# Report of the TAF TSI Implementation for 2019

**RU/IM Telematics Joint Sector Group (JSG)** 

January 2020



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# **Document history**

Version	Name	Changes	Date
0.1	Jan-Christian Arms	Initial version	27.01.2020
0.2	Jan-Christian Arms	Document ready for IRG	04.02.2020
0.3	Jan-Christian Arms	Document ready for ERA/IRG consultation	05.02.2020
1.0	Jan-Christian Arms	Document approved at JSG	06.02.2020

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#### **EXECUTIVE SUMMARY**

This TAF TSI implementation report summarized the results received via the JSG Reporting Tool in November/December 2019 and thus shows the status of implementation by 31 December 2019.

In line with the growing number of invitations in the present survey, feedback has also improved.

Regarding the TAF TSI functions reported, the following Levels of Fulfilment can be observed:

- Most IMs reported to have completed the Primary Location Codes on their network.
- Most of companies (around 70 %) are identified by Company Code.
- The level of fulfilment for <u>Common Interface</u> shows a remarkable difference between IMs, RUs-F and WKs. Half of IMs and one third of RUs have already implemented, while most of WKs are still developing.
- About one third of IMs and RUs-F stated implementing the <u>Train Ready function</u> using the respective TAF message.
- About 50 % of participating IMs and 30 % of participating RUs-F have <u>Train Running Information</u> in production.
- The level of fulfilment shows 10 IMs and 9 RUs-F with complete implementation of the <u>Train</u> Running Interruption Message.
- Figures show nearly a doubling in terms of complete implementation of <u>Train Composition Message</u> for RUs-F to 30 % and a stable level for IMs
- Two-third of the RUs-F companies (53 out of 87) started implementing the <u>Consignment Note Data</u> function, out of which thirteen having finished.
- Six RUs-F are ready to exchange the Wagon Movement messages.
- Implementation of the <u>Wagon and Intermodal Unit Operating Database</u> function rests at very low level of fulfilment with eight companies having it in production.
- A large number WKs fulfil the <u>Rolling Stock Reference Database</u> functionality via the common sector tool RSRD<sup>2</sup>. There are eighty-four WKs having RSRD in production.

At European level the <u>Degrees of Implementation</u> show indifferent trends over time as follows:

- Decline of implementation of <u>IMs</u> functions might partly be explained by the growing number of smaller IMs taking part, which normally are not advanced in TAF/TAP implementation.
- Generally, the proportion of <u>RUs</u> having finished implementation is considerably lower than for IMs. However, there are some positive trends at a low degree of implementation visible.
- For WKs the evolution of implementation remains stable.

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 real situation.

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#### 1. BACKGROUND TO THE ASSIGNMENT

According to Article 5, Section 1, of Commission Regulation (EU) No 1305/2014 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.

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#### 2. METHODOLOGY

#### General assumptions

Starting with the 6<sup>th</sup> Reporting session, 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 compared to their own Master Plan target date. In case there is no company Master Plan it should be reported against the target implementation date.
- 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 integrates also data from wagon keepers using RSRD2 submitted by UIP.

This report summarised the results received via the JSG Reporting Tool during the 2019 reporting period lasting from 18 November 2019 to 13 December 2019 and thus shows the status of implementation by 31 December 2019. Diagrams in the following chapters of this report show results per RU/IM function summarised in an anonymous way.

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

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

Table 1: Reporting periods

The '2019 TAF/TAP TSI Implementation Report' questionnaire contains thirteen question groups, eleven of which are about the current implementation of TAF and TAP TSI functions:

TAF/	TAP TSI functions for RU/IM communication to be	Type of company				
imple	emented/reported per type of company	IM RU-F RU-P WK				AB
	Primary Location Codes (PLC)	X				
	Company Code (CC)	Х	Х	Χ	Χ	Χ
	Common Interface (CI)	X	X	Χ	Χ	X
	Train Ready (TR) - new	X	X	Χ		
function	Train Running Information (TRI)	X	X	Χ		
	Train Running Interrupted Message (TRIM) - new	X	X	Χ		
	Train Composition Message (TCM)	X	X			
	Consignment Note Data (CND)		X			
ΙδΡ	Wagon Movement (WM)		X			
TAF/TAP	Wagon InterModal unit Operational database (WIMO)		X			
	Rolling Stock Reference Database (RSRD)				Χ	

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
- Sector Tools in use

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 6 February 2020 and published accordingly. It will be presented at the ERA TAF TSI Implementation Cooperation Group meeting on 11 March 2020.

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



#### 3. PARTICIPATION IN THE 2019 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.

The 2019 report includes 72 WKs submitted by UIP using RSRD<sup>2</sup>.

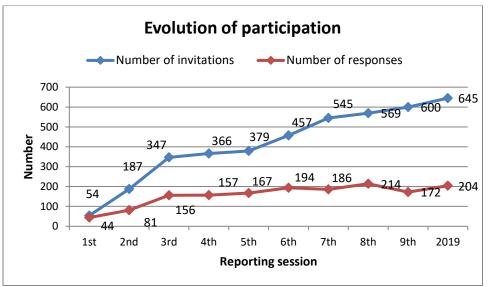


Diagram 1: Evolution of participation over time

Hence, the response rate, calculated as number of responses in relation to number of invitations, has grown to 31,6% (see diagram 2).

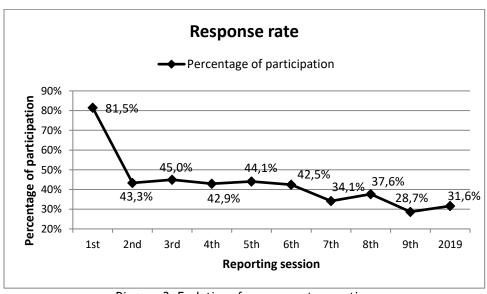


Diagram 2: Evolution of response rate over time

Diagram 3 displays the distribution of total responses per country. The feedback comprises 22 EU Member States plus Switzerland and Turkey.

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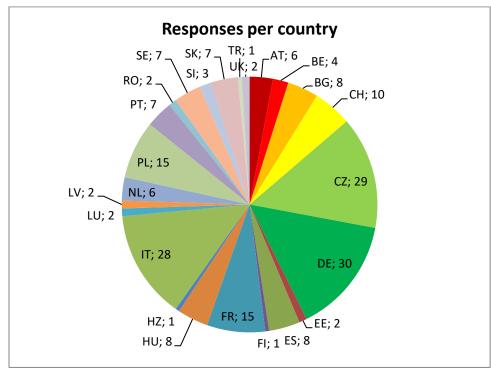


Diagram 3: Number of responses per country

Diagram 4 shows the distribution and the development of responses per country. The total number of responses in the 2019 reporting period is 204, which is 32 more than in the last session.

