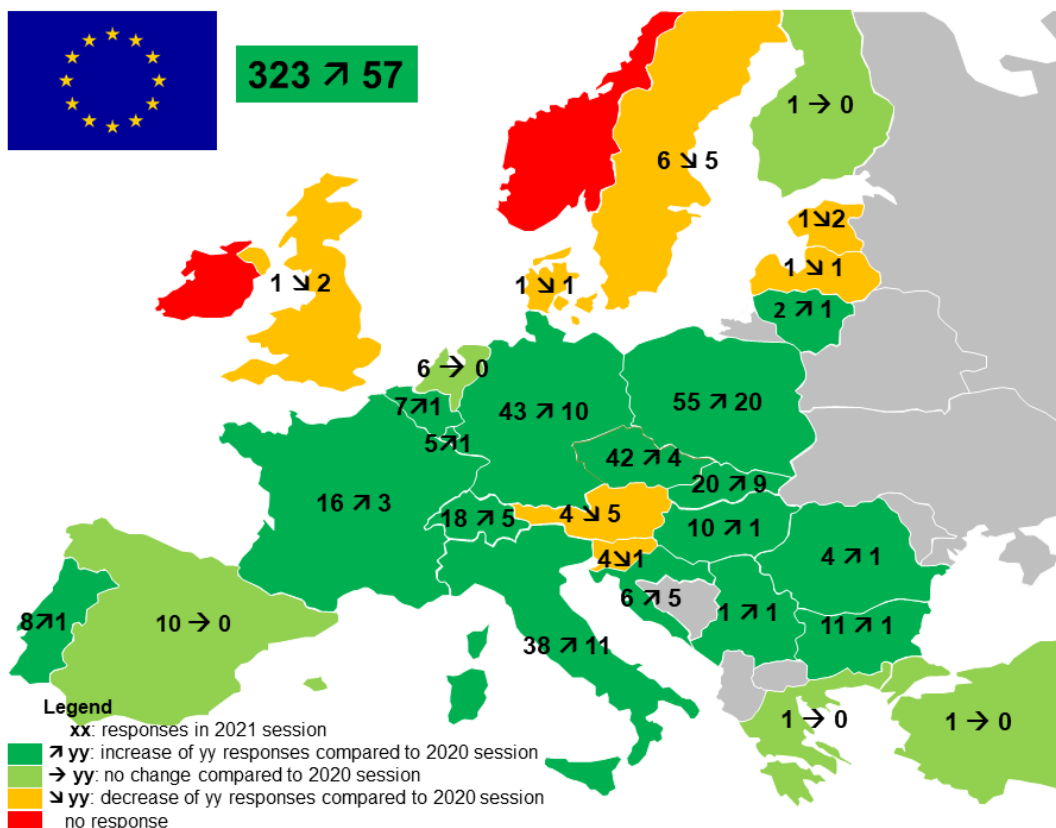


Diagram 4: Evolution of responses per country

Participation per company type

Some companies in this survey have multiple roles, such as RU and WK at the same time. Therefore, the total number of responses displayed in diagram 1 (323 companies) and listed in Annex 2 is lower than the total number of company types shown in diagram 5 hereafter (343 companies).

Compared to the previous survey, participation shows a mixed development. It has grown for ABs, RUs-F and Wks and has fallen for IMs and RUs-P.

Annex 2 ‘Responses contact list 2021’ to this report gives a detailed overview about the companies per country having replied to the 2021 session of TAF and TAP TSI implementation monitoring. Please note, that there are entities which have reported on behalf of several companies.

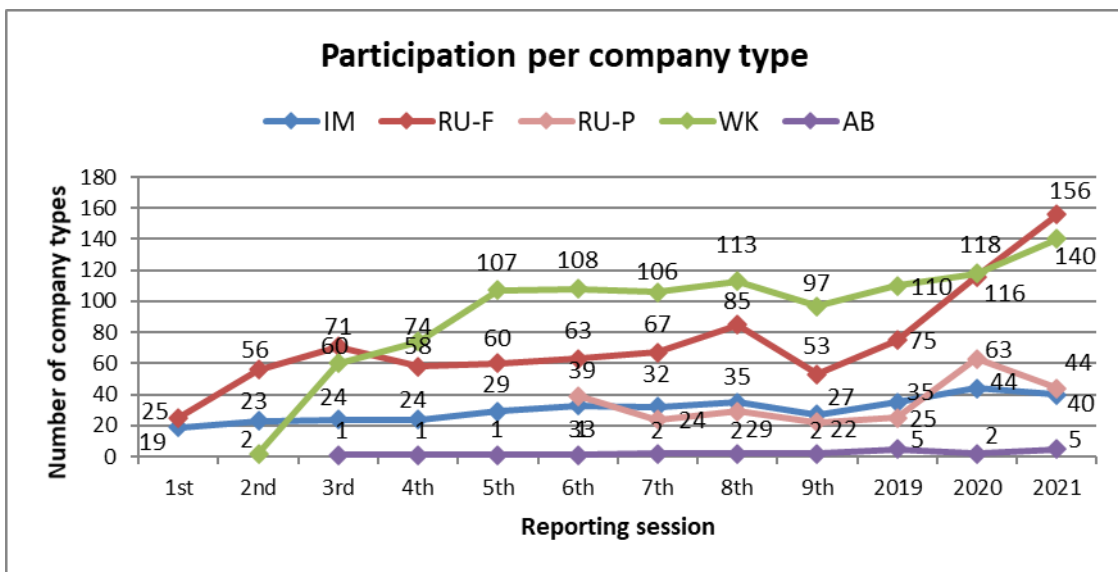


Diagram 5: Evolution of participating per company type over time

4. DATA BASIS FOR EVALUATION

Feedback from ABs represents about 1 per cent of the total number of responses. Hence, ABs are not further considered in the evaluation of the data.

To establish a wider sector representation, 91 companies from the previous survey, which have not replied this time, are also taken into consideration. For companies having reported to both surveys, only the company information from the latest session is included.

Diagram 6 displays the total number of types of company (471) with their allocation to the following reporting sessions:

- Companies only reporting to the 2020 reporting session (top with light colour)
- Companies reporting to both 2020 and 2021 reporting session (middle with normal colour)
- New companies reporting to the 2021 reporting session only (bottom with dark colour)

The data included in this report thus represents the data since January 2020.

This time, the number of companies taken over from the last reporting (91) as well as the number of new companies in the present session (145) both are relatively high.

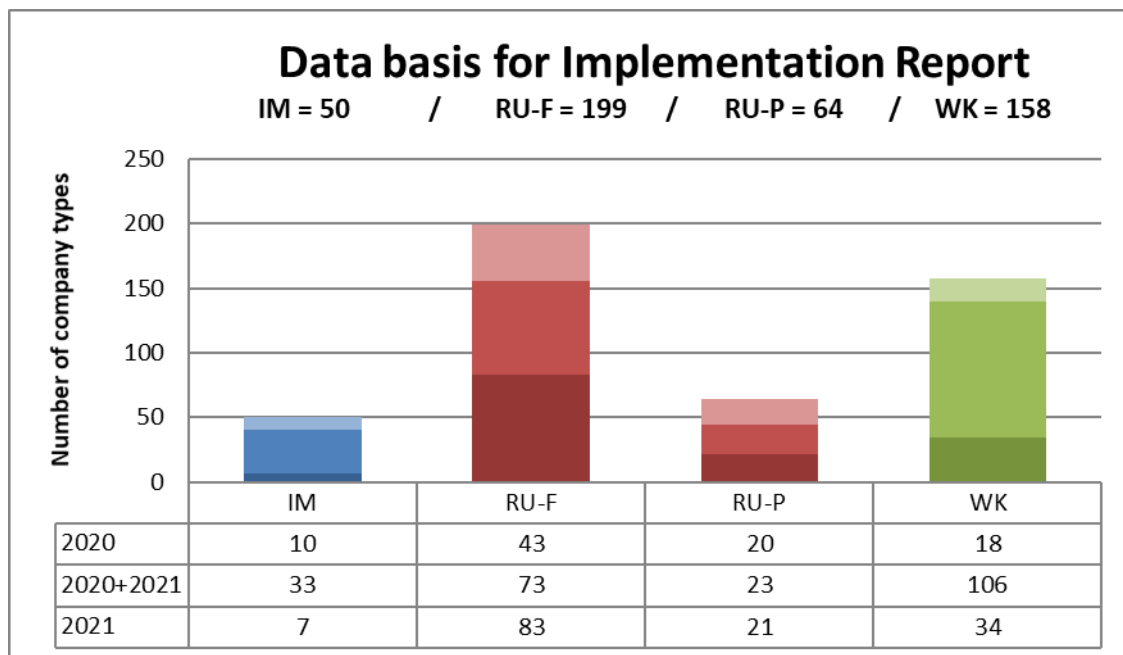


Diagram 6: Number of types of company per reporting session

Annex 3 ‘Responses contact list 2020’ to this report lists the companies per country having replied to the 2020 session of TAF and TAP TSI implementation monitoring and not to the present one.

Since the seventh reporting session by the end of 2017, the data from the previous survey were included in the next reporting session. Diagram 7 displays the total number of companies included in the reporting session as data basis for further evaluation.

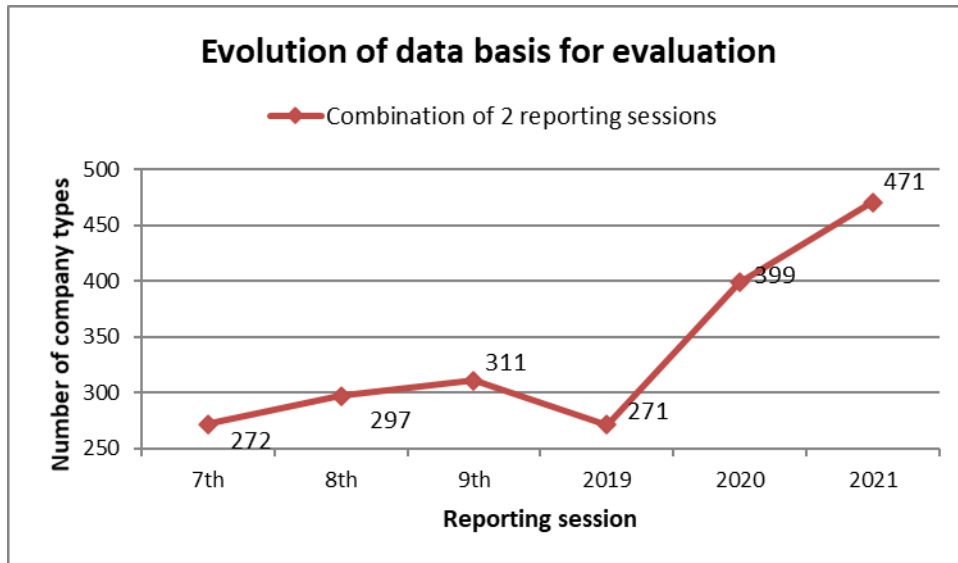


Diagram 7: Number of types of company per reporting session

5. IMPLEMENTATION MONITORING OF TAF TSI FUNCTIONS

Common Reference Files - Primary Location Codes (IMs)

The Target Implementation Milestone for realisation of the Primary Location Code Function (PLC) according to the TAF TSI Masterplan was 2013. This activity corresponds to Primary Location Codes, which must be reported by IMs. Consequently, the following diagram only refers to IMs. Responses refer to initial upload of primary location codes but update and maintenance process and use of codes is a different issue and not part of this report.

Diagram 8 indicates that most IMs reported to have completed the Common Reference Files for locations on their network. However, complete population of PLC is not yet reached. Regarding the level of fulfilment of PLC implementation, diagram 8 shows 29 IMs with complete implementation. 7 out of 50 IMs in the evaluation are considered with data from the previous survey.

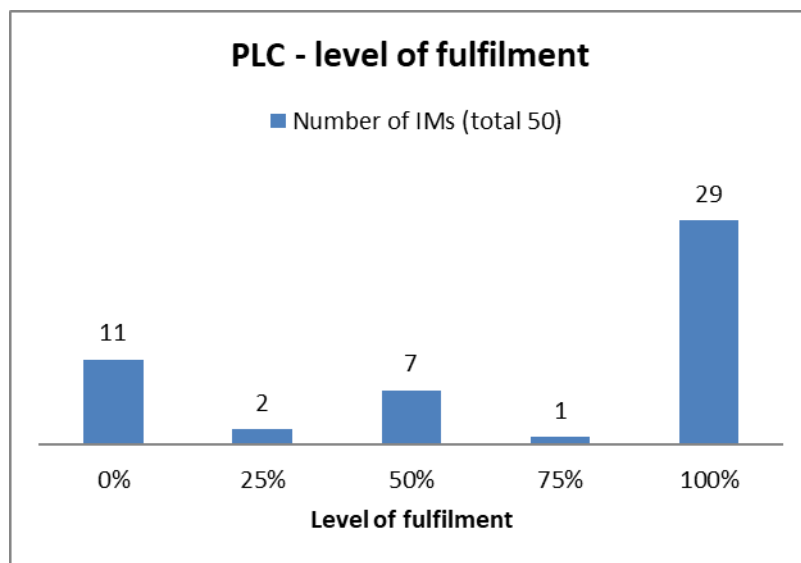


Diagram 8: Common Reference Files - Primary Location Codes (PLC)

Diagram 9 shows a similar situation as in the last reporting year.

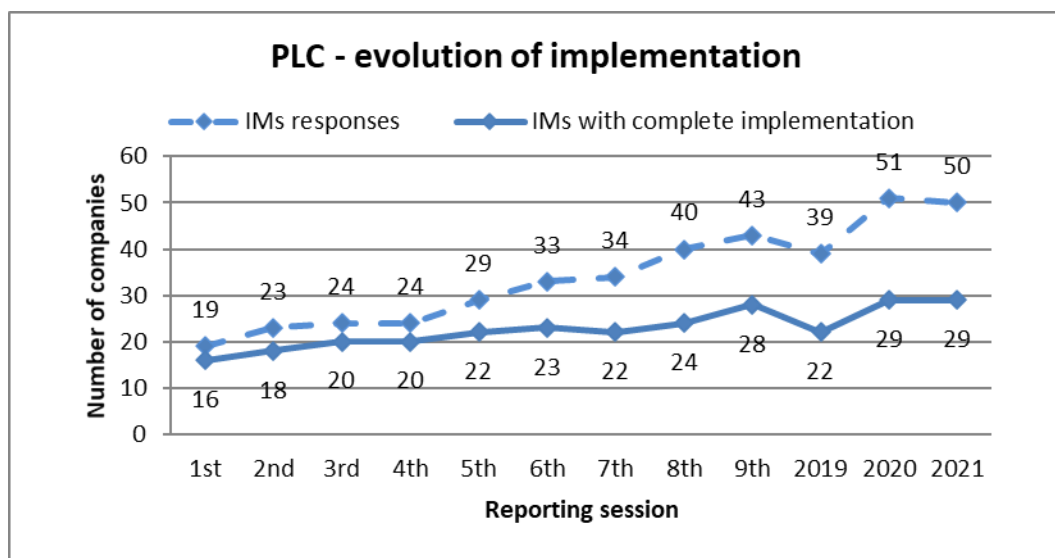


Diagram 9: Evolution of responses and implementation for PLC

Common Reference Files - Company Code (all companies)

The Target Implementation Milestone for realisation of the Company Code Function (CC) according to the TAF TSI Masterplan was 2013.

The bar chart below (diagram 10) is indicating the existence and use of company codes as part of the Common Reference Files for IMs, RUs-F and Wks. For CCs only two predefined percentage steps exist, because either a company does have an own CC or not. Most of companies having replied to the query possess a CC.

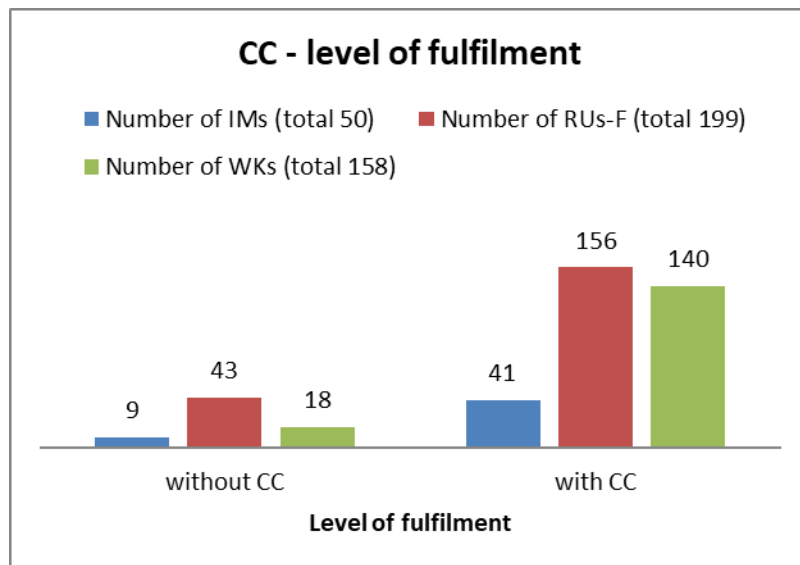


Diagram 10: Common Reference Files - Company Codes (CC)

According to Diagram 11, the number of companies with CCs has increased for all types of companies together with the total number of responses since the survey last year.

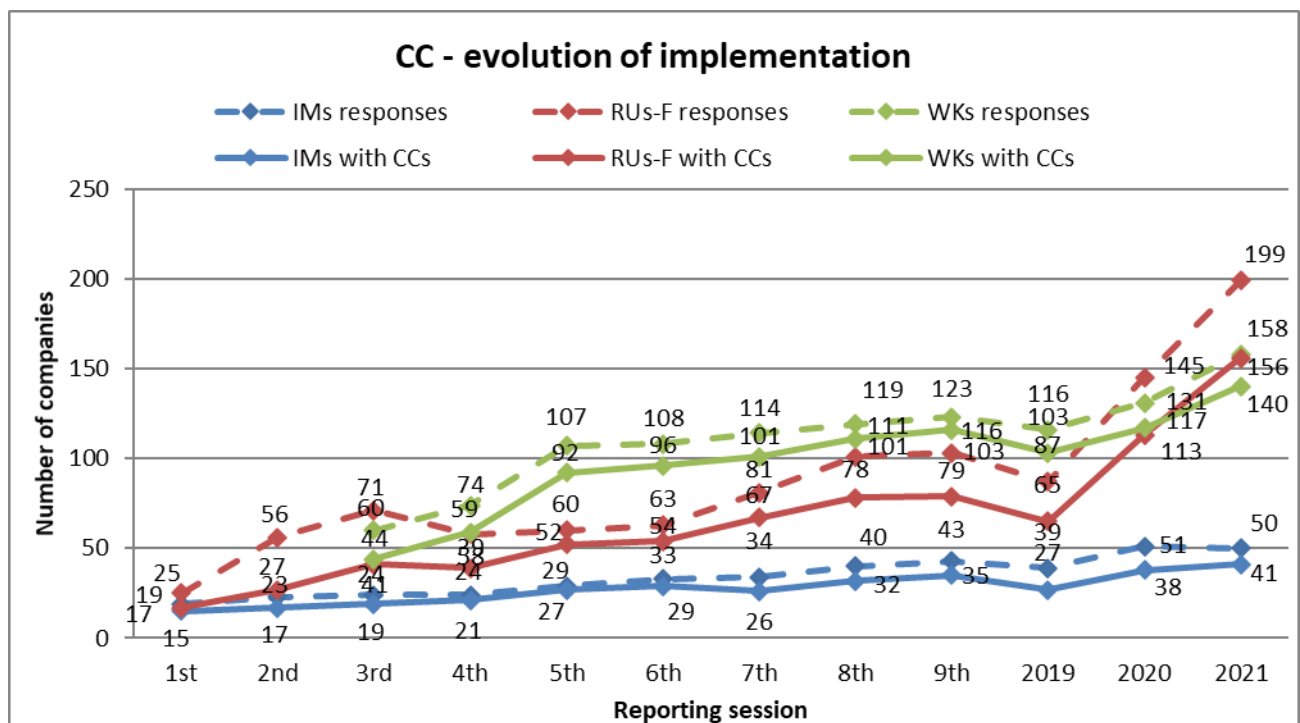


Diagram 11: Evolution of responses and implementation for Company Codes

Common Interface Implementation (all companies)

The Target Implementation Milestone for realisation of the Common Interface Function (CI) according to the TAF TSI Masterplan was 2013.

Diagram 12 summarises the feedback related to the availability of CI and shows a difference in level of fulfilment between IMs, RUs-F and Wks. The CI is completely implemented by 23 IMs, 57 RUs-F and 25 Wks. RSRD² has not yet implemented the CI. Wks using RSRD² therefore form part of the 25% level.

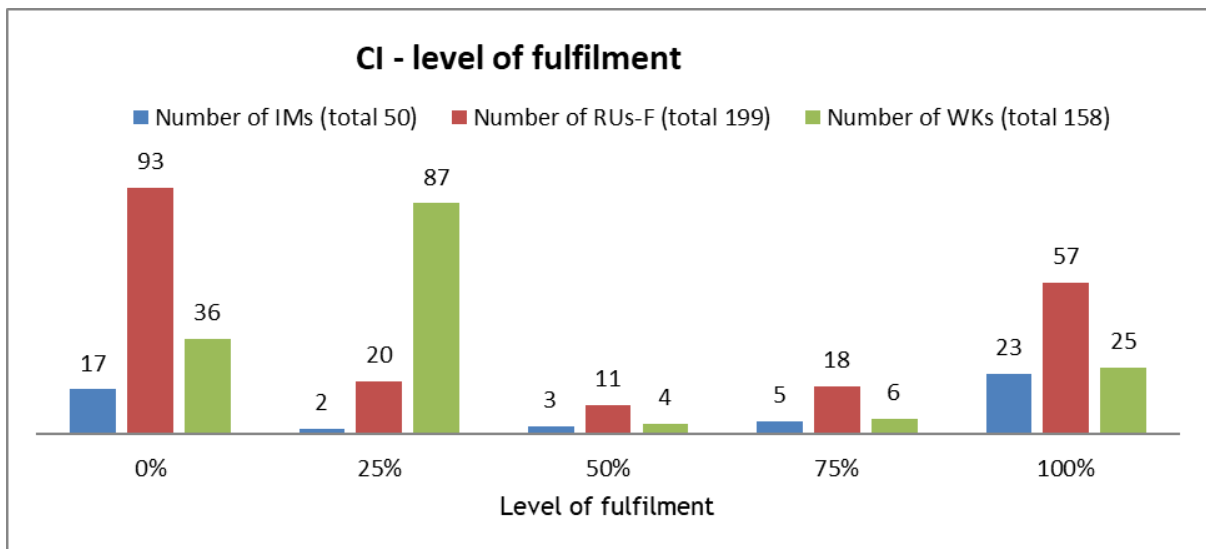


Diagram 12: Common Reference Files - Common Interface (CI)

Diagram 13 shows the development of complete implementation of the CI and the number of responses per company type. There is a positive evolution of CI in production for all types of companies up to December 2021.

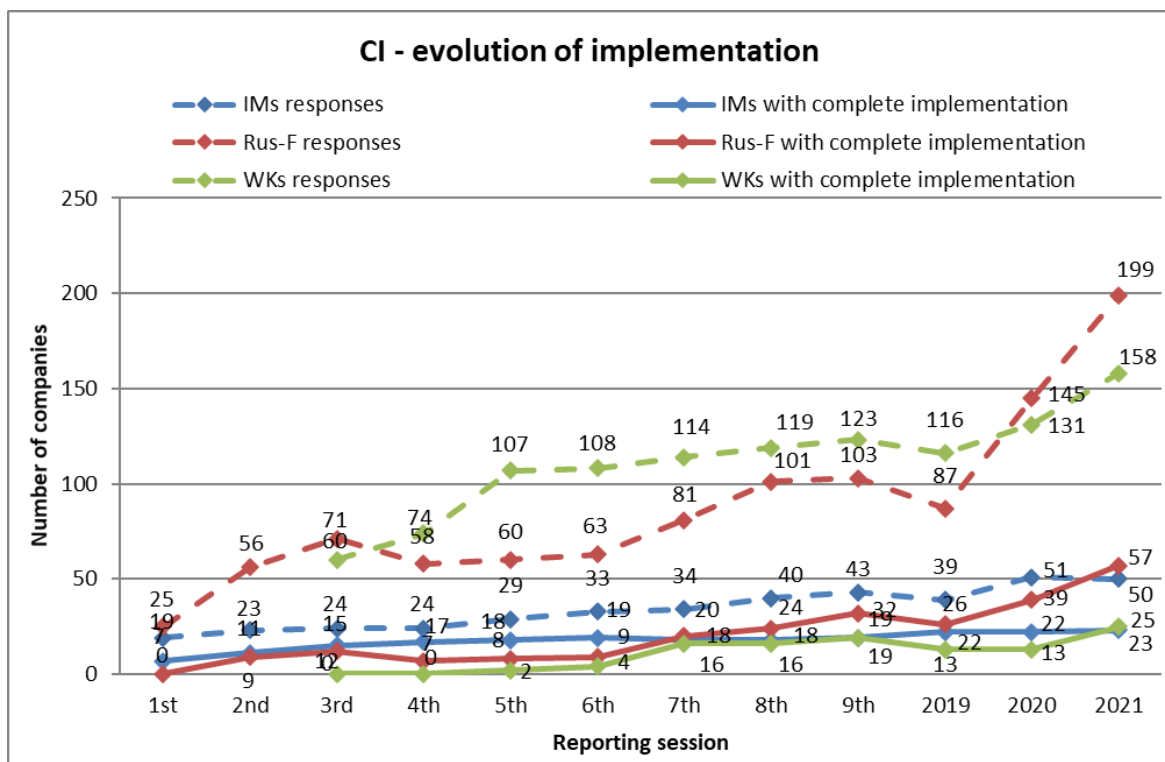


Diagram 13: Evolution of responses and implementation for Common Interface

New Identifiers (all companies)

The Target Implementation Milestone for realisation of the New Identifiers (NI) according to the TAF TSI Masterplan was 2020.

The bar chart below (diagram 14) illustrates most companies not having yet implemented the NI function.

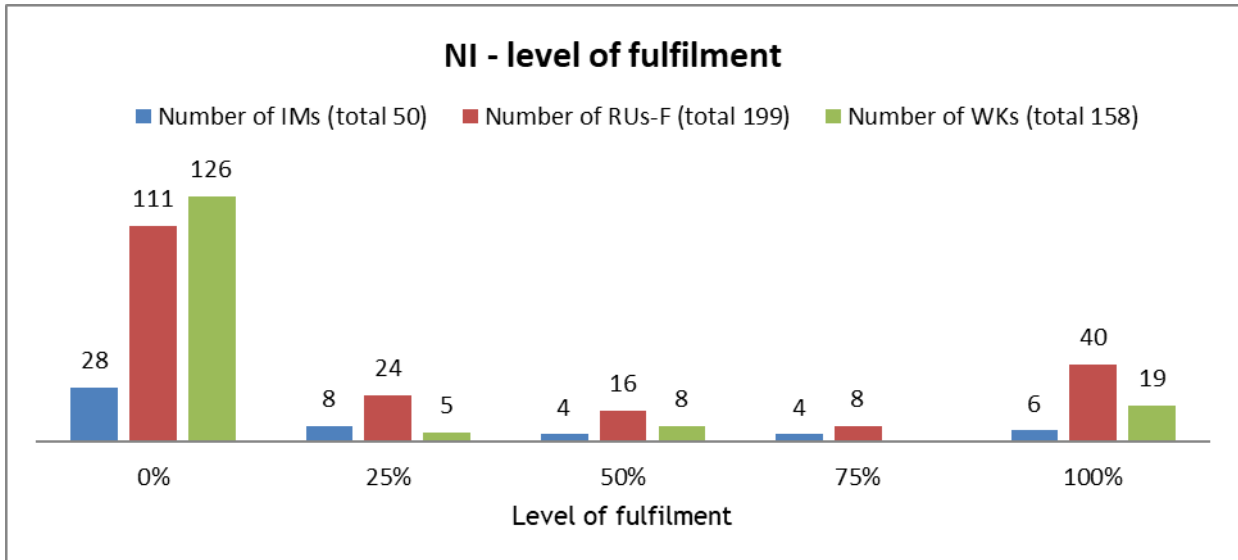


Diagram 14: New Identifiers (NI)

The number of RUs-F and Wks having introduced NIs has increased according to diagram 15.

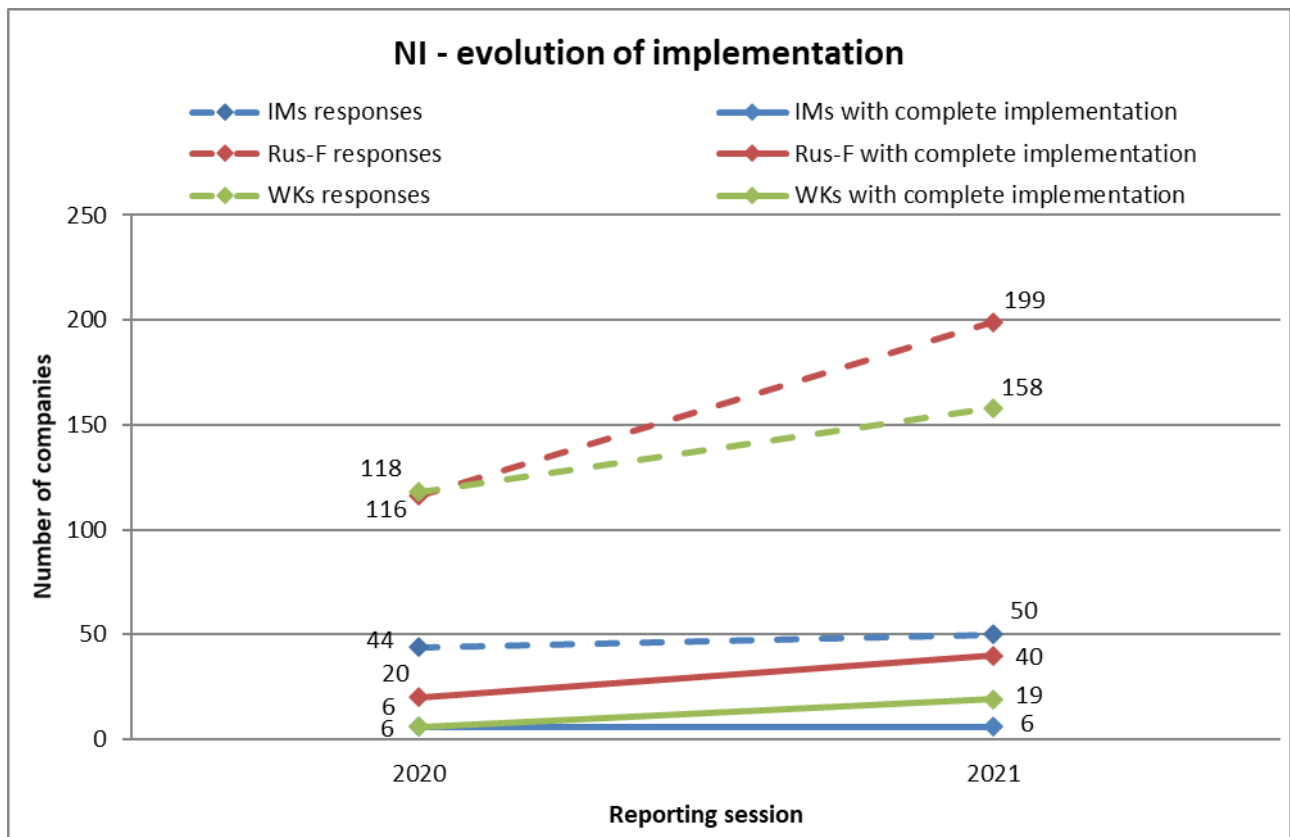


Diagram 15: Evolution of responses and implementation for New Identifiers

Path Request (IMs and RUs-F)

The Target Implementation Milestone for realisation of the Path Request (PR) according to the TAF TSI Masterplan was 2017.

The level of fulfilment of diagram 16 shows 11 IMs and 52 RUs-F with 100% implementation of the PR message.

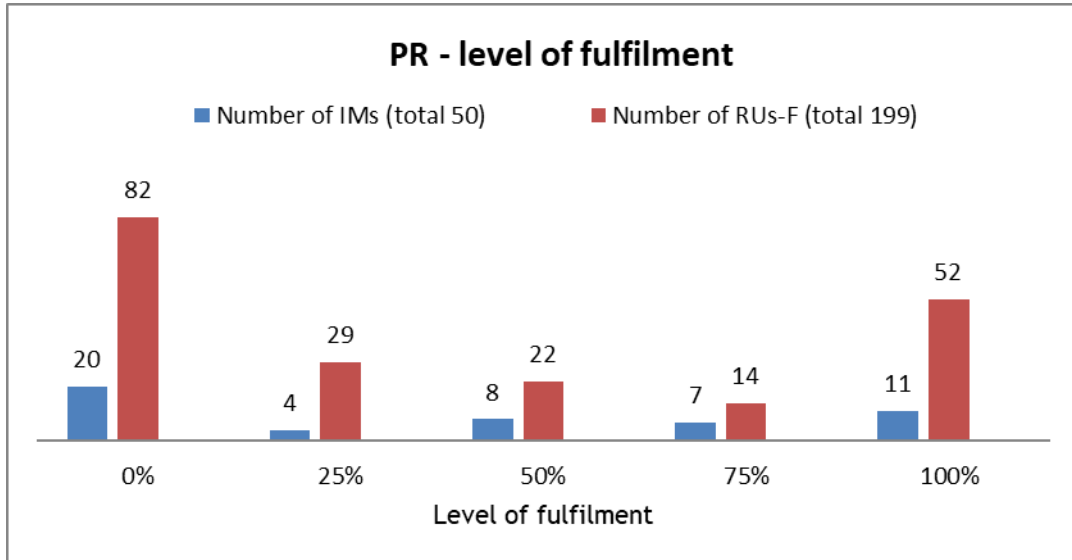


Diagram 16: Path Request (PR)

The number of RUs-F having introduced PR messages has increased, while it did not improve for IMs according to diagram 17.

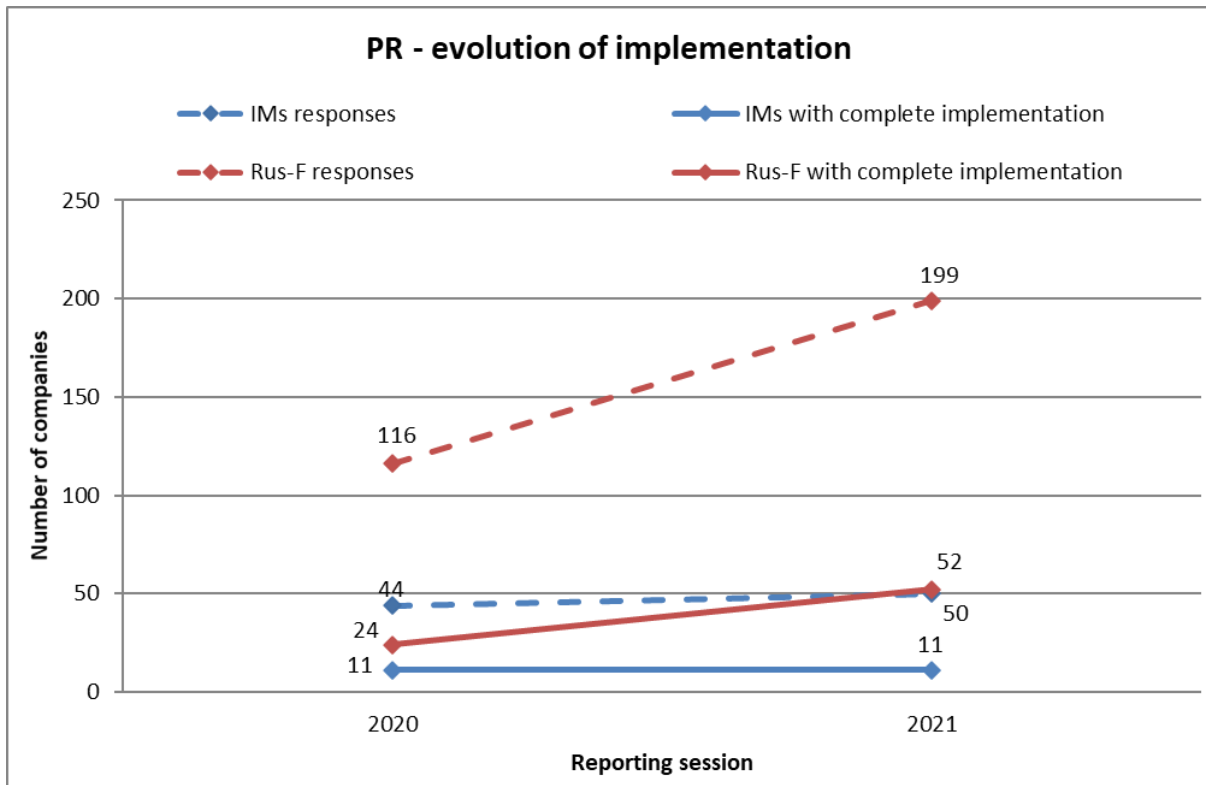


Diagram 17: Evolution of responses and implementation for Path Request

Path Details (IMs and RUs-F)

The Target Implementation Milestone for realisation of the Path Details (PD) according to the TAF TSI Masterplan was 2017.

The level of fulfilment of diagram 18 shows 13 IMs and 60 RUs-F with 100% implementation of the PD message.

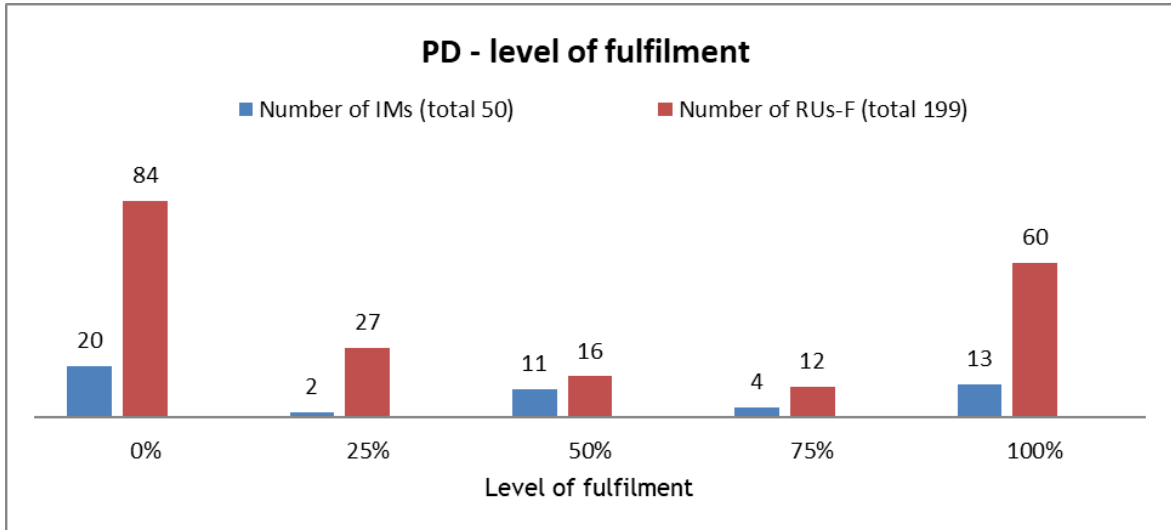


Diagram 18: Path Details (PD)

The number of IMs and RUs-F having introduced PD messages has increased according to diagram 19.