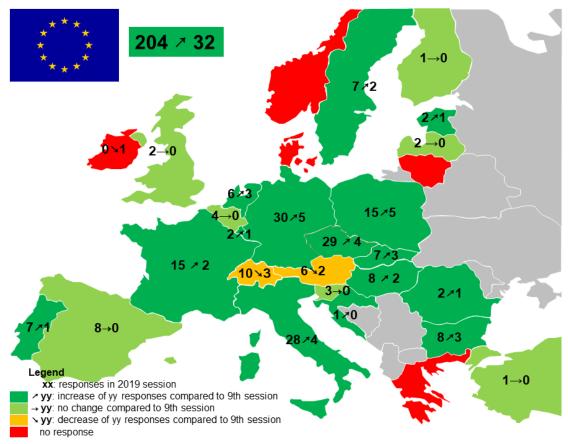


Diagram 4: Evolution of responses per country

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### Participation per company type

Some companies in this survey may have multiple roles, such as RU and WK at the same time. Therefore, the total number of responses displayed in diagram 1 (204 companies) and listed in Annex 2 is lower than the total number of company types shown in diagram 5 hereafter (250 companies).

Compared to the previous survey, participation for all types of company has grown.

Annex 2 'Responses contact list 2019' to this report gives a detailed overview about the companies per country having replied to the 2019 session of TAF and TAP TSI implementation monitoring. Please note, that there are entities which have reported on behalf of several companies.

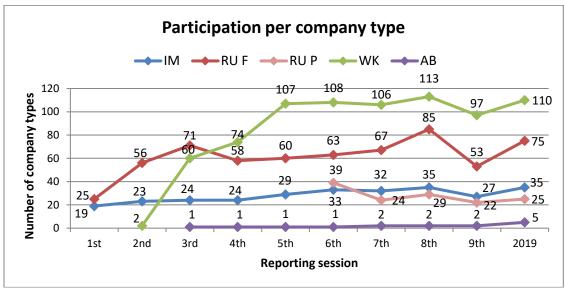


Diagram 5: Evolution of participating per company type over time

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#### 4. DATA BASIS FOR EVALUATION

To establish a wider sector representation, 26 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 (271) with their allocation to the following reporting sessions:

- Companies only reporting to the 9<sup>th</sup> reporting session (top with light colour)
- Companies reporting to both 9<sup>th</sup> and 2019 reporting session (middle with normal colour)
- New companies reporting to the 2019 reporting session only (bottom with dark colour)

The data included in this report thus represents the data since July 2018.

The number of companies taken over from the last reporting is relatively low (26) while the number of new companies in the present session is relatively high (74).

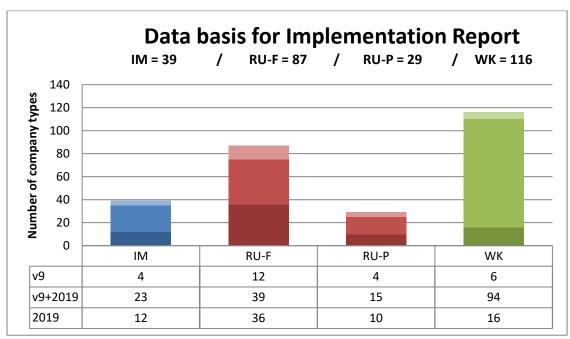


Diagram 6: Number of types of company per reporting session

Annex 3 'Responses contact list v9' to this report lists the companies per country having replied to the eighth session of TAF and TAP TSI implementation monitoring and not to the present one.

Since the seventh reporting session, replies from the previous survey have each time been considered. Diagram 7 displays this time, a falling number of company types as data basis for evaluation.

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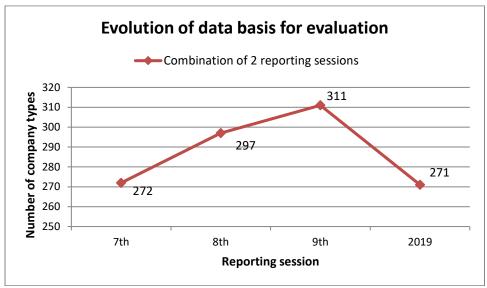


Diagram 7: Number of types of company per reporting session

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#### 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 defined 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 22 IMs with complete implementation. 4 out of 39 IMs in the evaluation are considered with data from the previous survey.

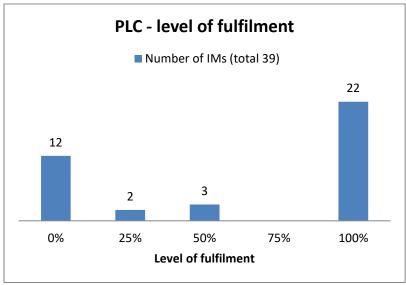


Diagram 8: Common Reference Files - Primary Location Codes (PLC)

Diagram 9 shows the decrease of complete implementation of PLC in relation to the declining number of IM responses.

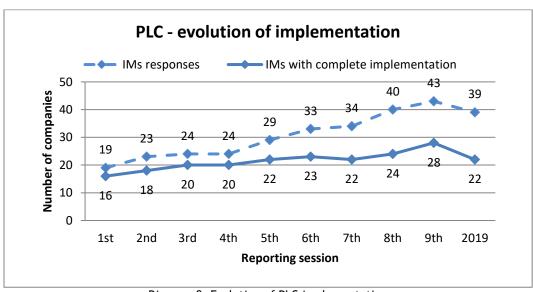


Diagram 9: Evolution of PLC implementation

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# 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.

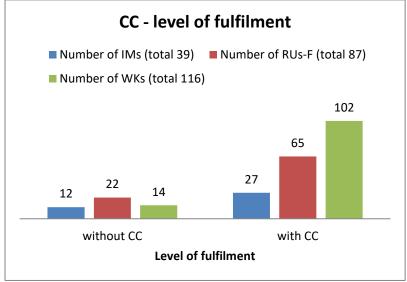


Diagram 10: Common Reference Files - Company Codes (CC)

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

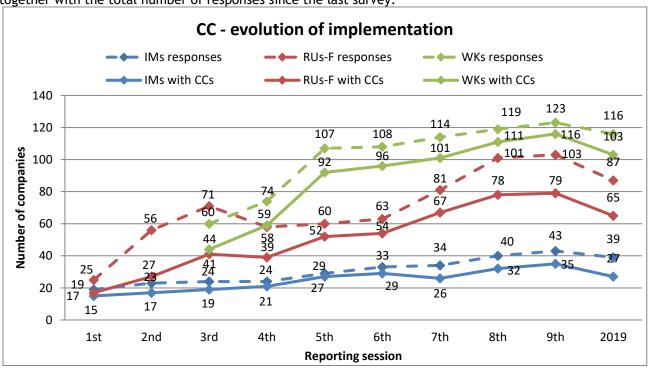


Diagram 11: Evolution of implementation for Company Codes

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#### 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 22 IMs, 26 RUs-F and 13 WKs. RSRD<sup>2</sup> has yet not implemented the CI. WKs using RSRD<sup>2</sup> therefore form part of the 25% level.