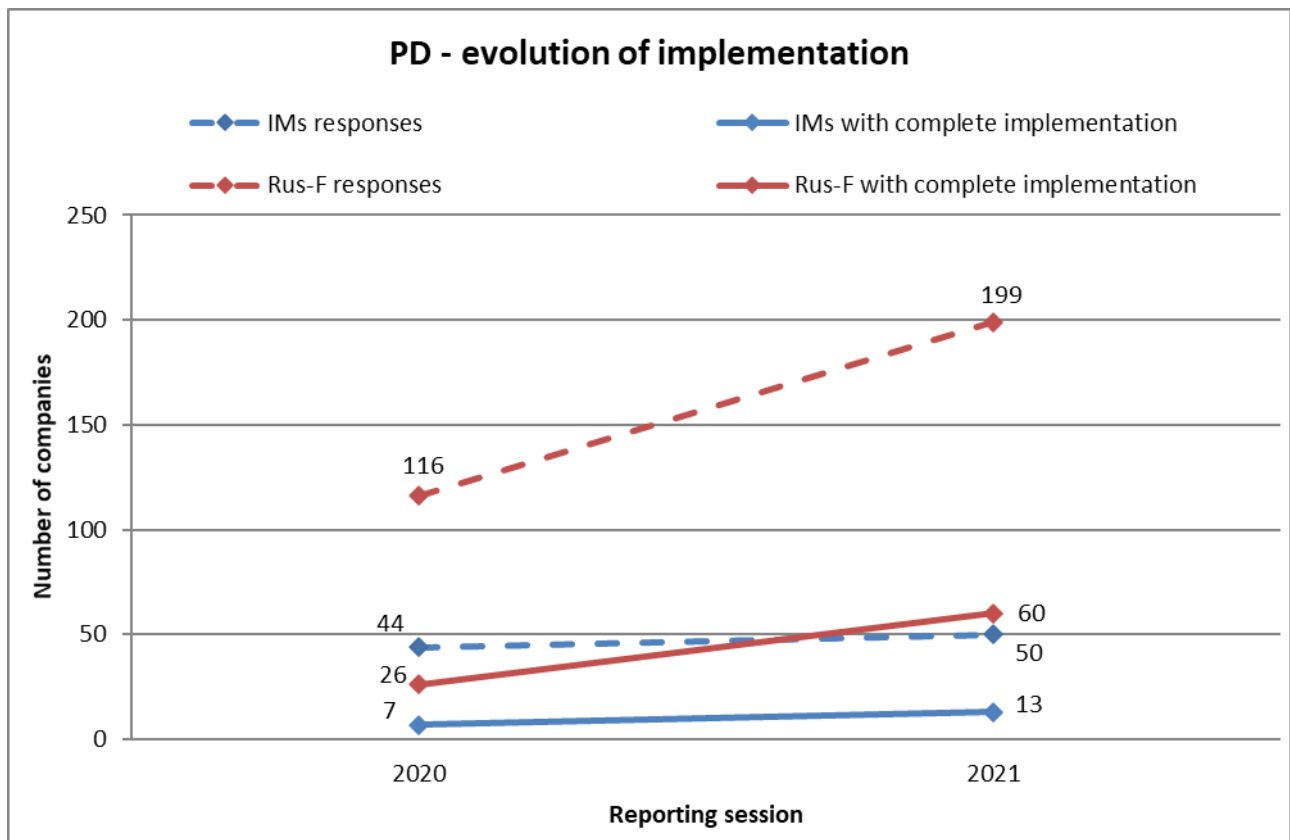


Diagram 19: Evolution of responses and implementation for Path Details

Train Ready (IMs and RUs-F)

The Target Implementation Milestone for realisation of the Train Ready Message (TR) according to the TAF TSI Masterplan was 2019.

About one third of IMs and RUs-F stated implementing the Train Ready function using the respective TAF message, which is like the previous reporting period (diagram 20). Companies using other means of implementation in accordance with the TSIs remain out of consideration.

Regardless of the higher participation in the 2020 survey, the share of TAF/TAP messages for TR implementation remains quite similar.

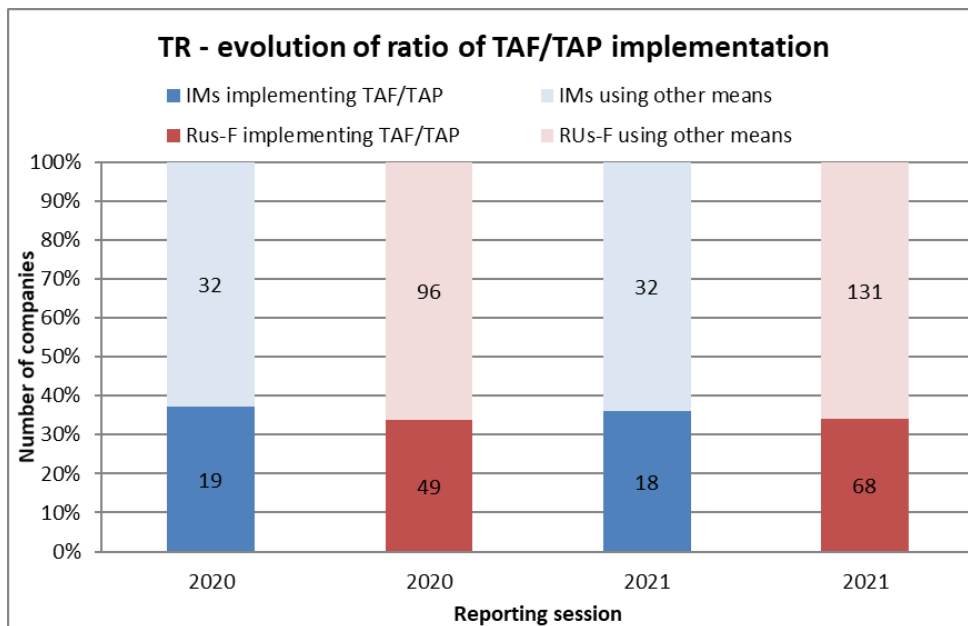


Diagram 20: Train Ready (TR)

The level of fulfilment of diagram 21 shows 8 IMs and 42 RUs-F with 100% implementation of the TR message.

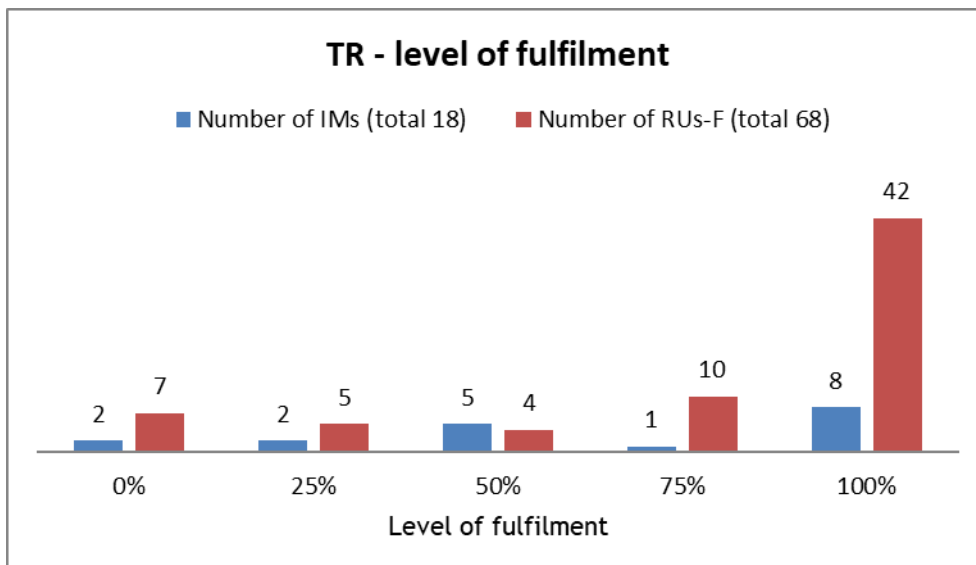


Diagram 21: Train Ready (TR)

The development of complete implementation and the number of responses per company type of the TAF message TR since 2019, when it was reported for the first time, is shown in diagram 22. There is a positive evolution of TR in production for IMs and RUs-F up to December 2021.

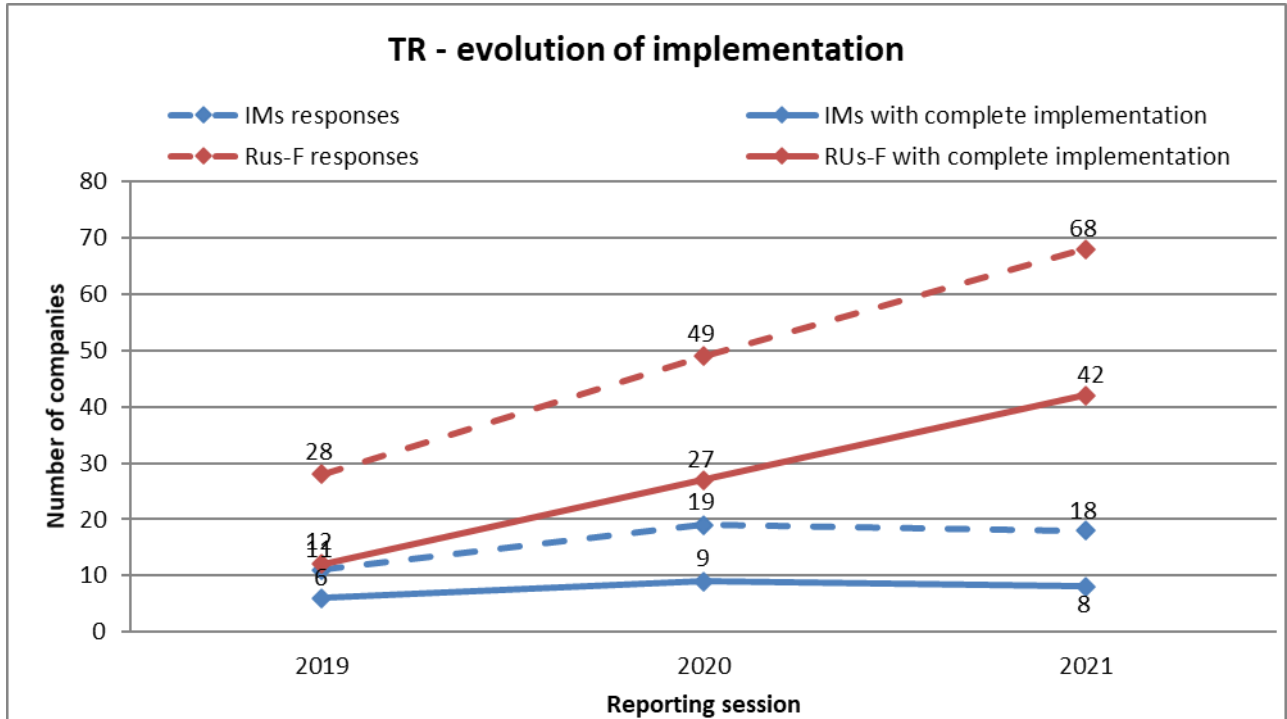


Diagram 22: Evolution of responses and implementation for Train Ready

Train Running Information (IMs and RUs-F)

The Target Implementation Milestone for realisation of the Train Running Information message (TRI) according to the TAF TSI Masterplan was end of 2017. This monitoring concerns only one aspect of the TAF TSI basic parameter ‘Train running forecast’, the Train Running Information message. The Train Information System (TIS) is a common sector tool managed by RNE. Messages sent by IMs to TIS or messages received by RUs from TIS through traditional interfaces are considered as 75 % fulfilment. TAF messages sent or received by Common Interface are counted as 100 % fulfilment.

Diagram 23 indicates 26 IMs and 79 RUs-F with 100 % level of fulfilment. 25 companies which do not have fully implemented TRI declared to use TIS according to their feedback to the survey.

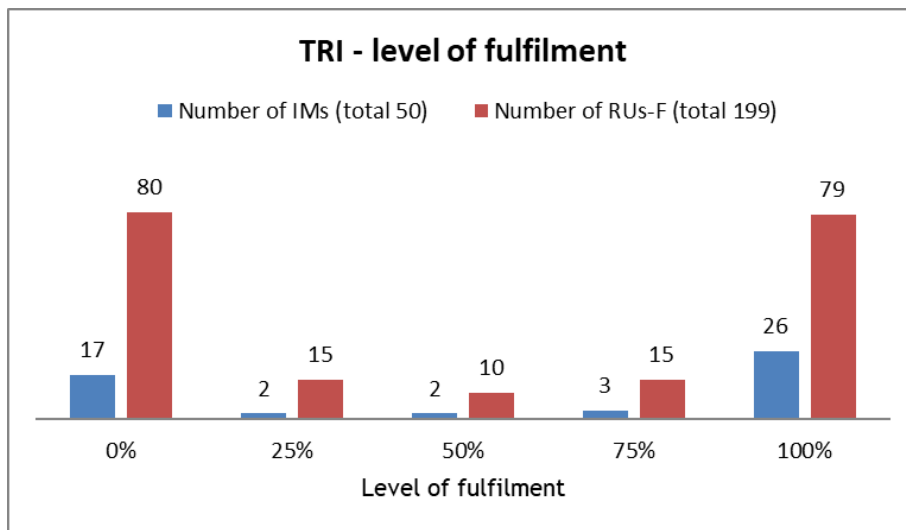


Diagram 23: Train Running Information (TRI)

Regarding diagram 24, the number of IMs and RUs-F having implemented completely the TRI increased in comparison to the previous reporting session at a similar or higher level of participation.

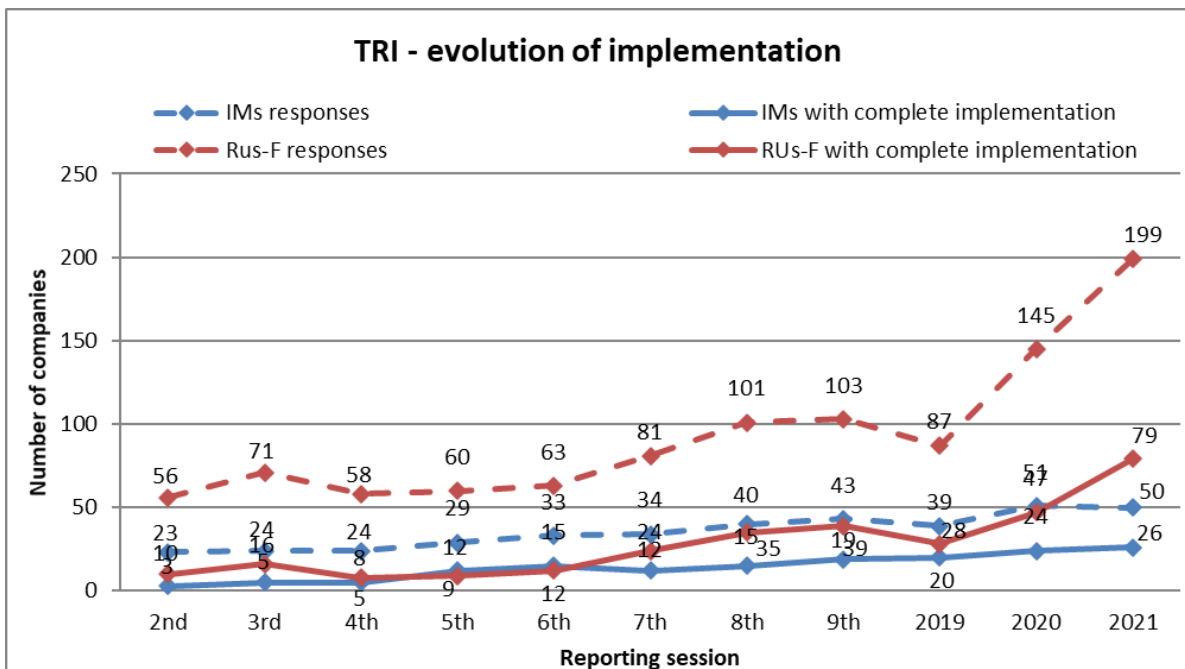


Diagram 24: Evolution of responses and implementation for Train Running Information

Train Running Interruption Message (IMs and RUs-F)

The Target Implementation Milestone for realisation of the Train Running Interruption Message (TRIM) according to the TAF TSI Masterplan was 2019.

The level of fulfilment of diagram 25 shows 16 IMs and 48 RUs-F with complete implementation of the TRIM message. However, most companies have not yet started implementation.

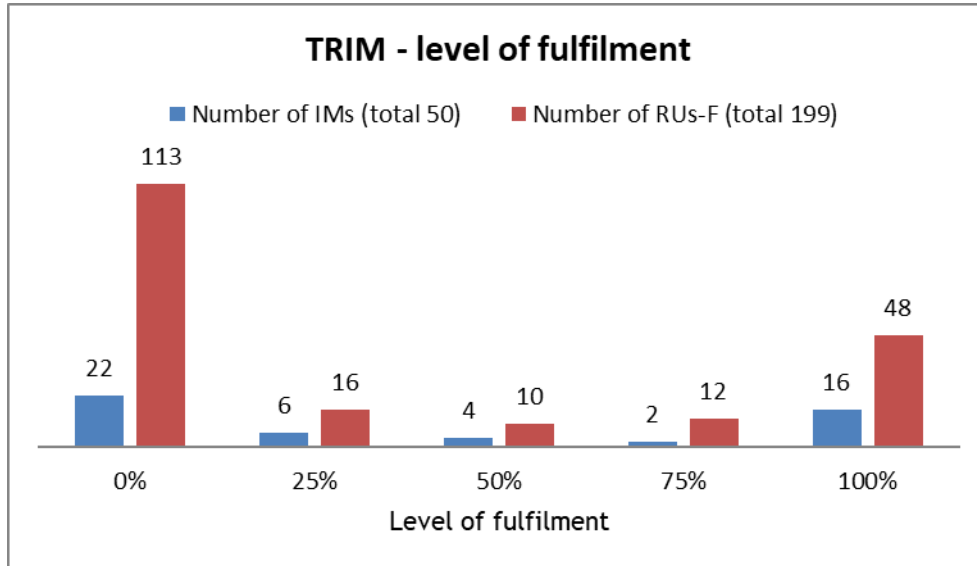


Diagram 25: Train Running Interruption Message (TRIM)

Diagram 26 indicates the positive evolution of implementation for TRIM at a relative low level compared to the number of participating companies.

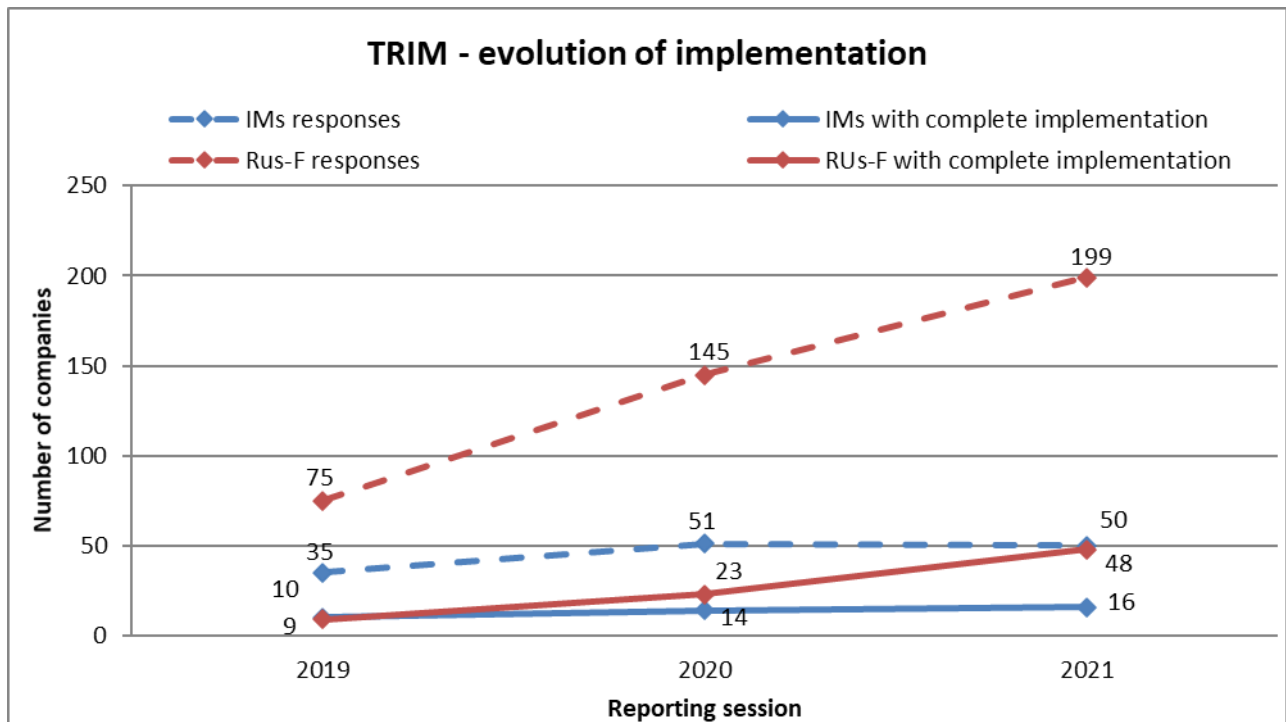


Diagram 26: Evolution of responses and implementation for Train Running Interruption Message

Train Running Forecast (IMs and RUs-F)

The Target Implementation Milestone for realisation of the Train Running Forecast (TRF) according to the TAF TSI Masterplan was 2017.

TRF is reported to be fully implemented end of 2021 by 15 IMs and 43 RUs-F.

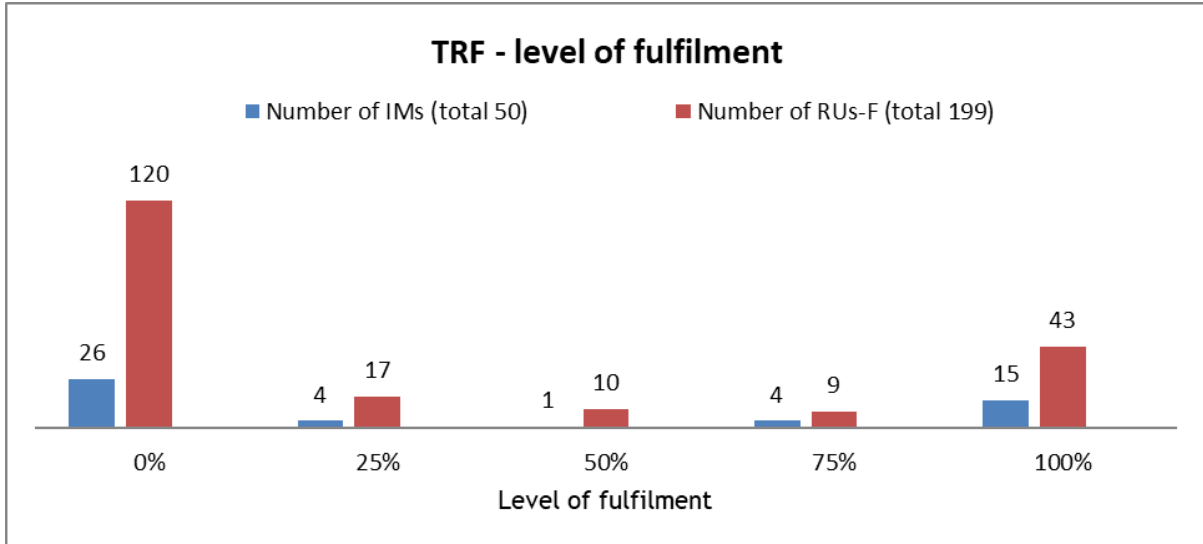


Diagram 27: Train Running Forecast (TRF)

Following a higher participation of IMs and RUs-F, complete implementation of the TRF function also shows a higher level than the previous year.

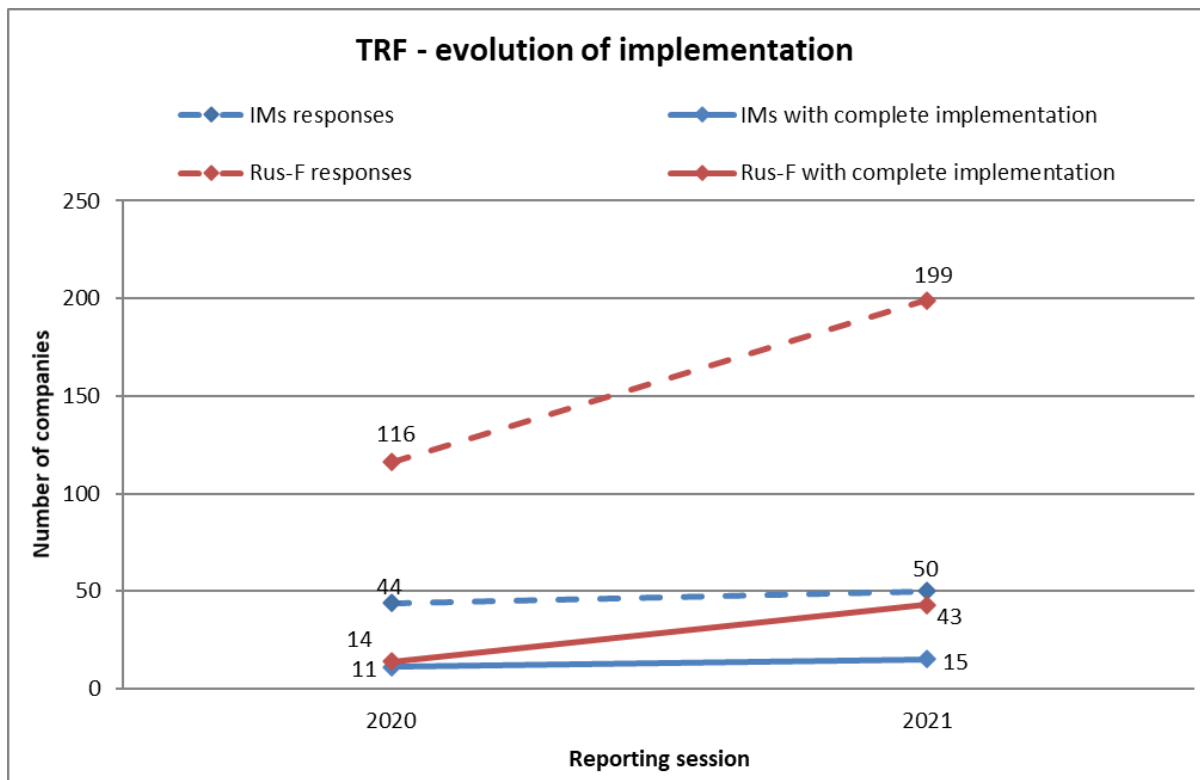


Diagram 28: Evolution of responses and implementation for Train Running Forecast

Train Composition Message (IMs and RUs-F)

The Target Implementation Milestone for realisation of the Train Composition Message (TCM) as part of the Train Preparation Function according to the TAF TSI Masterplan was end of 2018. TCM is mandatory to be sent by RUs-F. However, implementation by IMs is also reported, because the message is sometimes required via the Network Statement. 18 IMs and 73 RUs-F have implemented TCM completely.

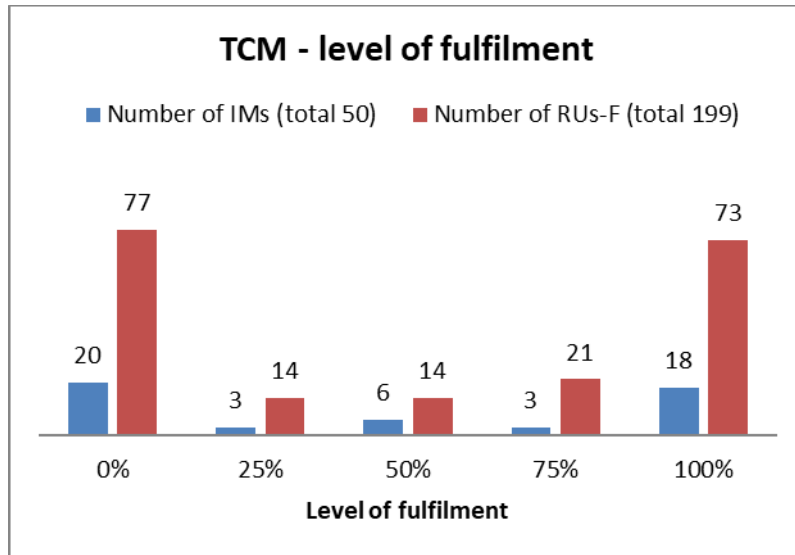


Diagram 29: Train Composition Message (TCM)

Figures show an increase in terms of complete implementation of TCM since last reporting session. 73 RUs-F out of 199 which replied to the survey have completely implemented the TCM while 18 out of 50 IMs have finished their duty.

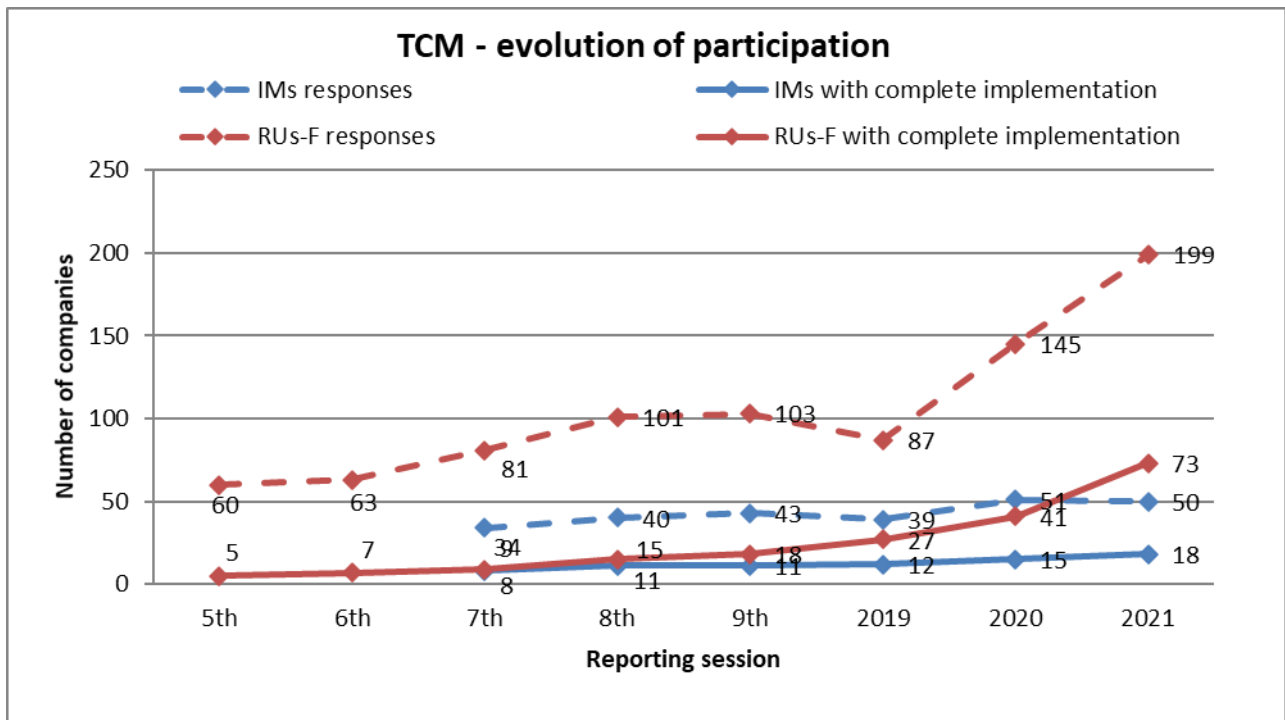


Diagram 30: Evolution of responses and implementation for Train Composition Message (TCM)

Consignment Note Data (RUs-F)

The Target Implementation Milestone for realisation of the Consignment Note Data function (CND) according to the TAF TSI Masterplan was end of 2017.

ORFEUS (Open Rail Freight EDI User System) is a common sector tool managed by Raildata, which allows to exchange consignment data.

Diagram 31 indicates only 45 RUs-F out of 199 having finished implementation of CND. 20 companies declared in the questionnaire using ORFEUS, but 10 of them not having implemented CND completely.

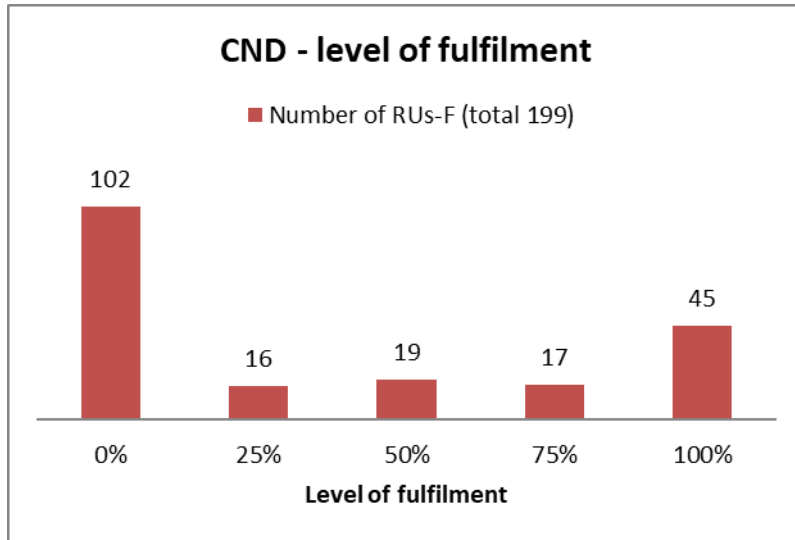


Diagram 31: Consignment Note Data (CND)

Both, the evolution of responses and the evolution of implementation for CND increases quite significantly for 2021 (diagram 32).

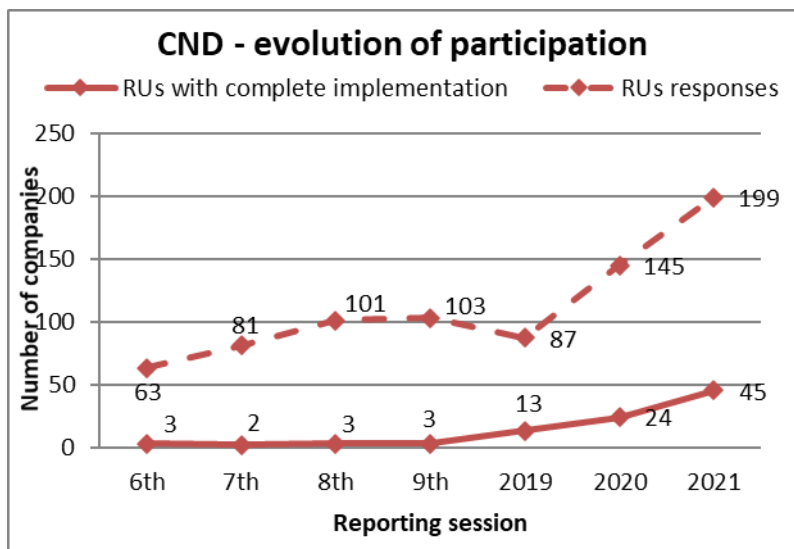


Diagram 32: Evolution of responses and implementation for Consignment Note Data (CND)

Wagon Movement (RUs-F)

The Target Implementation Milestone for realisation of the Wagon Movement function (WM) according to the TAF TSI Masterplan was end of 2016.

The common sector tool ISR ensures exchange of movement information for wagons in international traffic through a central platform.

Responses to this questionnaire indicate 44 RUs-F having completed the WM function from a total of 199 companies. 16 RUs-F declared using the Common Sector Tool ISR, out of which 9 companies did not have implemented WM completely.

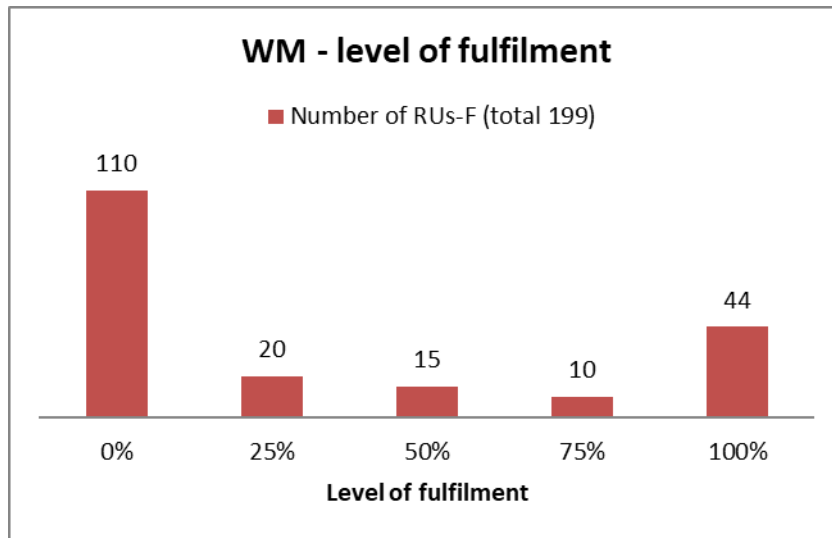


Diagram 33: Wagon Movement (WM)

The implementation for WM shows a significant positive evolution for 2021 (diagram 34).

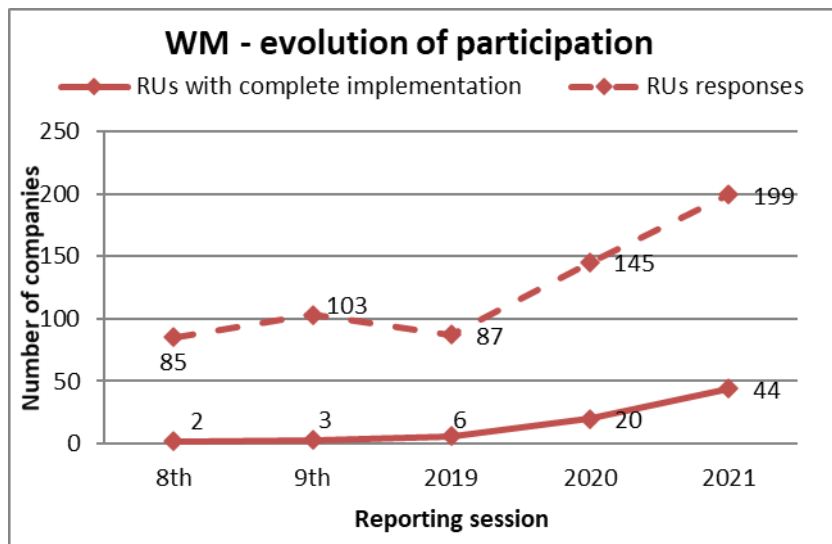


Diagram 34: Evolution of responses and implementation for Wagon Movement (WM)

Shipment ETA (RUs-F)

The Target Implementation Milestone for realisation of the Shipment ETA function (ETA) according to the TAF TSI Masterplan was 2018.

The ‘Shipment ETA’ function (ETA) is relevant for RUs-F only. Even if there are several IMs that will realise this function on behalf of their customers, they are not considered in the present report.

37 RUs-F out of a total of 199 RUs-F declare to have implemented this function by the end of 2021 is shown in diagram 35.

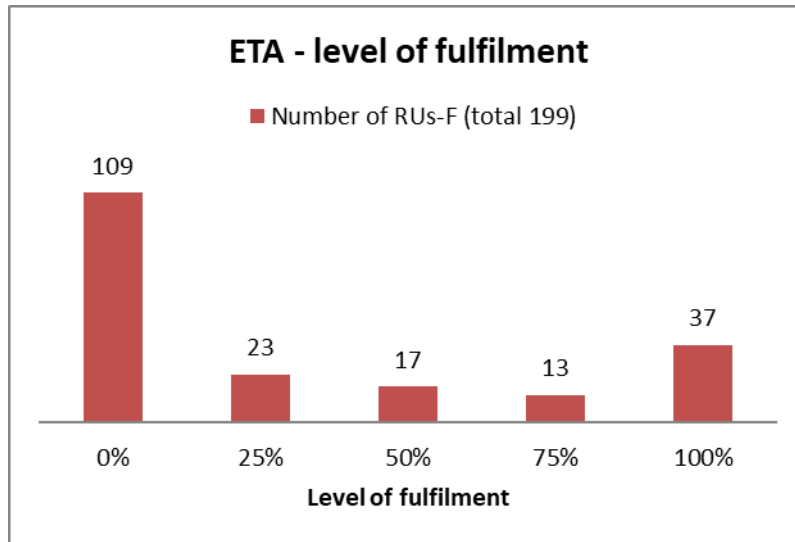


Diagram 35: Shipment ETA

Together with replies for ETA, the number of RUs-F having implemented the function has risen in 2021 according diagram 36.