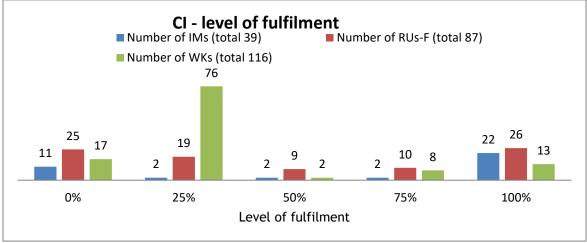


Diagram 12: Common Reference Files - Common Interface (CI)

The development of complete implementation of the CI over time according to diagram 13 shows again the relation to the number of responses per company type. There is positive evolution of CI in production for IMs and negative evolution for RUs-F and WKs up to December 2019.

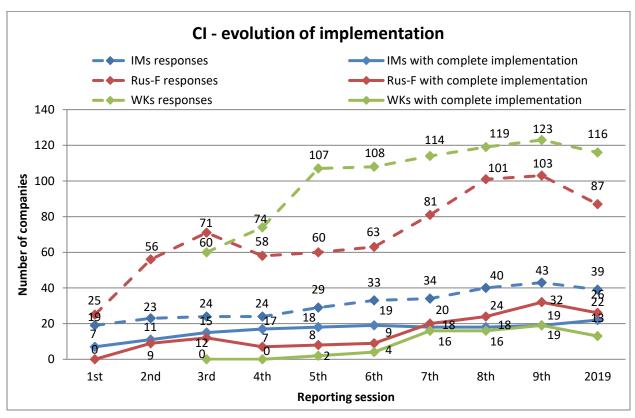


Diagram 13: Evolution of implementation for Common Interface

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#### 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. Companies using other means of implementation in accordance with the TSIs remain out of consideration.

The level of fulfilment of diagram 14 shows 6 IMs and 12 RUs-F with 100% implementation of the TAF message. This function is reported for the first time and no evolution of implementation is available.

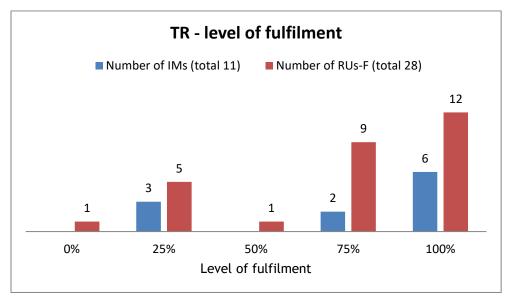


Diagram 14: Train Ready (TR)

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#### 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 % complete fulfilment and TAF messages sent or received by Common Interface are counted as 100 % fulfilment.

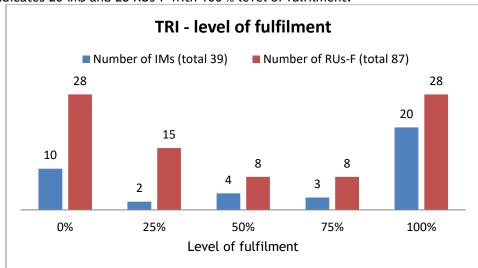


Diagram 15 indicates 20 IMs and 28 RUs-F with 100 % level of fulfilment.

Diagram 15: Train Running Information (TRI)

Regarding diagram 16, the number of IMs having implemented completely the TRI increased in comparison to the previous reporting session. Contrary to that, the number of RUs-F decreased at a lower level of participation.

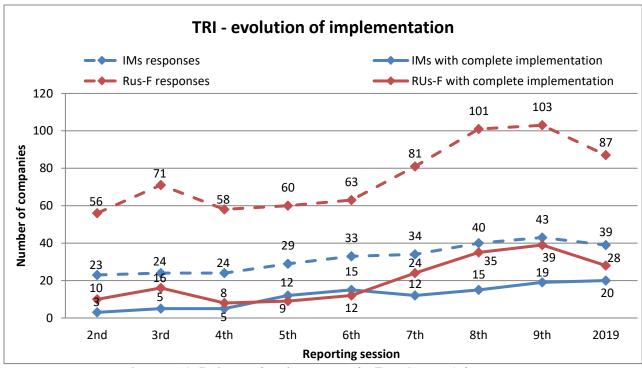


Diagram 16: Evolution of implementation for Train Running Information

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Diagram 17 gives an impression about the state of implementation of TRI by IMs in countries across Europe. The IMs having the longest network have been taken as relevant for the country. For IMs still in development the current planned end date and the respective level of fulfilment is shown in diagram 17.

In CH, CZ and HU there are two IMs having completed TRI implementation. Among the IMs there are 11 small companies, such as harbours, having responded to this survey. Contrary to the level of fulfilment of dominating IMs, such small companies across Europe have not even started projects.

Compared to the situation one year ago, one additional country has completed implementation of TRI.

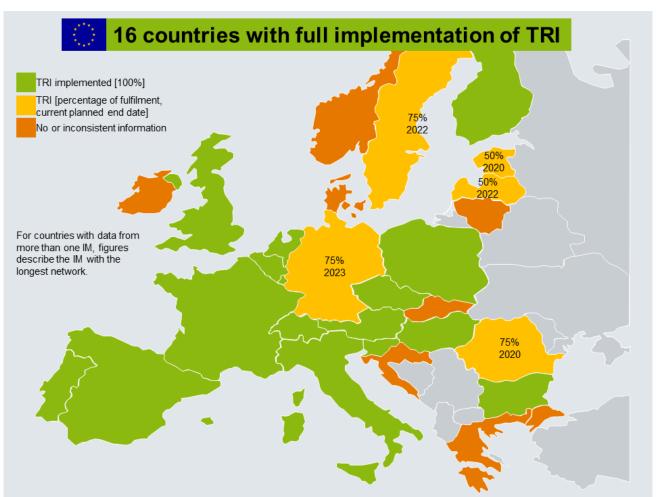


Diagram 17: Implementation of TRI of IMs across European countries

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## Train Running Interrupted Message (IMs and RUs-F)

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

This function is reported for the first time. Hence, the totality of companies is lower as no results from the previous survey exist. Furthermore, no evolution of implementation is available.

The level of fulfilment of diagram 18 shows 10 IMs and 9 RUs-F with complete implementation of the TRIM message.

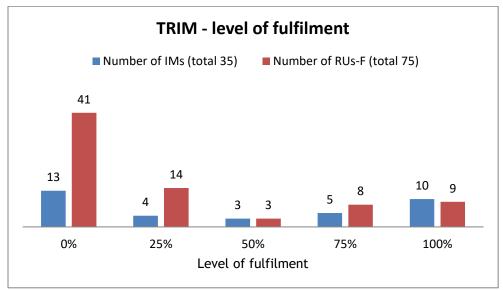


Diagram 18: Train Running Interrupted Message (TRIM)

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#### 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. 12 IMs and 27 RUs-F have implemented TCM completely.

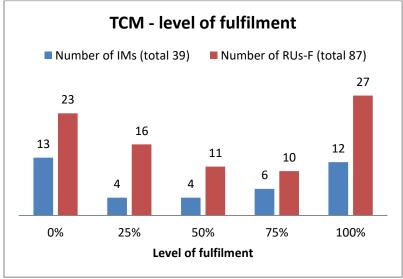


Diagram 19: Train Composition Message (TCM)

Figures show increase in terms of complete implementation of TCM since last reporting session. 27 RUs-F out of 87 which replied to the survey have completely implemented the TCM while 12 out of 39 IMs have finished their duty.

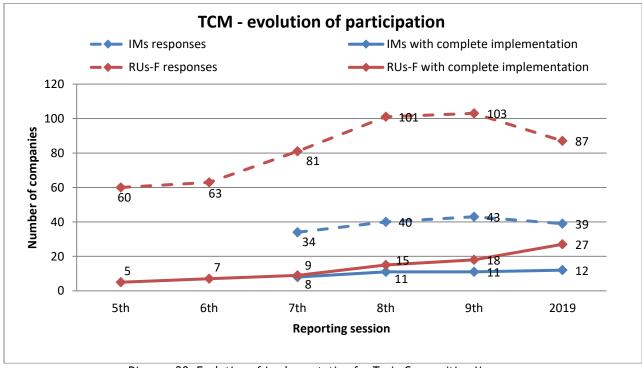


Diagram 20: Evolution of implementation for Train Composition Message

The European map (diagram 21) indicates the level of implementation regarding the TCM function for dominating IMs in each country. Where complete implementation has not yet been reached, current planned end date and level of fulfilment is given.

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Among the IMs there are small companies, such as harbours, which have not even started projects.

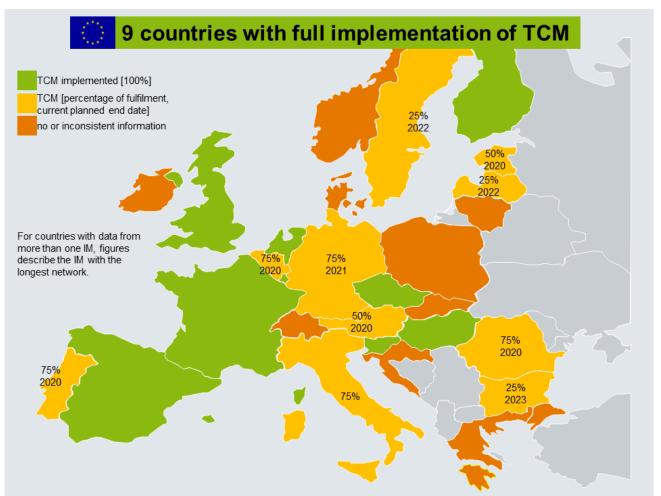


Diagram 21: Implementation of TCM of IMs across European countries

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## 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.

Diagram 22 indicates only 13 RUs-F out of 87 having finished implementation of CND.

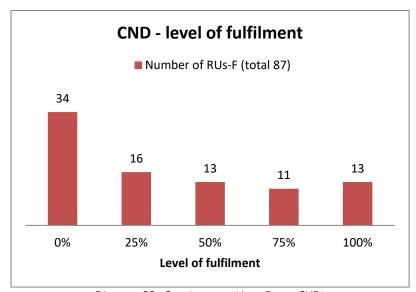


Diagram 22: Consignment Note Data (CND)

Contrary to the evolution of responses the evolution of implementation for CND increases quite significantly for this function (diagram 23).

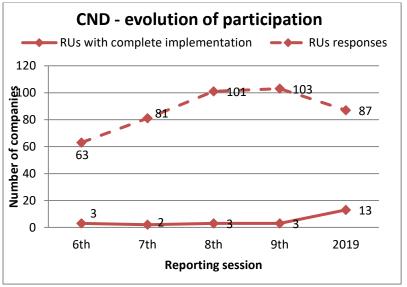


Diagram 23: Evolution of implementation for Consignment Note Data (CND)

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## 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.

Responses to this questionnaire indicate 6 RUs-F having completed the WM function from a total of 87 companies.

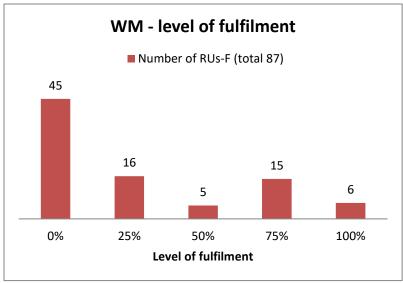


Diagram 24: Wagon Movement (WM)

Despite the positive evolution of implementation for WM, it rests at a low level (diagram 25).

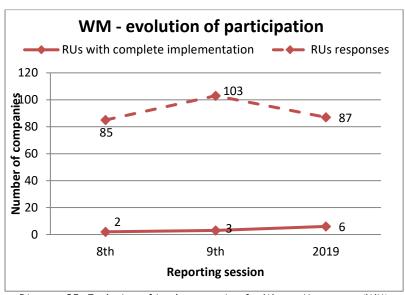


Diagram 25: Evolution of implementation for Wagon Movement (WM)

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#### Wagon and Intermodal Unit Operating Database (RUs-F)

The Target Implementation Milestone for realisation of the Wagon and Intermodal Unit Operating Database function (WIMO) according to the TAF TSI Masterplan was 2016.

The 'Wagon and Intermodal Unit Operating Database' function (WIMO) is relevant for RUs-F only. However, IMs realising this function on behalf of RUs-F are not considered in the present report.

This function remains at a low level of fulfilment with 8 companies having this function in production. The reason for this must be further investigated. Companies claim that some requirements and the criteria for fulfilling are still unclear (diagram 26).

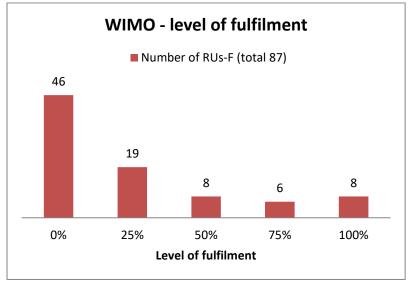


Diagram 26: Wagon and Intermodal Unit Operating Database

Diagram 27 indicates the low degree of completion for WIMO with a little sign of improvement over time.