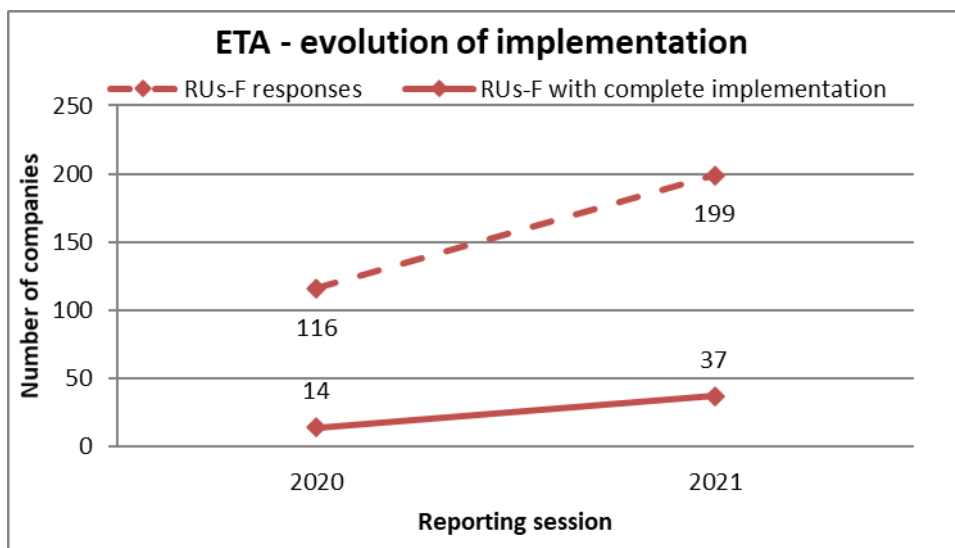


Diagram 36: Evolution of responses and implementation for Shipment ETA

Rolling Stock Reference Database (Wks)

The Target Implementation Milestone for realisation of the RSRD function according to the TAF TSI Masterplan was 2015.

The ‘Rolling Stock Reference Database’ function (RSRD) is relevant for companies which keep wagons. Those companies might at the same time also be RUs or IMs.

Many companies intend fulfilling this functionality in a collaborative way via the common sector tool RSRD². Information delivered by UIP for RSRD² means 100% of fulfilment. 113 Wks have implemented this function, out of which 82 Wks thanks to RSRD².

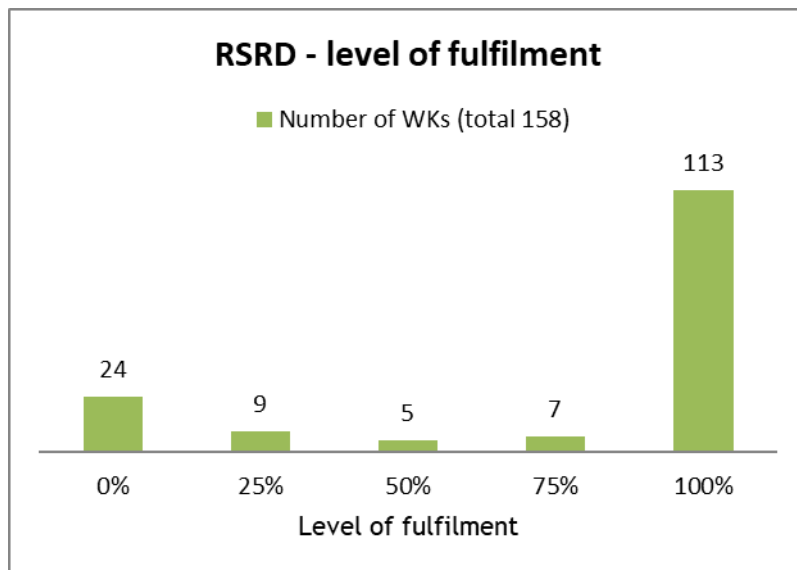


Diagram 37: Rolling Stock Reference Database

Like better participation to the survey, the evolution of implementation remains growing compared to the previous report (see diagram 38).

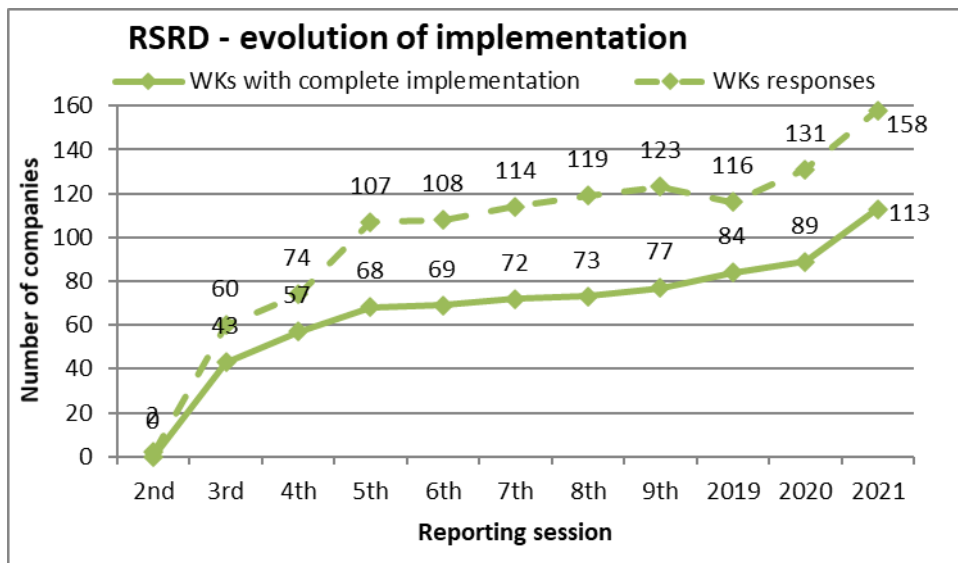


Diagram 38: Evolution of responses and implementation for RSRD

Reasons for not starting implementation of TAF/TAP TSI functions

Companies could declare in a dedicated answer for each TAF/TAP TSI function one reason why they did not yet start implementing it. Diagram 39 gives a summary of the total number of reasons mentioned in the questionnaire.

Feedback regarding reasons for not implementing went up about three times (from) in total, which is completely in line with the increased participation of new companies in the actual survey.

Compared to the last reporting session ‘process reasons’ and ‘technical reasons’ have increased most.

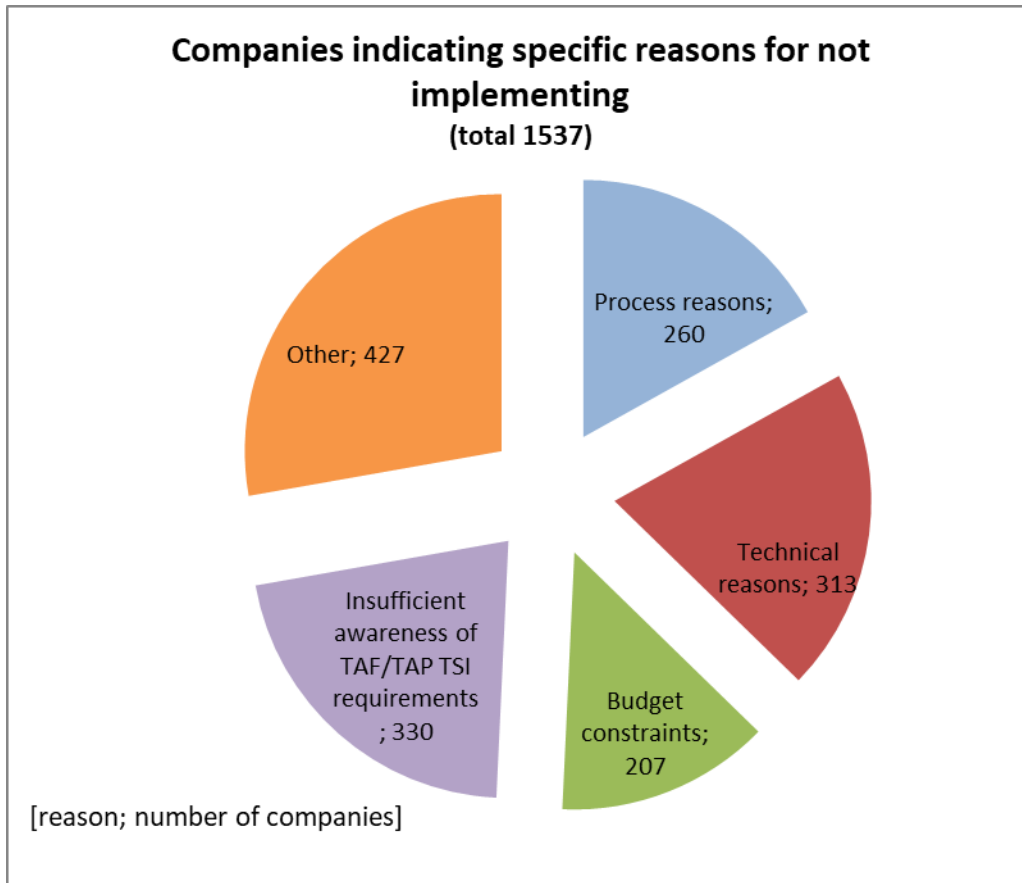


Diagram 39: Reasons for not starting implementation of TAF/TAP TSI functions

Diagram 40 shows the distribution of the responses to the various TAF/TAP functions. The number indicates how many companies have not yet started implementing this function and gave reasons for not yet doing so.

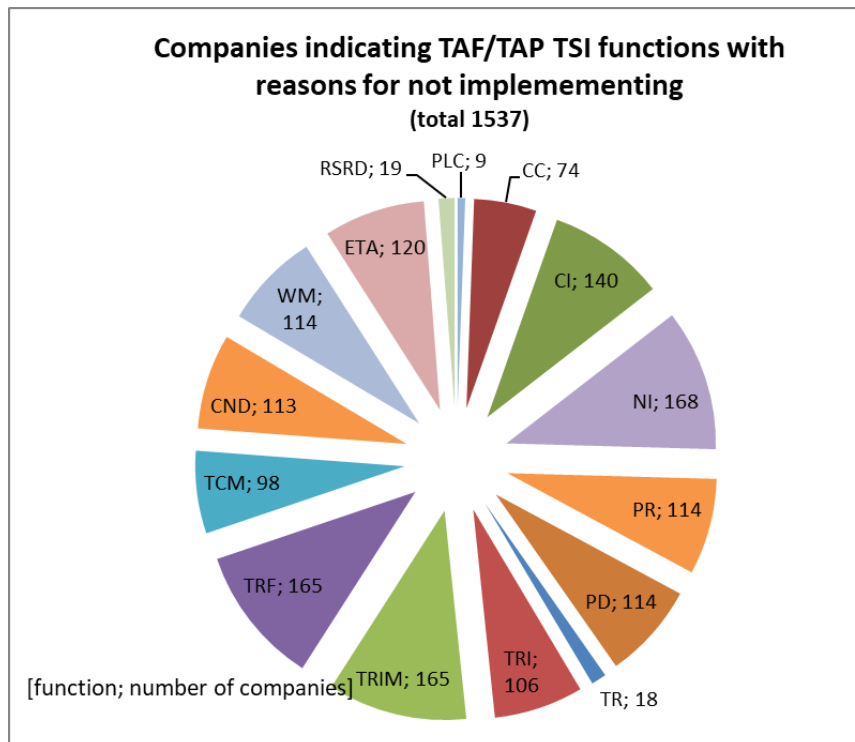


Diagram 40: TAF/TAP functions with reasons for not starting implementation

Diagram 41 gives a closer look to the development of ‘Insufficient awareness of TAF/TAP TSI requirements’ over time. The percentage given in diagram 41 as a green line, is calculated as the number of companies not being aware about TAF/TAP in relation to all companies giving a reason for not starting to implement. It turns out, that this percentage has fallen since last year to 21. However, the absolute number of 330 companies declaring ‘Insufficient awareness of TAF/TAP TSI requirements’ is the highest ever. Dedicated information sessions should be initiated as a mitigation measure.

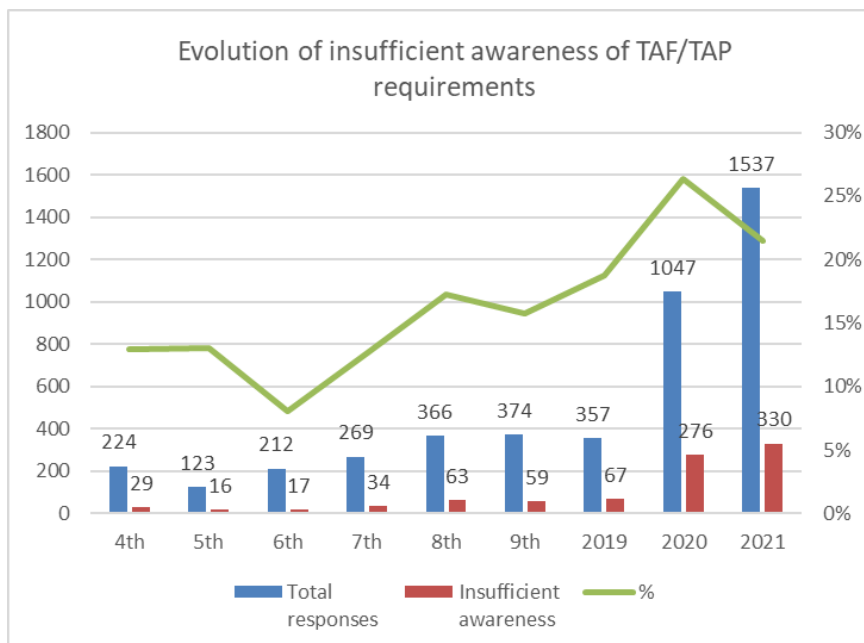


Diagram 41: Evolution of insufficient awareness of TAF/TAP requirements

Degree of implementation at European level

This chapter summarises the development of the Degree of Implementation (DI) at European level for the TAF TSI functions since the beginning of reporting.

The DI in this report is defined as the relation of companies having fully implemented (100 %) the function compared to the companies having replied to this query in %.

Diagram 42 and 43 show the DI for planning and operation functions to be implemented by IMs. Implementation of these functions show a mixed trend relative to the last report.

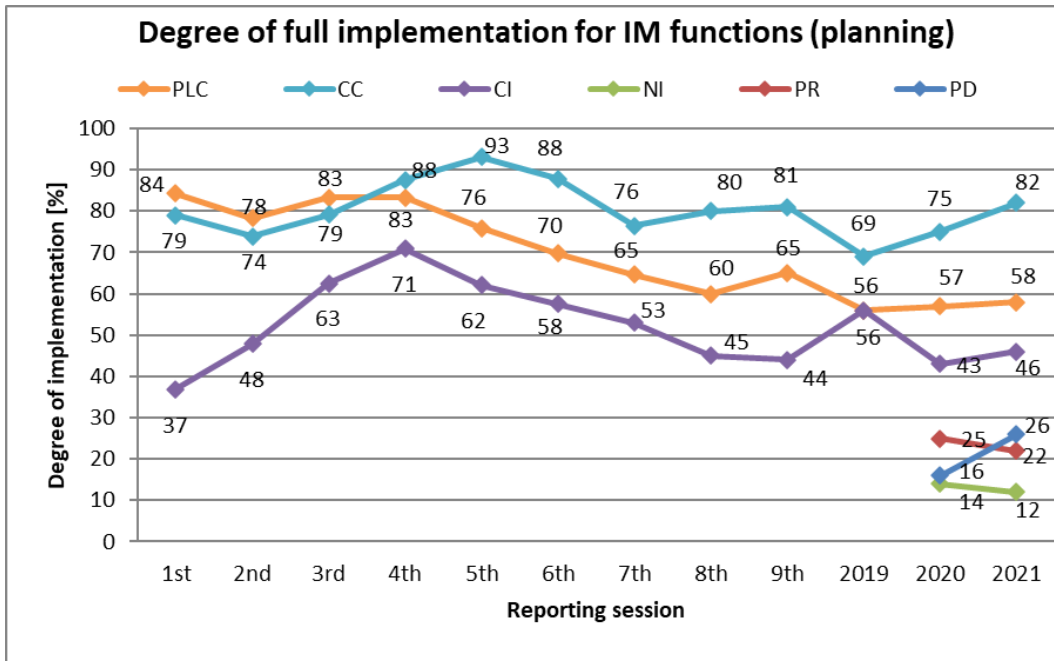


Diagram 42: Reported DI for IM functions (planning)

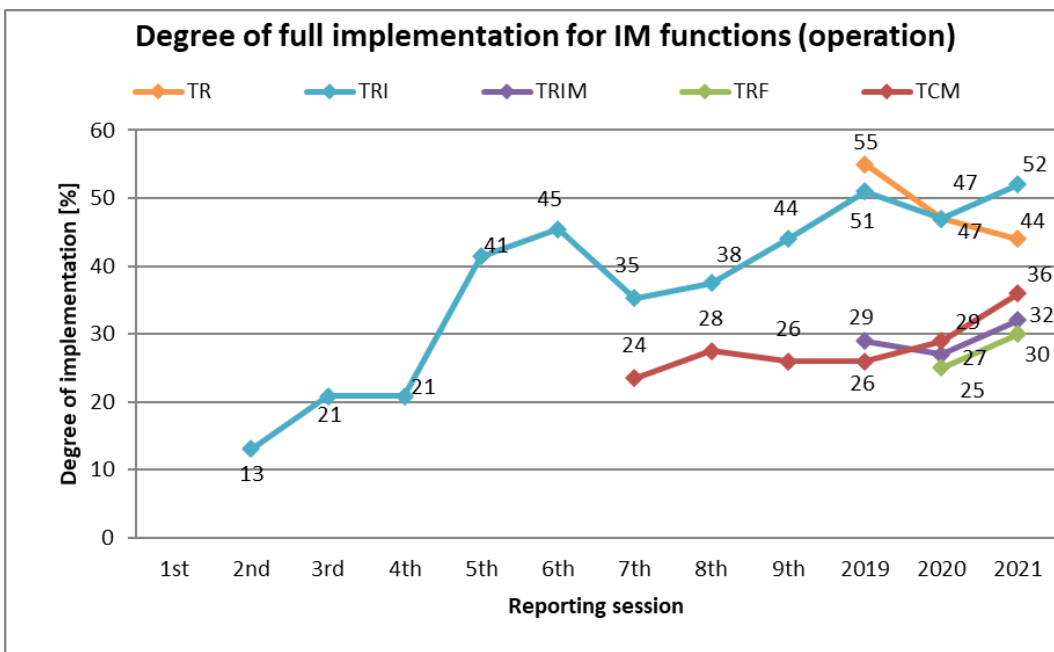


Diagram 43: Reported DI for IM functions (operation)

Diagram 44 and 45 indicate the evolution of implementation for RUs-F functions. Generally, the proportion of RUs having finished implementation is considerably lower than for IMs. The DI for the CC function stays high at 78 % as well as the TR function at 62 %. All other RUs-F show a positive development at lower level.

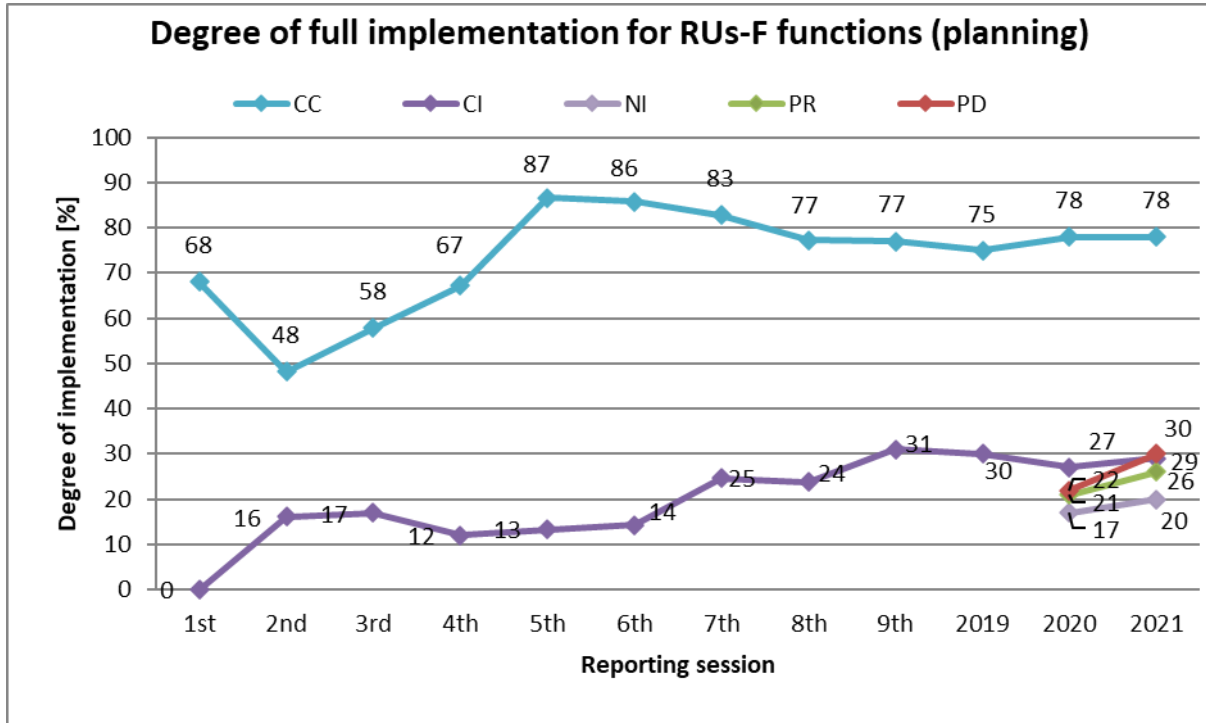


Diagram 44: Reported DI for RUs-F functions (planning)

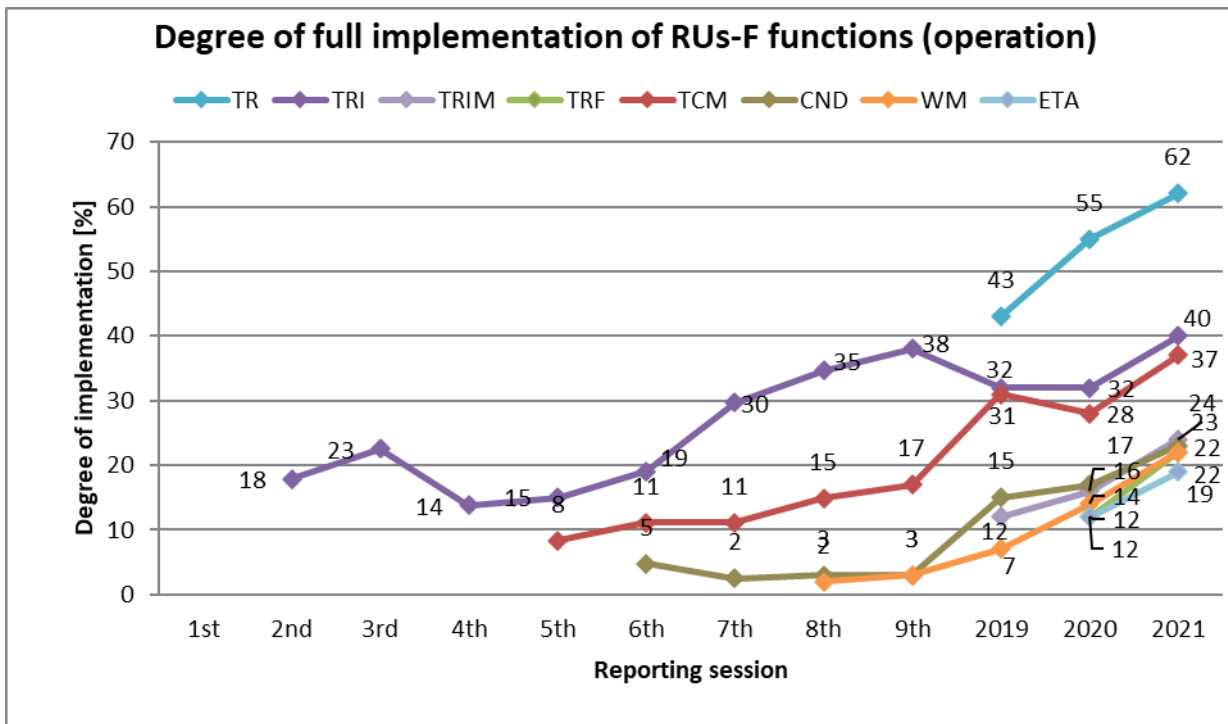


Diagram 45: Reported DI for RUs-F functions (operation)

Diagram 46 shows the reported DIs for the WK functions in the present report.

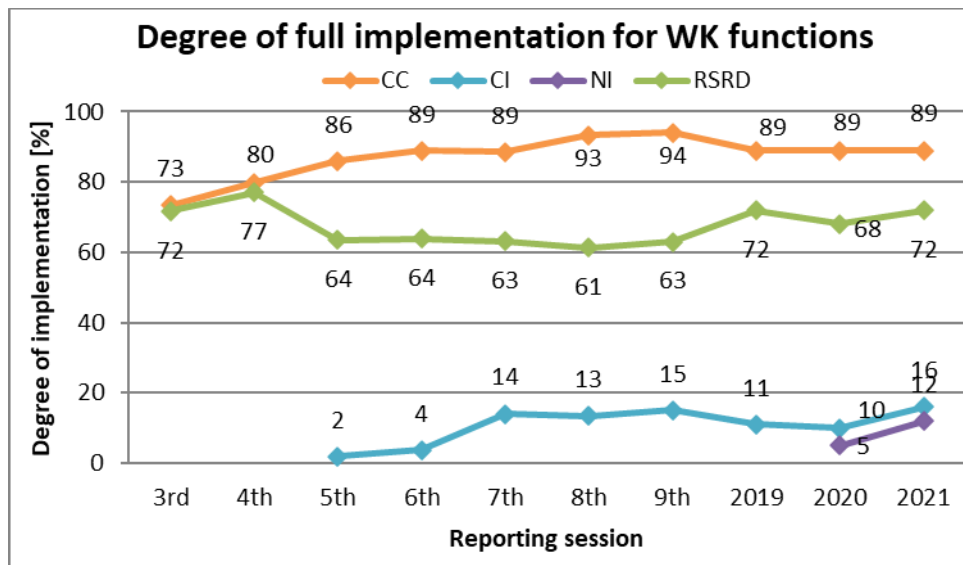


Diagram 46: Reported DI for WK functions

6. IMPLEMENTATION STATUS OF IMS PER COUNTRY

This chapter gives an impression about the state of implementation of TAF functions by IMs in countries across Europe.

The IMs having the longest network have been taken as relevant for the country. For EU Member States those IMs account for at least 90 % of network share. Consequently, these dominating companies play a major role for implementing RU/IM functions in a country. Once they have decided implementing RU/IM communication via TAF/TAP messages, the respective national railway sector will follow and have to adapt.

European maps indicate the level of implementation separately for each function and the dominating IM of the respective country. Where complete implementation has not yet been reached, current planned end date is made visible by colours.

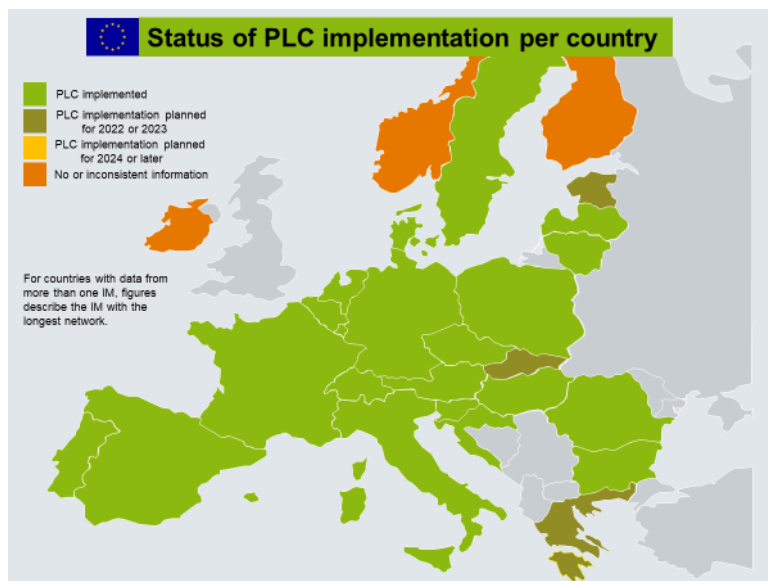


Diagram 47: Implementation of PLC of IMs across European countries

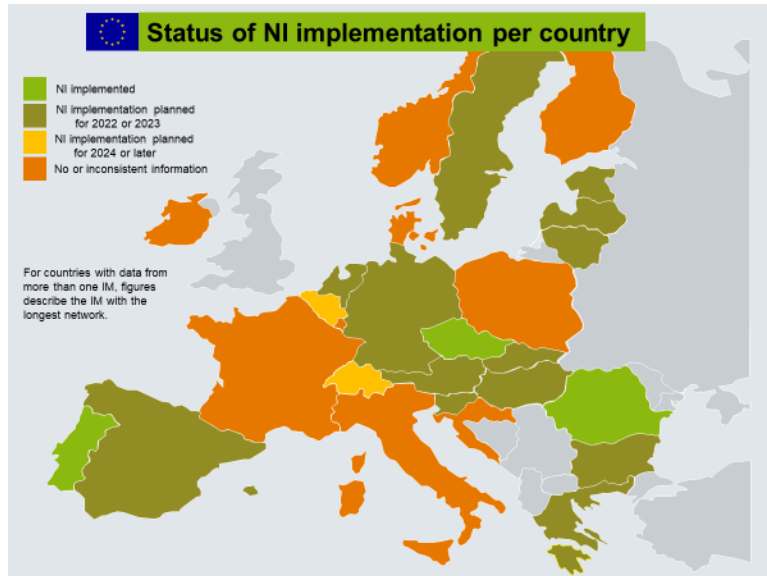


Diagram 48: Implementation of NI of IMs across European countries

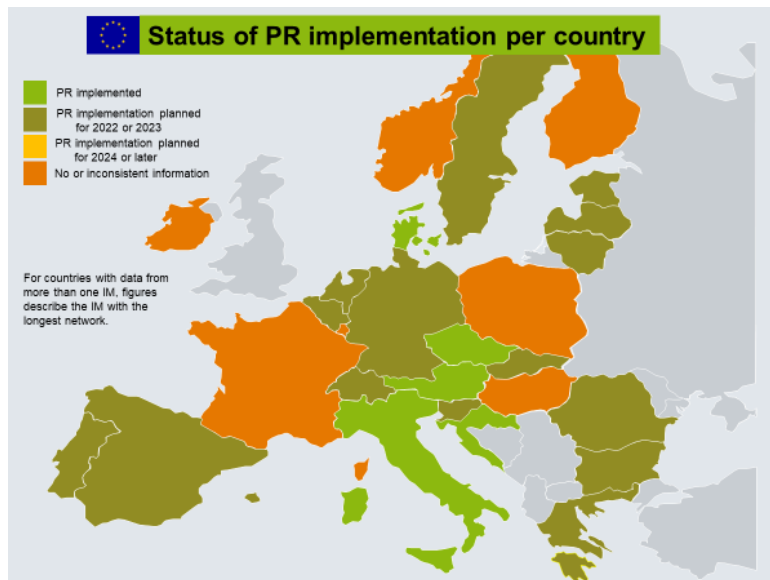


Diagram 49: Implementation of PR of IMs across European countries

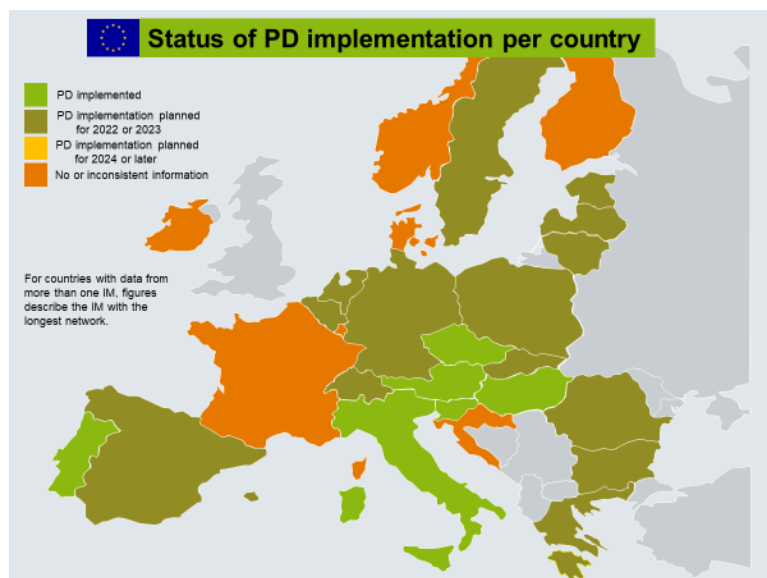


Diagram 50: Implementation of PD of IMs across European countries

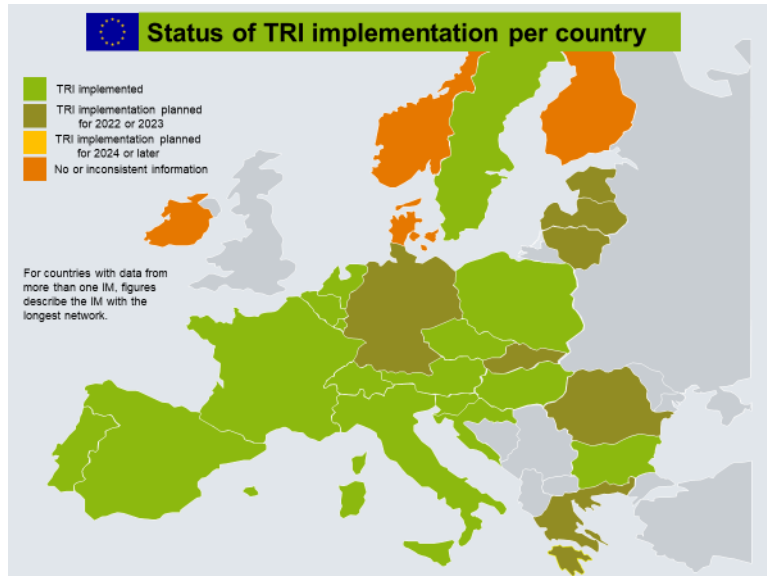


Diagram 51: Implementation of TRI of IMs across European countries

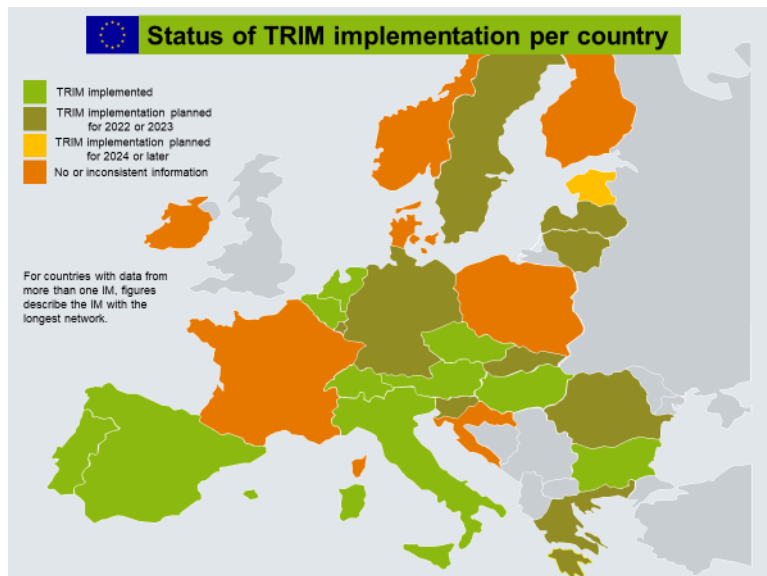


Diagram 52: Implementation of TRIM of IMs across European countries

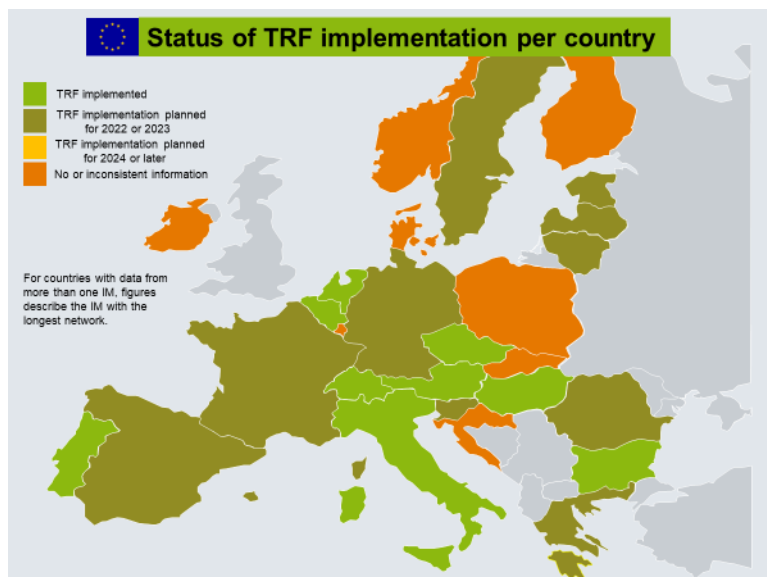


Diagram 53: Implementation of TRF of IMs across European countries

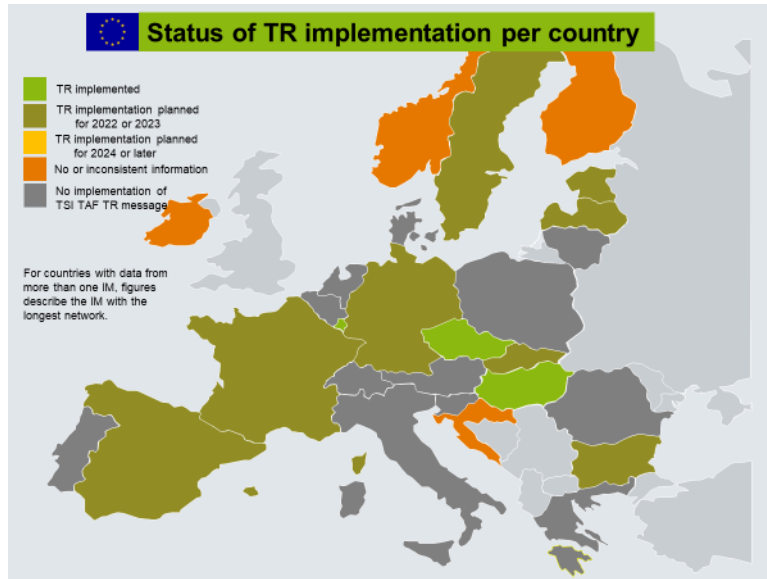


Diagram 54: Implementation of TR of IMs across European countries

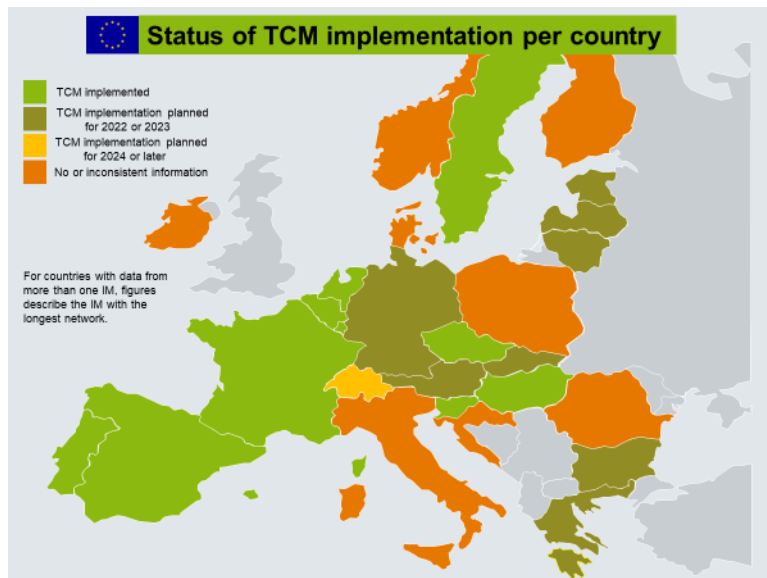


Diagram 55: Implementation of TCM of IMs across European countries

7. COMMON SECTOR TOOLS

Participants of the questionnaire could select all common sector tools in use to meet some specific requirements of the TAF/TAP TSI. The number of companies having indicated using such tools has risen from 557 to 638 by 15 % and are summarised in diagram 56.