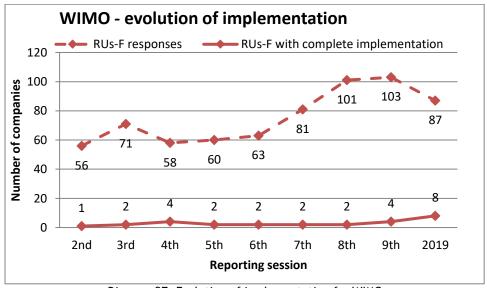


Diagram 27: Evolution of implementation for WIMO

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# 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 RSRD<sup>2</sup>. Information delivered by UIP for RSRD<sup>2</sup> means 100% of fulfilment. 84 WKs have implemented this function, out of which 72 WKs thanks to RSRD<sup>2</sup>.

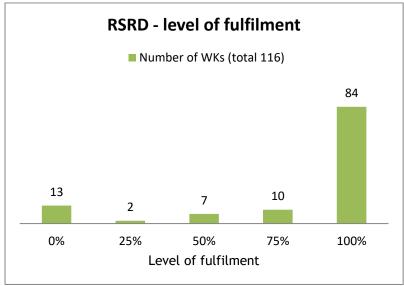


Diagram 28: Rolling Stock Reference Database

Following the lower participation to the survey, the evolution of implementation remains growing compared to the previous report (see diagram 29).

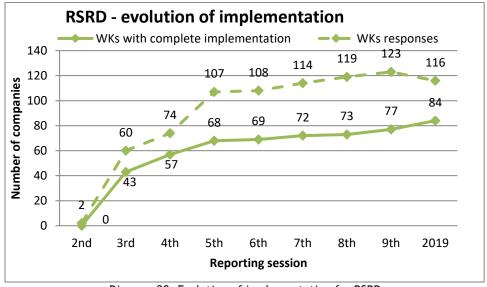


Diagram 29: Evolution of implementation for RSRD

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#### 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 30 gives a summary of the reasons selected by the companies.

Feedback regarding reasons for not implementing went down slightly by minus 17 in total in line with slight decrease in terms of participation to the survey.

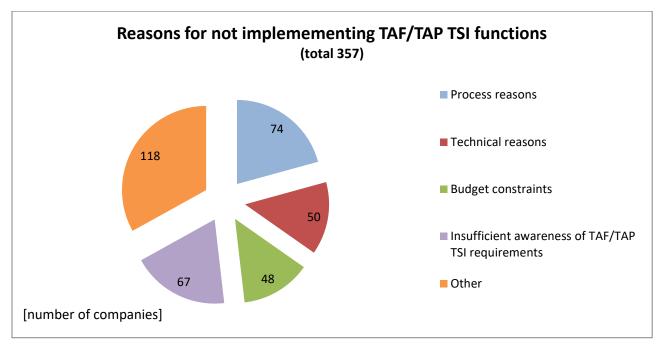


Diagram 30: Reasons for not starting implementation of TAF/TAP TSI functions

Diagram 31 gives a closer look to the development of 'Insufficient awareness of TAF/TAP TSI requirements' over time.

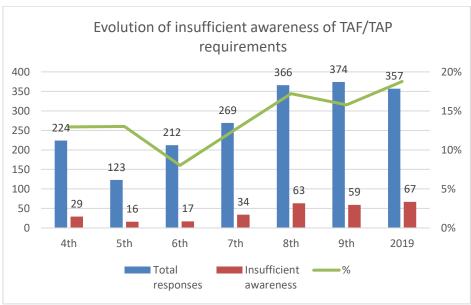


Diagram 31: Evolution of insufficient awareness of TAF/TAP requirements

The percentage given in diagram 31 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

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out, that this percentage increased about 11 % since the  $6^{th}$  reporting session to the maximum value of 19 % last year. Dedicated information sessions should be initiated as a mitigation measure.

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## 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 32 shows the DI for functions to be implemented by IMs. Implementation of these functions shows a mixed trend relative to the last report. The TR and TRIM functions, both reported for the first time, reach a degree of implementation of 55 % and 29 %.

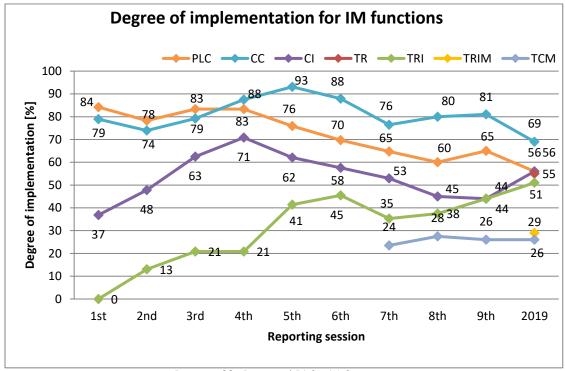


Diagram 32: Reported DI for IM functions

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Diagram 33 indicates 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 75 %. The other RUs-F functions stagnate at a low level of around 30 % and less, but mostly with a positive development.

Functions monitored for the first time have a DI of 43 % (TR) and 12 % (TRIM).

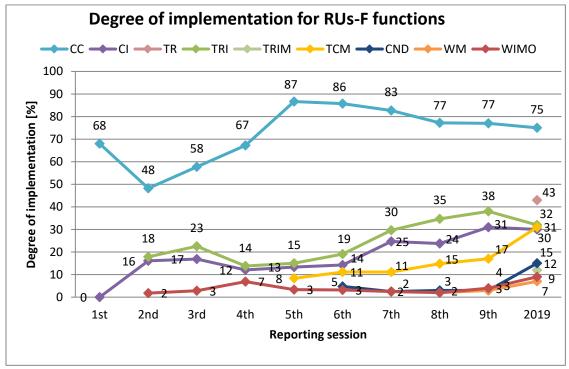


Diagram 33: Reported DI for RUs-F functions

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Diagram 34 shows a positive trend for the reported DI for the RSRD function in the present report. DIs for CC and CI declined since last monitoring.

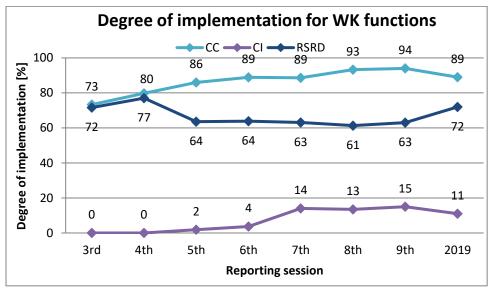


Diagram 34: Reported DI for WK functions

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#### 6. 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 fallen from 476 to 387 and are summarised in diagram 33.