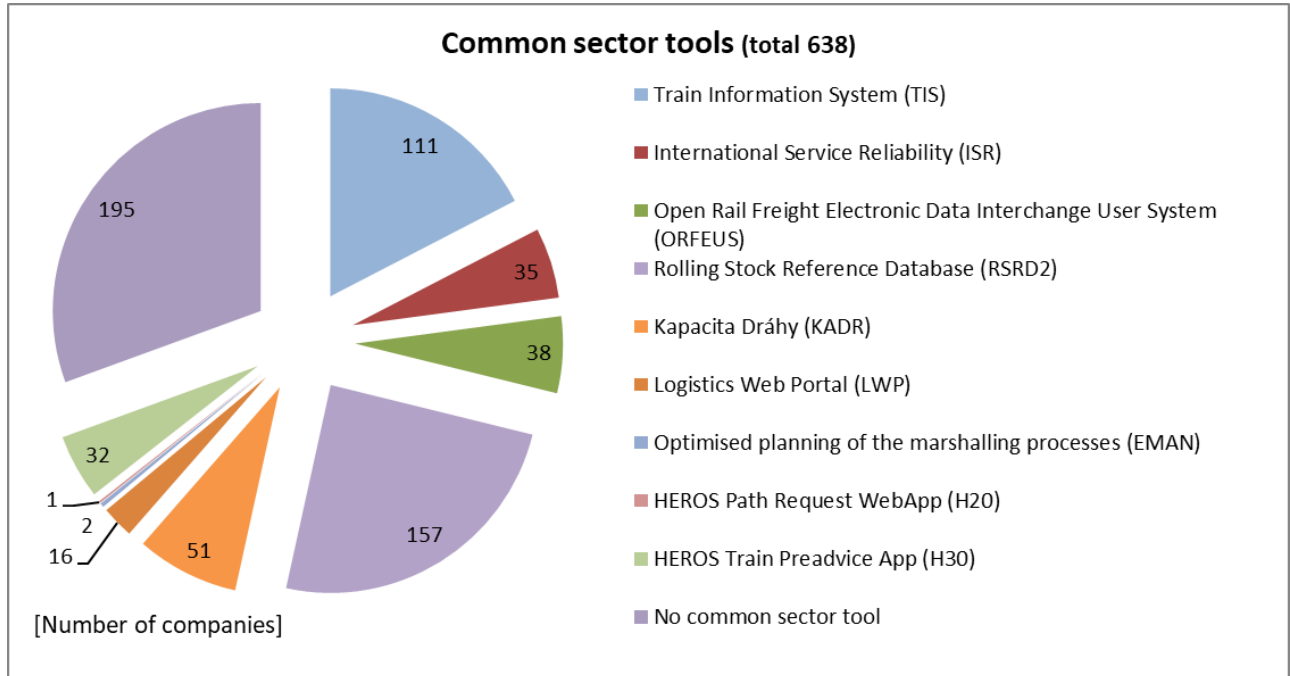


Diagram 56: Common sector tools in use

In line with the increase of the total number of companies, the use of all common sector tools went up.

RSRD² and TIS both stay the most used Common Sector Tools for TAF TSI functions.

8. CONCLUSION AND FINDINGS

As always, the number of companies having responded to the 2021 questionnaire is significantly lower than the number of companies having been invited. The response rate of over 42 % of the current reporting session is quite a good rate regarding the high number of invitations.

There might be different reasons for this positive trend:

- Companies could select to answer the questionnaire in their native language
- Reduction of survey frequency to once a year
- Pandemic crisis forcing more home office
- Higher awareness of the regulation due to new EU subsidies in the CEF calls

The slightly lower participation from RU-P might be related to the switch of the TAP Retail to the same EU Survey tool like the present TAF/TAP TSI IM-RU. Project manager were maybe not aware that they still must complete two different questionnaires.

Since the last report one year ago, invitations and responses have grown again to a new record high. The inclusion of data from the previous reporting session has proved its worth to have a more complete view of the company's feedback and of the current level of implementation. Hence, a total number of 471 responses have been evaluated in this report. This is the highest number since beginning of TAF/TAP monitoring. This includes 91 companies taken over from the 2020 reporting and 145 companies reporting for 2021.

The maps showing the implementation of some functions indicate that many IM's plan the implementation of function in the next two years.

1537 companies responses indicated specific reasons for not implementing TSI TAF TAP functions. Especially feedback related to "Technical reasons" have grown strongly while the percentage for "Insufficient awareness of TAF/TAP requirements" has fallen since the last reporting period. However, the absolute number of 330 companies reporting this reason is the highest ever. Dedicated information sessions should be initiated as a mitigation measure.

The degree of implementation (DI) as set out in diagrams 42 to 46 of this report is calculated from the responses to the questionnaire. If companies not having responded would be also taken into calculation, the degree of implementation would drop off.

To have a better overview for DI, functions were split in planning and operation showing now 11 functions for IM, 13 functions for RU and 4 functions for WK.

The DI for the different TAF functions in the present report shows generally a mixed development:

- positive trends for IM functions PLC, CC, CI, PD, TRI, TRIM, TRF, TCM
- positive trends for all RUs-F functions except CC (unchanged)
- positive trends for all WK function except CC (unchanged)
- negative trends for IM functions NI, PR, TR

Degree of implementation of CC has the highest value for all types of companies.

For some TAF TSI functions there is a strong need to precisely define the compliance with TAF TSI regulation. For example, for the NI, PR and PD functions, companies claim that some requirements and the criteria for fulfilling are still unclear. This task has been initiated from the sector and work is ongoing.

RSRD2 and TIS remain the most used common sector tools following feedback to this survey.

Conclusion and findings for the functions where Common Tools are widely used are getting more and more difficult to accomplish, because the responses from the companies are sometimes contradictory and a deep manual verification of the responses is not possible due to lack of resources and time. Improvements in the future KPI reporting will be discussed with the responsible IT-provider.

ANNEX 1: MEMBERS OF THE IMPLEMENTATION REPORTING GROUP (IRG)

Last Name	First Name	Company	e-mail
Arms (Chair)	Jan-Christian	DB AG	jan-christian.arms@deutschebahn.com
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Heydenreich	Thomas	UIP	rsd@th-heydenreich.de
Massari	Filippo	RFI	f.massari@rfi.it
Möllmann	Jan	DB AG	jan.moellmann@deutschebahn.com
Seimandi	Yann	CER	yann.seimandi@cer.be
Weber	Christian	SNCF	christian.weber@sncf.fr

ANNEX 2: RESPONSES CONTACT LIST 2021

Nr.	Member State	Type of Company	Company name	Reporting Entity
1	AT	IM	ÖBB Infrastruktur AG	
2	AT	RU-F	Rail Cargo Austria	Rail Cargo Carrier Germany
3	AT	WK	Felbermayr Transport- und Hebetchnik GmbH & Co KG	
4	AT	WK	Rail Cargo Austria	Rail Cargo Carrier Germany
5	AT	WK	waggon-service WSG mbH	
6	BE	IM	INFRAABEL	
7	BE	RU-F	DB Cargo Belgium bv	
8	BE	RU-F	Lineas N.V.	Lineas France
9	BE	RU-F	Railtraxx NV	
10	BE	RU-P	THI Factory SA	
11	BE	WK	Lineas N.V.	Lineas France
12	BE	WK	Lineas SA/NV	
13	BE	WK	Mosolf Automotive Railway GmbH	
14	BG	IM	NRIC (National Railway Infrastructure Company)	
15	BG	RU-F	"TRANSPORT CONSTRUCTION AND REHABILITATION " EAD	
16	BG	RU-F	"Порт Рейл" ЕООД	
17	BG	RU-F	"ТБД-Товарни превози" ЕАД	
18	BG	RU-F	BDZ CARGO	
19	BG	RU-F	Bulgarian Railway Company EAD	
20	BG	RU-F	Express Service OOD	
21	BG	RU-F	MMIRL	
22	BG	RU-F	PORTRAIL EOOD	
23	BG	RU-F	Булмаркет Рейл Карго ЕООД	
24	BG	RU-F	Ди Би Карго България ЕООД	
25	BG	WK	Ди Би Карго България ЕООД	
26	CH	IM	BLS-Netz AG	
27	CH	IM	SBB AG Infrastruktur	
28	CH	IM	Schweizerische Südostbahn AG	
29	CH	RU-F	BLS Cargo AG	
30	CH	RU-F	railCare AG	
31	CH	RU-F	SBB Cargo International AG	SBB Cargo Deutschland GmbH – 2385 for Germany and Netherlands SBB Cargo Italia Srl – 2485 for Italy
32	CH	RU-F	Widmer Rail Services AG	
33	CH	WK	CICA SA	
34	CH	WK	DHL FoodLogistics GmbH	

Nr.	Member State	Type of Company	Company name	Reporting Entity
35	CH	WK	Diversified Investments SA	
36	CH	WK	HASTAG (Zürich) AG	
37	CH	WK	MITRAG AG	
38	CH	WK	Osterwalder St. Gallen AG	
39	CH	WK	SBB Cargo AG	
40	CH	WK	TRANSWAGGON AG	
41	CH	WK	VTG Aktiengesellschaft	
42	CH	WK	VTG Schweiz GmbH	
43	CH	WK	WASCOSA AG	
44	CZ	AB	Správa železnic, státní organizace	
45	CZ	IM	ORLEN Unipetrol Doprava, s.r.o.	Slovensko, 3115, ORLEN Unipetrol Doprava, s.r.o.
46	CZ	IM	PDV RAILWAY a.s.	
47	CZ	IM	Správa železnic, státní organizace	
48	CZ	RU-F	ČD Cargo, a.s.	
49	CZ	RU-F	České dráhy, a.s.	
50	CZ	RU-F	CityRail, a.s.	
51	CZ	RU-F	DB Cargo Czechia s.r.o.	
52	CZ	RU-F	DBV-ITL, s.r.o.	
53	CZ	RU-F	EUROVIA CS, a.s.	
54	CZ	RU-F	Gerhát Train s.r.o.	
55	CZ	RU-F	GJW Praha spol. s r.o.	
56	CZ	RU-F	HROCHOSTROJ a.s.	
57	CZ	RU-F	HSL Logistik	HSL Logistik 3699 in SK
58	CZ	RU-F	LokoTrain s.r.o.	
59	CZ	RU-F	LTE Logistik a Transport Czechia s.r.o.	
60	CZ	RU-F	ORLEN Unipetrol Doprava, s.r.o.	Slovensko, 3115, ORLEN Unipetrol Doprava, s.r.o.
61	CZ	RU-F	PDV RAILWAY a.s.	
62	CZ	RU-F	PKP CARGO INTERNATIONAL a.s.	PKP CARGO INTERNATIONAL SK a.s., Slovak Republic, 4366 PKP CARGO INTERNATIONAL HU Zrt, Hungary, 3133 AWT ROSCO a.s., Czechia, 4058
63	CZ	RU-F	Prvá Slovenská železničná, akciová spoločnosť	Prvá Slovenská železničná, akciová spoločnosť branch office RO, HU, CZ
64	CZ	RU-F	Rabbit Rail s.r.o.	
65	CZ	RU-F	Sokolovská uhelná, právní nástupce, a.s.	

Nr.	Member State	Type of Company	Company name	Reporting Entity
66	CZ	RU-F	SUAS Transportation s.r.o.	
67	CZ	RU-F	SUAS Transportation Service s.r.o.	
68	CZ	RU-F	TORAMOS s.r.o.	
69	CZ	RU-F	TSS Grade	
70	CZ	RU-F	Vítkovická doprava a.s.	
71	CZ	RU-P	České dráhy, a.s.	
72	CZ	RU-P	CityRail, a.s.	
73	CZ	RU-P	Die Länderbahn CZ s.r.o.	
74	CZ	RU-P	Leo Express	
75	CZ	WK	ČD Cargo, a.s.	
76	CZ	WK	Česká republika - Správa státních hmotných rezerv	
77	CZ	WK	České dráhy, a.s.	
78	CZ	WK	DIAMO, státní podnik	
79	CZ	WK	EP Cargo Invest	
80	CZ	WK	Ermewa GmbH	
81	CZ	WK	Ermewa SA	
82	CZ	WK	Felbermayr Transport- und Hebetchnik spol.s.r.o.	
83	CZ	WK	HROCHOSTROJ a.s.	
84	CZ	WK	KOS Trading, akciová společnost	
85	CZ	WK	Lafarge Cement, a.s.	
86	CZ	WK	Liberty Ostrava a.s.	
87	CZ	WK	Lovochemie, a.s.	
88	CZ	WK	NH-TRANS, SE	
89	CZ	WK	PKP CARGO INTERNATIONAL a.s.	PKP CARGO INTERNATIONAL SK a.s., Slovak Republic, 4366 PKP CARGO INTERNATIONAL HU Zrt, Hungary, 3133 AWT ROSCO a.s., Czechia, 4058
90	CZ	WK	Prvá Slovenská železničná, akciová spoločnosť	Prvá Slovenská železničná, akciová spoločnosť branch office RO, HU, CZ
91	CZ	WK	RYKO PLUS spol. s r.o.	
92	CZ	WK	ŠKODA AUTO a.s.	
93	CZ	WK	Spolek pro chemickou a hutní výrobu, akciová společnost	
94	CZ	WK	TORAMOS s.r.o.	
95	CZ	WK	V.K.S. Vagon Komerc Speed, s.r.o.	
96	CZ	WK	VÁPENKA VITOŠOV s.r.o.	
97	CZ	WK	ZX-Benet CZ s.r.o.	
98	DE	AB	DB Netz AG	

Nr.	Member State	Type of Company	Company name	Reporting Entity
199	DE	IM	DB Netz AG	
100	DE	IM	Häfen und Güterverkehr Köln AG	
101	DE	RU-F	Bentheimer Eisenbahn AG	
102	DE	RU-F	boxXpress.de GmbH	
103	DE	RU-F	DB Cargo AG	
104	DE	RU-F	Rail Cargo Carrier Germany	Rail Cargo Carrier Germany
105	DE	RU-F	SBB Cargo Deutschland GmbH	SBB Cargo Deutschland GmbH – 2385 for Germany and Netherlands SBB Cargo Italia Srl – 2485 for Italy
106	DE	RU-F	SGL Schienen Güter Logistik	
107	DE	RU-F	SWEG Südwestdeutsche Landesverkehrs-GmbH	
108	DE	RU-P	agilis Eisenbahngesellschaft mbH & Co. KG (BeNEX GmbH)	
109	DE	RU-P	Albtal-Verkehrs-Gesellschaft mbH	
110	DE	RU-P	Bentheimer Eisenbahn AG	
111	DE	RU-P	cantus Verkehrsgesellschaft mbH (BeNEX GmbH)	
112	DE	RU-P	DB Fernverkehr AG	
113	DE	RU-P	DB Regio AG	
114	DE	RU-P	metronom Eisenbahngesellschaft mbH (BeNEX GmbH)	
115	DE	RU-P	NBE nordbahn Eisenbahngesellschaft mbH & Co. KG (BeNEX GmbH)	
116	DE	RU-P	ODEG Ostdeutschen Eisenbahn GmbH (BeNEX GmbH)	
117	DE	RU-P	SWEG Südwestdeutsche Landesverkehrs-GmbH	
118	DE	WK	AlzChem Trostberg GmbH	
119	DE	WK	Aretz GmbH und Co. KG	
120	DE	WK	BASF SE	
121	DE	WK	DB Cargo AG	
122	DE	WK	ERR European Rail Rent GmbH	
123	DE	WK	Euro-Waggon GmbH	
124	DE	WK	GATX Rail Austria GmbH	
125	DE	WK	GATX Rail Germany GmbH	
126	DE	WK	ITL Eisenbahngesellschaft mbH	
127	DE	WK	Kombiverkehr Deutsche Gesellschaft für kombinierten Güterverkehr mbH & Co. KG	
128	DE	WK	Logistik Service GmbH	
129	DE	WK	MFD Rail GmbH	
130	DE	WK	NACCO S.A.S.	
131	DE	WK	On Rail - Gesellschaft für Eisenbahnausrüstung und Zubehör mbH	

Nr.	Member State	Type of Company	Company name	Reporting Entity
132	DE	WK	On Rail Gesellschaft für Vermietung und Verwaltung von Eisenbahnwaggons mbH	
133	DE	WK	Petrochem Mineralöl-Handels-GmbH	
134	DE	WK	Rail Cargo Carrier Germany	Rail Cargo Carrier Germany
135	DE	WK	Railco a.s.	
136	DE	WK	Schienenfahrzeuge Export-Import Handelsgesellschaft mbH - SFH	
137	DE	WK	Schröder & Klaus GmbH & Co. KG	
138	DE	WK	Spedition Kübler GmbH	
139	DE	WK	TRANSWAGGON GmbH	
140	DE	WK	Tyczka Gase GmbH	
141	DE	WK	voestalpine Rail Center Königsborn GmbH	
142	DE	WK	Vossloh Logistics GmbH	
143	DE	WK	VTG Schweiz GmbH (ex AAE)	
144	DE	WK	WASCOSA AG Luzern	
145	DE	WK	Zürcher Bau GmbH	
146	DK	IM	Banedanmark	
147	EE	AB	AS Eesti Raudtee	
148	EE	IM	AS Eesti Raudtee	
149	ES	IM	ADIF	
150	ES	RU-F	Ferrovial Railway	
151	ES	RU-F	GO TRANSPORT SERVICIOS 2018, S.A.	
152	ES	RU-F	Renfe Mercancías S.A.U.	
153	ES	RU-F	Renfe Mercancías SLE	
154	ES	RU-F	Tracción Rail, S.A..	
155	ES	RU-F	Transfesa Logistics S.A.	
156	ES	WK	Ferrocarrils de la Generalitat de Catalunya	
157	ES	WK	Sociedad de estudios y explotacion de material auxiliar de transportes S.A.	
158	ES	WK	VTG Rail Europe GmbH Sucursal en España	
159	FI	RU-F	VR-Group Ltd	
160	FI	RU-P	VR-Group Ltd	
161	FR	IM	SNCF Réseau	
162	FR	RU-F	Captrain France	
163	FR	RU-F	DB CARGO FRANCE	
164	FR	RU-F	EUROPORTE SAS	
165	FR	RU-F	FRET SNCF SAS	
166	FR	RU-F	Lineas France	Lineas France
167	FR	RU-F	SAS OFP Sud-Ouest	
168	FR	RU-P	SNCF Voyageurs SA	
169	FR	RU-P	Trenitalia France	
170	FR	WK	ATIR-RAIL	
171	FR	WK	Lineas France	Lineas France
172	FR	WK	Lotras srl	
173	FR	WK	Millet SAS	

Nr.	Member State	Type of Company	Company name	Reporting Entity
174	FR	WK	SOCOMAC	
175	FR	WK	STVA S.A.	
176	FR	WK	Transportes Ferroviarios Especiales S.A.	
177	FR	WK	VTG Rail Europe GmbH	
178	GR	IM	HELLENIC RAILWAYS ORGANIZATION	
179	HR	IM	HZ Infrastruktura	
180	HR	RU-F	ENNA Transport d.o.o.	
181	HR	RU-F	HŽ-Cargo	
182	HR	RU-F	LOG RAIL d.o.o.	
183	HR	RU-F	Rail&Sea d.o.o.	
184	HR	RU-P	HŽ Putnički prijevoz d.o.o.	
185	HR	WK	HŽ-Cargo	
186	HU	AB	VPE Vasúti Kapacitás-elosztó Kft.	
187	HU	IM	GYSEV Zrt.	
188	HU	IM	MÁV Co.	
189	HU	RU-F	MÁV FKG Felépítménykarbantartó és Gépjavító Korlátolt Felelősségű Társaság	
190	HU	RU-F	MMV Magyar Magánvasút Zártkörűen Működő Részvénytársaság	
191	HU	RU-F	Prvá Slovenská železničná, akciová spoločnosť	Prvá Slovenská železničná, akciová spoločnosť
192	HU	RU-F	Rail Cargo Hungaria Zrt.	
193	HU	RU-P	MÁV-START Zrt	
194	HU	WK	Felbermayr Immo Sp.z.o.o.	
195	HU	WK	GYSEV Cargo Zrt	
196	HU	WK	Prvá Slovenská železničná, akciová spoločnosť	Prvá Slovenská železničná, akciová spoločnosť
197	HU	WK	Rail Cargo Hungaria Zrt.	
198	IT	IM	EAV SRL	
199	IT	IM	Ferrovie del Gargano srl	
200	IT	IM	Ferrovie dello Stato Italiane - Rete Ferroviaria Italiana S.p.A.	
201	IT	IM	Ferrovie Emilia Romagna S.r.l.	
202	IT	IM	FERROVIENORD S.p.A.	
203	IT	IM	GTT SPA	
204	IT	IM	Infrastrutture Venete Srl	
205	IT	IM	La Ferroviaria Italiana S.p.A.	
206	IT	RU-F	BLS Cargo Italia S.r.l.	
207	IT	RU-F	Captrain Italia	
208	IT	RU-F	DB Cargo Italia Srl	
209	IT	RU-F	EVM Rail S.r.l.	
210	IT	RU-F	Fuorimuro Servizi Portuali e Ferroviari srl	
211	IT	RU-F	GTS Rail	
212	IT	RU-F	Hupac SpA	
213	IT	RU-F	InRail S.p.A.	