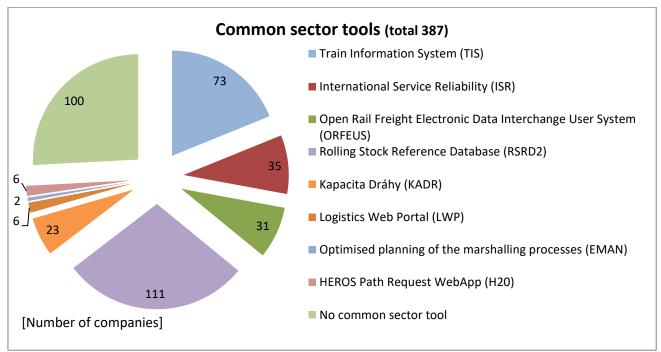


Diagram 35: Common sector tools in use

In line with the reduction of the total number of companies, the use of all common sector tools went down (except for LWP and H20 at a very low level).

RSRD<sup>2</sup> and TIS both stay the most used Common Sector Tools.

In respect to the responses received from relevant types of companies,  $RSRD^2$  is in use by about 90 % and TIS is in use by about 50 % of its potential users included in this query.

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#### 7. CONCLUSION AND FINDINGS

The number of companies having responded to the 2019 questionnaire is, as always, significantly lower than the number of companies having been invited. The response rate of 31 % of the current reporting session is one of the lowest since the beginning of reporting. There might be different reasons for this negative trend:

- Companies are getting tired answering the same questions
- Little progress within the company to be reported

Participation has improved compared to the previous reporting session. The inclusion of data from the previous reporting session is an effort to have a more complete view of the company's feedback and of the current level of implementation. As a result of the higher response in the current reporting session only 26 types of companies of the previous reporting could be included.

The degree of implementation (DI) for the different TAF functions (diagrams 32 to 34) in the present report shows generally a mixed development. The DI declines for the PLC and CC functions of IMs, the CC and TRI functions of RUs and the CC and CI functions of WKs. Such a development is not logic for the implementation of the TAF TSI functions. However, this is an important lesson learned from the current reporting process, which urgently needs to be improved. A stable basis of the most important companies in terms of market share participating to the survey is a condition to improve quality.

Degree of implementation of CC has the highest value for all types of companies. For all other functions the degree of implementation for IMs is higher than the one for RUs.

For some TAF TSI functions there is a strong need to precisely define the compliance with TAF TSI regulation. For example, for the WIMO function, 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.

The evolution of insufficient awareness of TAF/TAP requirements is steadily growing to the maximum value of 19 % in 2019. Dedicated information sessions should be initiated as a mitigation measure.

The degree of implementation (DI) as set out in diagrams 32 to 34 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.

RSRD<sup>2</sup> and TIS remain the most used common sector tools following feedback to this survey. 90 % of responding companies benefit from RSRD<sup>2</sup>, while it is 50 % for TIS.

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# 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
Achermann	Rudolf	SBB	rudolf.achermann@sbb.ch
Heydenreich	Thomas	UIP	rsd@th-heydenreich.de
Lo Duca	Carmen	Trenitalia	c.loduca@trenitalia.it
Seimandi	Yann	CER	yann.seimandi@cer.be
Weber	Christian	SNCF	christian.weber@sncf.fr

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# **ANNEX 2: RESPONSES CONTACT LIST 2019**

Nr.	Member State	Type of Company	Company name	Reporting Entity
1	AT	IM	ÖBB Infrastruktur AG	
2	AT	RU-F	Wiener Lokalbahnen Cargo GmbH	
3	AT	RU-F, WK	Rail Cargo Austria	
4	AT	WK	Felbermayr Transport- und Hebetechnik GmbH & Co KG	RSRD <sup>2</sup>
5	AT	WK	NACCO S.A.S.	RSRD <sup>2</sup>
6	AT	WK	VTG Austria Ges.m.b.H.	RSRD <sup>2</sup>
7	BE	IM	INFRABEL	
8	BE	RU-F, WK	Lineas N.V.	
9	BE	WK	Lineas SA/NV	RSRD <sup>2</sup>
10	BE	WK	Mosolf Automotive Railway GmbH	RSRD <sup>2</sup>
11	BG	IM	NRIC (National Railway Infrastructure Company)	
12	BG	RU-F	"TBD-Tovarni prevozi" JSC	
13	BG	RU-F	BDZ Cargo	
14	BG	RU-F	Bulgarian Railway Company	
15	BG	RU-F	EXPRESS SERVICE OOD	
16	BG	RU-F	Rail Cargo Carrier - Bulgaria Ltd	
17	BG	RU-F, WK	DB Cargo Bulgaria EOOD	
18	BG	RU-P	BDZ-Passengers	
19	СН	IM	BLS-Netz AG	
20	СН	IM	Schweizerische Südostbahn AG	
21	СН	RU-F	BLS Cargo	
22	СН	RU-F	SBB Cargo International	SBB Cargo International
23	СН	RU-F	WRS Widmer Rail Services AG	WRS Widmer Rail Services AG
24	СН	WK	Diversified Investments SA	RSRD <sup>2</sup>
25	СН	WK	HASTAG (Zürich) AG	RSRD <sup>2</sup>
26	СН	WK	MITRAG AG	RSRD <sup>2</sup>
27	СН	WK	SBB Cargo AG	RSRD <sup>2</sup>
28	СН	WK	TRANSWAGGON AG	RSRD <sup>2</sup>
29	CZ	IM, RU-F	UNIPETROL Doprava s.r.o.	Unipetrol Group
30	CZ	IM, WK, AB	Správa železniční dopravní cesty (SŽDC)	
31	CZ	RU-F	DBV-ITL, s.r.o.	
32	CZ	RU-F	SLEZSKOMORAVSKÁ DRÁHA a.s.	
33	CZ	RU-F	Sokolovská uhelná, právní nástupce, a.s.	
34	CZ	RU-F	TCHAS ŽD s.r.o.	
35	CZ	RU-F, RU-P	LTE Logistik a Transport Slovakia s.r.o.	LTE Group
36	CZ	RU-F, RU-P, WK	Ceske drahy, a.s.	
37	CZ	RU-F, WK	ČD Cargo, a.s.	
38	CZ	RU-F, WK	PKP CARGO INTERANTIONAL a.s.	

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Nr.	Member State	Type of Company	Company name	Reporting Entity
39	CZ	wĸ	Česká republika - Správa státních hmotných rezerv	
40	CZ	WK	Ceskomoravsky cement	
41	CZ	WK	Coal Services a.s.	
42	CZ	WK	DIAMO, státni podnik	RSRD <sup>2</sup>
43	CZ	WK	Ermewa GmbH	RSRD <sup>2</sup>
44	CZ	WK	Ermewa SA	RSRD <sup>2</sup>
45	CZ	WK	Felbermayr Transport- und Hebetechnik spol.s.r.o.	RSRD <sup>2</sup>
46	CZ	WK	KOS Trading, akciová společnost	RSRD <sup>2</sup>
47	CZ	WK	Lafarge Cement, a.s.	RSRD <sup>2</sup>
48	CZ	WK	Liberty Ostrava a.s.	RSRD <sup>2</sup>
49	CZ	WK	Lovochemie, a.s.	RSRD <sup>2</sup>
50	CZ	WK	NH-TRANS, SE	3562
51	CZ	WK	RYKO PLUS spol. s r.o.	RSRD <sup>2</sup>
52	CZ	WK	ŠKODA AUTO a.s.	RSRD <sup>2</sup>
53	CZ	WK	Spolek pro chemickou a hutní výrobu, akciová společnost	
54	CZ	WK	Státní podnik DIAMO	
55	CZ	WK	V.K.S. Vagon Komerc Speed, spol. s r.o.	RSRD <sup>2</sup>
56	CZ	WK	Vápenka Čertovy schody a.s.	
57	CZ	WK	VÁPENKA VITOŠOV s.r.o.	
58	DE	IM	DB Netz AG	
59	DE	IM	Häfen und Güterverkehr Köln AG	
60	DE	IM	SWS Seehafen Stralsund GmbH	
61	DE	RU-F	SBB Cargo Deutschland GmbH	SBB Cargo International
62	DE	RU-F	WRS Deutschland	WRS Widmer Rail Services AG
63	DE	RU-P	DB Regio AG	
64	DE	WK	AlzChem Trostberg GmbH	RSRD <sup>2</sup>
65	DE	WK	Aretz GmbH und Co. KG	RSRD <sup>2</sup>
66	DE	WK	BASF SE	RSRD <sup>2</sup>
67	DE	WK	DAHER PROJECTS GmbH	RSRD <sup>2</sup>
68	DE	WK	ERR European Rail Rent GmbH	RSRD <sup>2</sup>
69	DE	WK	GATX Rail Austria GmbH	RSRD <sup>2</sup>
70	DE	WK	GATX Rail Germany GmbH	RSRD <sup>2</sup>
71	DE	WK	ITL Eisenbahngesellschaft mbH	RSRD <sup>2</sup>
72	DE	WK	Kombiverkehr Deutsche Gesellschaft für kombinierten Güterverkehr mbH & Co. KG	RSRD <sup>2</sup>
73	DE	WK	Logistik Service GmbH	RSRD <sup>2</sup>
74	DE	WK	NACCO GmbH	RSRD <sup>2</sup>
75	DE	WK	On Rail - Gesellschaft für Eisenbahnausrüstung und Zubehör mbH	RSRD <sup>2</sup>
76	DE	WK	On Rail Gesellschaft für Vermietung und Verwaltung von Eisenbahnwaggons mbH	RSRD <sup>2</sup>
77	DE	WK	Petrochem Mineralöl-Handels-GmbH	RSRD <sup>2</sup>

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Nr.	Member State	Type of Company	Company name	Reporting Entity
78	DE	WK	Propangas AG	RSRD <sup>2</sup>
79	DE	WK	Railco a.s.	RSRD <sup>2</sup>
80	DE	WK	TRANSWAGGON GmbH	RSRD <sup>2</sup>
81	DE	WK	Tyczka Gase GmbH	RSRD <sup>2</sup>
82	DE	WK	voestalpine Rail Center Königsborn GmbH	RSRD <sup>2</sup>
83	DE	WK	Vossloh Logistics GmbH	RSRD <sup>2</sup>
84	DE	WK	VTG Aktiengesellschaft	RSRD <sup>2</sup>
85	DE	WK	VTG Schweiz GmbH	RSRD <sup>2</sup>
86	DE	WK	WASCOSA AG Luzern	RSRD <sup>2</sup>
87	DE	WK	Zürcher Bau GmbH	RSRD <sup>2</sup>
88	EE	IM	Estonian Railways	
89	EE	WK, AB	Operal AS	
90	ES	RU-F	ACCIONA RAIL SERVICES S.A	
91	ES	RU-F	Captrain España	
92	ES	RU-F	Logitren Ferroviaria	
93	ES	RU-F	TRANSITIA RAIL	
94	ES	RU-F, RU-P	CONTINENTAL RAIL, S.A.U.	
95	ES	WK	Ferrocarrils de la Generalitat de Catalunya	RSRD <sup>2</sup>
96	ES	WK	Sociedad de estudios y explotacion de material auxiliar de transportes S.A.	RSRD <sup>2</sup>
97	ES	WK	VTG Rail Europe GmbH Sucursal en España	RSRD <sup>2</sup>
98	FI	RU-F, RU-P	VR-Group Ltd	
199	FR	IM	SNCF Réseau	
100	FR	RU-F	Eurotporte	
101	FR	RU-F	SNCF MOBILITES - Fret	
102	FR	RU-F	VFLI	
103	FR	RU-P	SNCF Mobilités Voyageurs	
104	FR	WK	ATIR-RAIL	RSRD <sup>2</sup>
105	FR	WK	EVS S.A.	RSRD <sup>2</sup>
106	FR	WK	Lotras srl	RSRD <sup>2</sup>
107	FR	WK	Millet SAS	RSRD <sup>2</sup>
108	FR	WK	SNCF MOBILITES MATERIEL	3391
109	FR	WK	SOCOMAC	RSRD <sup>2</sup>
110	FR	WK	STVA S.A.	RSRD <sup>2</sup>
111	FR	WK	Transportes Ferroviarios Especiales S.A.	RSRD <sup>2</sup>
112	FR	WK	VTG France SAS	RSRD <sup>2</sup>
113	FR	WK	VTG Rail Europe GmbH	RSRD <sup>2</sup>
114	HU	AB	VPE Vasúti Pályakapacitás-elosztó Kft.	
115	HU	IM	GYSEV Zrt.	
116	HU	IM	Hungarian State Railways	
117	HU	RU-F	MÁV FKG Ltd.	
118	HU	RU-F, WK	Rail Cargo Hungaria Zrt.	
119	HU	RU-P	MÁV-START	
120	HU	WK	Felbermayr Immo Sp.z.o.o.	RSRD <sup>2</sup>