Nr.	Member State	Type of Company	Company name	Reporting Entity
214	IT	RU-F	Interporto Servizi Cargo spa	
215	IT	RU-F	Medway	
216	IT	RU-F	Mercitalia Shunting & Terminal S.r.l.	
217	IT	RU-F	Trasporto Ferroviario Toscano S.p.A.	
218	IT	RU-F	TX Logistik Transalpine GmbH - Sede secondaria italiana	
219	IT	RU-P	Busitalia Sita Nord S.r.l.	
220	IT	RU-P	Ferrovie del gargano srl	
221	IT	RU-P	Grandi Treni Espresso SpA	
222	IT	RU-P	GTT SPA	
223	IT	RU-P	Mercitalia Shunting & Terminal S.r.l.	
224	IT	RU-P	Sistemi Territoriali Spa	
225	IT	RU-P	Trasporto Ferroviario Toscano S.p.A.	
226	IT	RU-P	Trenitalia SpA	
227	IT	RU-P	Trenitalia Tper S.c.a.r.l.	
228	IT	RU-P	TRENORD srl	
229	IT	WK	Ambrogio Trasporti	
230	IT	WK	CEPRINI COSTRUZIONI S.R.L.	
231	IT	WK	FER RENT S.r.l.	
232	IT	WK	GCF Generale Costruzioni Ferroviarie SpA	
233	IT	WK	Giovanni Ambrosetti Auto Logistica S.p.A	
234	IT	WK	LOTRAS	
235	IT	WK	Mercitalia Intermodal SpA	
236	IT	WK	SITFA SpA	
237	IT	WK	Società Italiana Trasporti Ferroviari Autoveicoli S.p.A.	
238	IT	WK	Vrail s.r.l.	
239	LT	IM	JSC "Lithuanian Railways"	
240	LT	RU-F	JSC "Lithuanian Railways"	
241	LT	RU-P	JSC "Lithuanian Railways"	
242	LT	WK	JSC "Lithuanian Railways"	
243	LU	AB	Administration des chemins de fer	
244	LU	IM	CFL (IM)	
245	LU	RU-F	CFL cargo SA	
246	LU	RU-F	SIBELIT	
247	LU	RU-P	Société Nationale des Chemins de Fer Luxembourgeois (SNCF)	
248	LU	WK	CFL cargo SA	
249	LV	IM	VAS Latvijas dzelzceļš - LDz	
250	LV	RU-F	SIA LDZ Cargo (LDZ Cargo)	
251	LV	WK	SIA LDZ Cargo (LDZ Cargo)	
252	NL	IM	ProRail	
253	NL	RU-F	DB Cargo Nederland N.V.	
254	NL	RU-F	SBB Cargo Deutschland GmbH	SBB Cargo Deutschland GmbH
255	NL	RU-F	VolkerRail Materieel en Logistiek B.V.	

Nr.	Member State	Type of Company	Company name	Reporting Entity
256	NL	WK	Ministerie van Defensie Koninklijke Landmacht Materieellogistiek Commando Land Afdeling Logistiek	
257	NL	WK	RailRelease B.V.	
258	NL	WK	VolkerRail Materieel en Logistiek B.V.	
259	PL	IM	PKP POLSKIE LINIE KOLEJOWE S.A.	
260	PL	IM	PKP Szybka Kolej Miejska w Trójmieście Sp. z o. o.	
261	PL	RU-F	B.R.S. sp. z o.o.	
262	PL	RU-F	Barter S.A.	
263	PL	RU-F	Captrain Polska	
264	PL	RU-F	CARGO Master Sp. z o.o.	
265	PL	RU-F	CD Cargo Poland	
266	PL	RU-F	CEMET S.A.	
267	PL	RU-F	CIECH Cargo	
268	PL	RU-F	CTL Logistics sp. z o.o.	
269	PL	RU-F	DB Cargo Polska S.A.	
270	PL	RU-F	DB Cargo Spedkol Spółka z ograniczoną odpowiedzialnością	
271	PL	RU-F	Dolnośląskie Przedsiębiorstwo Napraw Infrastruktury Komunikacyjnej DOLKOM sp. z o.o	
272	PL	RU-F	Ecco Rail Sp. z o.o.	
273	PL	RU-F	Eurasian Railway Carrier Sp. z o.o.	
274	PL	RU-F	FDM REW Damian Żur	
275	PL	RU-F	HSL Polska	
276	PL	RU-F	IGL Sp. z o.o. Sp.k.	
277	PL	RU-F	Inter Cargo Sp. zo.o.	
278	PL	RU-F	IRT Sp. zo.o.	
279	PL	RU-F	JSW Logistics Spółka z ograniczoną odpowiedzialnością	
280	PL	RU-F	Kolej Bałtycka S.A.	
281	PL	RU-F	LokoTrain s.r.o. Sp. z o.o. Oddział w Polsce	
282	PL	RU-F	LOTOS Kolej Sp. z o.o.	
283	PL	RU-F	Lubelski Węgiel "BOGDANKA" S.	
284	PL	RU-F	METRANS (Polonia) sp. z o.o.	
285	PL	RU-F	NKN Usługi Kolejowe Sp. z o.o.	
286	PL	RU-F	OST-WEST LOGISTIC POLAND	
287	PL	RU-F	PKP Energetyka S.A.	
288	PL	RU-F	Pomorskie Przedsiębiorstwo Mechaniczno - Torowe sp. z o.o.	
289	PL	RU-F	PROTOR Spółka z ograniczoną odpowiedzialnością Spółka komandytowa	
290	PL	RU-F	Przedsiębiorstwo Napraw i Utrzymania Infrastruktury Kolejowej w Krakowie Sp. z o.o.	
291	PL	RU-F	Przedsiębiorstwo Usług Kolejowych KOLPREM Sp. z o.o.	
292	PL	RU-F	Rail Cargo Carrier - Poland Sp. z o.o.	
293	PL	RU-F	Rail Polska Sp. z o.o.	

Nr.	Member State	Type of Company	Company name	Reporting Entity
294	PL	RU-F	Railpolonia sp. z o.o.	
295	PL	RU-F	RailTrans Poland sp. z o.o. sp.k.	
296	PL	RU-F	RuG Polska Sp. z o.o.	
297	PL	RU-F	TKP Silesia Sp. Zo.o. Sp.K	
298	PL	RU-F	TORPOL S.A.	
299	PL	RU-F	Track Tec Logistics sp. z o.o.	
300	PL	RU-F	Track Tec Rail sp. z o.o.	
301	PL	RU-F	Trainspeed Sp. z o.o.	
302	PL	RU-F	Transchem Sp. z o.o.	
303	PL	RU-F	WISKOL 1 Sp. z o.o.	
304	PL	RU-F	Zakład Robót Komunikacyjnych - DOM w Poznaniu spółka z o.o.	
305	PL	RU-F	ZUE S.A.	
306	PL	RU-P	"Koleje Małopolskie" sp. z o.o.	
307	PL	RU-P	"Koleje Mazowieckie - KM" sp. z o.o.	
308	PL	RU-P	Arriva RP Sp. z o.o.	
309	PL	RU-P	B.R.S. sp. z o.o.	
310	PL	RU-P	CARGO Master Sp. z o.o.	
311	PL	RU-P	Koleje Śląskie	
312	PL	RU-P	Łódzka Kolej Aglomeracyjna Sp. z o.o.	
313	PL	RU-P	NKN Usługi Kolejowe Sp. z o.o.	
314	PL	RU-P	PKP Szybka Kolej Miejska w Trójmieście Sp. z o. o.	
315	PL	RU-P	RailTrans Poland sp. z o.o. sp.k.	
316	PL	WK	CEMET S.A.	
317	PL	WK	DB Cargo Polska S.A.	
318	PL	WK	DB Cargo Spedkol Spółka z ograniczoną odpowiedzialnością	
319	PL	WK	Dolnośląskie Przedsiębiorstwo Napraw Infrastruktury Komunikacyjnej DOLKOM sp. z o.o	
320	PL	WK	Ecco Rail Sp. z o.o.	
321	PL	WK	GATX Rail Poland Sp. z o.o.	
322	PL	WK	JSW Logistics Spółka z ograniczoną odpowiedzialnością	
323	PL	WK	Lotos Kolej Sp. z o.o.	
324	PL	WK	Lubelski Węgiel "BOGDANKA" S.	
325	PL	WK	PKP Energetyka S.A.	
326	PL	WK	Pomorskie Przedsiębiorstwo Mechaniczno - Torowe sp. z o.o.	
327	PL	WK	Przedsiębiorstwo Napraw i Utrzymania Infrastruktury Kolejowej w Krakowie Sp. z o.o.	
328	PL	WK	Rail Polska Sp. z o.o.	
329	PL	WK	Tankwagon Sp. z o. o.	
330	PL	WK	TORPOL S.A.	
331	PL	WK	Transchem Sp. z o.o.	
332	PL	WK	Zakład Robót Komunikacyjnych - DOM w Poznaniu spółka z o.o.	

Nr.	Member State	Type of Company	Company name	Reporting Entity
333	PL	WK	ZUE S.A.	
334	PT	IM	Infraestruturas de Portugal	
335	PT	RU-F	Medway - Operador Ferroviário e Logístico de Mercadorias, SA	
336	PT	RU-F	Takargo	
337	PT	RU-P	CP - Comboios de Portugal EPE	
338	PT	RU-P	FERTAGUS,S.A.	
339	PT	WK	ADP Fertilizantes, S.A.	
340	PT	WK	CIMPOR – SERVIÇOS, S.A.	
341	PT	WK	Medway - Operador Ferroviário e Logístico de Mercadorias, SA	
342	PT	WK	Takargo, Transporte de Mercadorias, S.A.	
343	RO	IM	CFR	
344	RO	RU-F	DB Cargo Romania	
345	RO	RU-F	Prvá Slovenská železničná, akciová spoločnosť	Prvá Slovenská železničná, akciová spoločnosť
346	RO	WK	Prvá Slovenská železničná, akciová spoločnosť	Prvá Slovenská železničná, akciová spoločnosť
347	RO	WK	TOUAX Rail Ltd.	
348	RS	WK	ARS Altmann AG	
349	SE	IM	Inlandsbanan AB	
350	SE	IM	Trafikverket	
351	SE	RU-F	CFL cargo Sverige AB	
352	SE	RU-F	Green Cargo	
353	SE	WK	Green Cargo	
354	SE	WK	Stena Recycling AB	
355	SE	WK	TRANSWAGGON AB	
356	SI	IM	ORLEN Unipetrol Doprava, s.r.o.	ORLEN Unipetrol Doprava, s.r.o.
357	SI	IM	SŽ Infrastruktura, d.o.o.	
358	SI	RU-F	ORLEN Unipetrol Doprava, s.r.o.	ORLEN Unipetrol Doprava, s.r.o.
359	SI	RU-F	SŽ Tovorni promet	
360	SI	WK	Adria kombi d.o.o.	
361	SK	IM	Slovak Railways - Železnice Slovenskej republiky	
362	SK	RU-F	Bulk Transshipment Slovakia, a.s.	
363	SK	RU-F	DMG, s. r. o.	
364	SK	RU-F	Hornonitrianske Bane zamestnanecká , akciová spoločnosť	
365	SK	RU-F	HSL Logistik	HSL Logistik
366	SK	RU-F	I.G.Rail, s.r.o.	
367	SK	RU-F	PKP CARGO INTERNATIONAL a.s.	PKP CARGO INTERNATIONAL
368	SK	RU-F	Prvá Slovenská železničná, akciová spoločnosť	Prvá Slovenská železničná, akciová spoločnosť
369	SK	RU-F	Rail Support, s.r.o.	

Nr.	Member State	Type of Company	Company name	Reporting Entity
370	SK	RU-F	Railtran International, a.s.	
371	SK	RU-F	SK - H Trans, s.r.o.	
372	SK	RU-F	SLOV-VAGON, a.s.	
373	SK	RU-F	U.S.Steel Košice s.r.o	
374	SK	RU-F	Železničná spoločnosť Cargo Slovakia, a.s.	
375	SK	WK	BUDAMAR LOGISTICS, a.s.	
376	SK	WK	Cargo Wagon, a.s.	
377	SK	WK	Duslo, a.s.	
378	SK	WK	EEWS, spol. s r. o.	
379	SK	WK	Felbermayr Slovakia s.r.o.	
380	SK	WK	Hornonitrianske Bane zamestnanecká , akciová spoločnosť	
381	SK	WK	PKP CARGO INTERNATIONAL a.s.	PKP CARGO INTERNATIONAL
382	SK	WK	Prvá Slovenská železničná, akciová spoločnosť	Prvá Slovenská železničná, akciová spoločnosť
383	SK	WK	SLOV-VAGON, a.s.	
384	TR	WK	TRANSWAGGON Vagon Isletmeleri Ltd. Sti.	
385	UK	RU-F	DB Cargo UK	

ANNEX 3: RESPONSES CONTACT LIST 2020

Nr.	Member State	Type of Company	Company name	Reporting Entity
1	AT	IM	Graz-Köflacher Bahn und Busbetrieb GmbH	
2	AT	RU-F	Cargo Service GmbH	
3	AT	RU-F	ecco-rail GmbH	
4	AT	RU-F	Graz-Köflacher Bahn und Busbetrieb GmbH	
5	AT	RU-F	LTE Austria GmbH	
6	AT	RU-F	Raaberbahn Cargo	
7	AT	RU-F	RTS Rail Transport Service GmbH	
8	AT	RU-P	Graz-Köflacher Bahn und Busbetrieb GmbH	
9	AT	WK	Graz-Köflacher Bahn und Busbetrieb GmbH	
10	BG	RU-F	Rail Cargo Carrier - Bulgaria Ltd	
11	BG	RU-F	TSV EAD	
12	BG	RU-F	ЕКСПРЕС СЕРВИЗ ООД	
13	CZ	IM	KŽC Doprava, s.r.o.	
14	CZ	RU-F	Cargo Motion s.r.o.	
15	CZ	RU-F	KŽC Doprava, s.r.o.	
16	CZ	RU-F	LOKO TRANS s.r.o	
17	CZ	RU-F	TCHAS ŽD	
18	CZ	RU-P	KŽC Doprava, s.r.o.	
19	CZ	RU-P	LOKO TRANS s.r.o	
20	CZ	WK	Českomoravský cement, a.s.	
21	CZ	WK	LOKO TRANS s.r.o	
22	CZ	WK	Railco a.s.	
23	CZ	WK	Vápenka Čertovy schody a.s.	
24	DE	RU-F	boxXpress.de GmbH	
25	DE	RU-F	DAHER PROJECTS GmbH	
26	DE	RU-P	Die Länderbahn GmbH DLB	
27	DE	WK	Mosolf Automotive Railway GmbH	
28	DK	IM	Øresundsbro Konsortiet	
29	EE	IM	Edelaraudtee AS	
30	EE	RU-F	AS Gorail	
31	EE	RU-P	AS Gorail	
32	ES	RU-F	Captrain España	
33	ES	RU-F	TRANSITIA RAIL, S.A.	
34	GR	RU-F	PEARL	
35	HU	RU-F	LTE Hungária Kft.	
36	IT	IM	FERROVIE UDINE CIVIDALE	
37	IT	RU-F	FERROVIE UDINE CIVIDALE	
38	IT	RU-P	FERROVIE UDINE CIVIDALE	
39	IT	RU-P	Italo - Nuovo Trasporto Viaggiatori S.p.A.	
40	IT	RU-P	SAD - Trasporto Locale SpA	

Nr.	Member State	Type of Company	Company name	Reporting Entity
41	IT	RU-P	TRENTINO TRASPORTI SPA	
42	IT	WK	FERROVIE UDINE CIVIDALE	
43	NL	RU-F	Railexperts BV	
44	NL	RU-F	Shunter Tractie BV	
45	NL	RU-F	Strukton Rail Equipment BV	
46	NL	RU-P	Connexion Openbaar Vervoer N.V.	
47	NL	RU-P	Railexperts BV	
48	NL	RU-P	Strukton Rail Equipment BV	
49	NL	WK	Sim Boerema BV	
50	NL	WK	Strukton Rail Equipment BV	
51	NO	RU-F	CargoNet AS	
52	PL	IM	MAJKOLTRANS SP. Z O.O.	
53	PL	IM	PCC INTERMODAL	
54	PL	RU-F	Cargo Przewozy Towarowe Transport	
55	PL	RU-F	Freightliner PL	
56	PL	RU-F	Grupa Azoty "KOLTAR" Sp. z o.o.	
57	PL	RU-F	LTE Polska	
58	PL	RU-F	MAJKOLTRANS SP. Z O.O.	
59	PL	RU-F	OLREN Koltrans S.A.	
60	PL	RU-F	PCC INTERMODAL	
61	PL	RU-F	Przedsiębiorstwo Budownictwa Specjalistycznego „Transkol” Sp. z o.o.	
62	PL	RU-F	Przedsiębiorstwo Robót Torowych "TORREMS" sp. z o.o.	
63	PL	RU-F	Transchem Sp. z o.o.	
64	PL	RU-F	Zakład Inżynierii Kolejowej Sp. z o.o.	
65	PL	RU-P	Grupa Azoty "KOLTAR" Sp. z o.o.	
66	PL	RU-P	Koleje Wielkopolskie Sp. z o.o.	
67	PL	RU-P	OLREN Koltrans S.A.	
68	PL	RU-P	Przedsiębiorstwo Budownictwa Specjalistycznego „Transkol” Sp. z o.o.	
69	PL	RU-P	Transchem Sp. z o.o.	
70	PL	RU-P	Zakład Inżynierii Kolejowej Sp. z o.o.	
71	PL	WK	Grupa Azoty "KOLTAR" Sp. z o.o.	
72	PL	WK	MAJKOLTRANS SP. Z O.O.	
73	PL	WK	OLREN Koltrans S.A.	
74	PL	WK	Przedsiębiorstwo Budownictwa Specjalistycznego „Transkol” Sp. z o.o.	
75	PL	WK	Transchem Sp. z o.o.	
76	PL	WK	Zakład Inżynierii Kolejowej Sp. z o.o.	
77	PT	WK	CIMPOR - Serviços de Apoio à Gestão de Empresas, S.A.	
78	SE	IM	Svensk Tågkraft AB. Nässjö Järnvägsfastigheter AB	
79	SE	IM	Tågåkeriet i Bergslagen AB	
80	SE	RU-F	Hector Rail AB	
81	SE	RU-F	Svensk Tågkraft AB. Nässjö Järnvägsfastigheter AB	

Nr.	Member State	Type of Company	Company name	Reporting Entity
82	SE	RU-F	Tågåkeriet i Bergslagen AB	
83	SE	RU-F	TX Logistik AB	
84	SE	RU-P	Tågåkeriet i Bergslagen AB	
85	SE	RU-P	Vy Tåg AB	
86	SE	WK	Tågåkeriet i Bergslagen AB	
87	SI	RU-F	Ten Rail d.o.o.	
88	SK	RU-F	LTE Logistik a Transport Slovakia s.r.o.	LTE Logistik
89	SK	WK	Cargo Wagon, a.s.	
90	UK	IM	Network Rail Infrastructure Limited	
91	UK	RU-F	EUROTRANS Sp. z o.o. w Małaszewiczach Dużych	

Disclaimer

The RU/IM Telematics Joint Sector Group (JSG)

The JSG was set up in October 2012 as a voluntary organisation supported by nine European Associations involved in the implementation of the rail technical specifications for interoperability of the Telematic Application for Freight (TAF TSI).

<http://taf-jsg.info/>