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Member State	Type of Company	Company name	Reporting Entity
HU	WK	Záhony-Port Zrt	
HZ	RU-F	Transagent Rail	
IT	IM	Ferrovie Emilia Rogmagna	
IT	IM	FERROVIENORD	
IT	IM	La Ferroviaria Italiana S.p.A.	
IT	IM	RETE FERROVIARIA ITALIANA S.p.A.	
IT	IM, RU-F, RU-P	FERROVIE UDINE - CIVIDALE	
IT	IM, RU-P	Ente Autonomo Volturno	
IT	RU-F	Adriafer s.r.l.	
IT	RU-F	Captrain Italia	
IT	RU-F	FuoriMuro Servizi Portuali e Ferroviari srl	
IT	RU-F	GTS Rail	
IT	RU-F	Hupac SpA	
IT	RU-F		
IT	RU-F	•	
IT	RU-F		
IT		•	
IT			
IT		Mercitalia Rail S.r.L.	
IT	RU-P	Arriva Italia Rail s.r.l.	
IT	RU-P	Trasporto Ferroviario Toscano S.p.A.	
IT	RU-P		
IT	RU-P	Trenitalia	
IT	RU-P	Trenord Srl	
IT	RU-P	Trentino Trasporti Spa	
IT	WK		
IT	WK		RSRD <sup>2</sup>
IT	WK	Mercitalia Intermodal	
IT	WK	SITFA SpA	
IT	WK	Società Italiana Trasporti Ferroviari Autoveicoli S.p.A.	RSRD <sup>2</sup>
LU	AB	Administration des chemins de fer luxembourgeois	
LU	IM, RU-F, RU-P, WK, AB	/ CFL Cargo (WK) / ACF (AB)	
LV	IM	VAS Latvijas dzelzceļš (LDz)	
LV	RU-F, WK	SIA LDZ CARGO	
NL	IM	ProRail	
NL	RU-F	Db Cargo Netherlands	
NL	RU-F	Shunter Tractie B.V.	
NL	RU-F	SPITZKE Spoorbouw BV	
NL	RU-F	VolkerRail	
NL	RU-F, RU-P	Railexperts BV	
PL	IM	PKP POLSKIE LINIE KOLEJOWE S.A.	
PL	IM, RU-F, WK	PKP Energetyka S.A.	
	State   HU	State         WK           HU         WK           HZ         RU-F           IT         IM           IT         IM           IT         IM           IT         IM           IT         IM, RU-F, RU-P           IT         RU-F           IT         RU-P           IT         RU-P           IT         RU-P           IT         RU-P           IT         RU-P           IT         WK           IT         WK	Number   Number

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Nr.	Member State	Type of Company	Company name	Reporting Entity
163	PL	IM, RU-F, WK	PRZEDSIĘBIORSTWO BUDOWNICTWA SPECJALISTYCZNEGO	
			"TRANSKOL" Sp. z o.o.	
164	PL	IM, RU-P	PKP Szybka Kolej Miejska w Trójmieście	
165	PL	RU-F	Sp. z o. o. CTL Logistics Sp. z o.o.	
	PL	RU-F	,	
166 167	PL	RU-F	Freightliner PL	
168	PL	RU-F	Inter Cargo	
169	PL		LOTOS Kolej Sp. z o.o.  CEMET S.A.	
		RU-F, WK		
170	PL	RU-F, WK	CIECH Cargo Sp.z o.o.	
171	PL	RU-F, WK	Majkoltrans Sp. z o.o.	
172	PL	RU-F, WK	ZUE S.A	
173	PL	RU-P	Łódzka Kolej Aglomeracyjna Sp. z o.o.	
174	PL	WK	GATX Rail Poland Sp. z o.o.	RSRD <sup>2</sup>
175	PL	WK	Tankwagon Sp. z o. o.	RSRD <sup>2</sup>
176	PT	IM	Infraestruturas de Portugal	
177	PT	RU-F	Takargo	
178	PT	RU-P	CP Comboios de Portugal EPE	
179	PT	RU-P	FERTAGUS, S.A.	
180	PT	WK	ADP Fertilizantes, S.A.	RSRD <sup>2</sup>
181	PT	WK	CIMPOR - Serviços de Apoio à Gestão de Empresas, S.A.	RSRD <sup>2</sup>
182	PT	WK	Takargo, Transporte de Mercadorias, S.A.	RSRD <sup>2</sup>
183	RO	IM	CFR	
184	RO	WK	TOUAX Rail Ltd.	RSRD <sup>2</sup>
185	SE	IM	Øresundsbro Konsortiet	
186	SE	IM	Trafikverket	
187	SE	IM, RU-F, RU-P, WK	Tågåkeriet i Bergslagen AB	
188	SE	RU-F	CFL cargo Sverige AB	
189	SE	RU-F, WK	Green Cargo	
190	SE	WK	Stena Recycling AB	RSRD <sup>2</sup>
191	SE	WK	TRANSWAGGON AB	RSRD <sup>2</sup>
192	SI	IM	SŽ Infrastruktura, d.o.o.	
193	SI	RU-F, WK	SŽ Tovorni promet, d.o.o.	
194	SI	WK	Adria kombi d.o.o.	RSRD <sup>2</sup>
195	SK	IM, RU-F	UNIPETROL Doprava s.r.o.	Unipetrol Group
196	SK	RU-F, RU-P	LTE Logistik a Transport Slovakia s.r.o.	LTE Group
197	SK	RU-F, WK	AWT Rail SK	AWT Rail Group
198	SK	RU-F, WK	Železničná spoločnosť Cargo Slovakia, a.s.	
199	SK	WK	Duslo, a.s.	RSRD <sup>2</sup>
200	SK	WK	Felbermayr Slovakia s.r.o.	RSRD <sup>2</sup>
201	SK	WK	Ing. Alica Ovciariková A.O.	RSRD <sup>2</sup>

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Nr.	Member State	Type of Company	Company name	Reporting Entity
202	TR	WK	TRANSWAGGON Vagon Isletmeleri Ltd. Sti.	RSRD <sup>2</sup>
203	UK	IM	Network Rail Infrastructure Limited	
204	UK	RU-F, WK	DB Cargo UK	

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# **ANNEX 3: RESPONSES CONTACT LIST V9**

Nr.	Member State	Type of Company	Company name	Reporting Entity
1	BG	RU-F	PORT RAIL LTD	
2	СН	IM	SBB AG, Division Infrastruktur	
3	СН	RU-F	SBB CARGO AG	
4	СН	RU-P	SBB AG, Division Personenverkehr	
5	СН	WK	SBB CARGO AG	
6	CZ	RU-F	GJW Praha spol. s r.o.	
7	CZ	RU-F	Ostravská dopravní společnost - Cargo,a s.	
8	CZ	RU-P	Leo Express s.r.o.	
9	CZ	WK	ArcelorMittal Ostrava, a.s.	
10	CZ	WK	KOS Trading a. s.	
11	CZ	WK	RYKO PLUS spol. s r.o.	
12	DE	RU-F	DB Cargo	
13	DE	WK	DB Cargo	
14	ES	IM	ADIF Administrador de Infraestructuras Ferroviarias	
15	ES	RU-F	RENFE MERCANCIAS	
16	HU	IM	MMV Magyar Magánvasút Zrt.	
17	IT	IM	Ferrovie del Gargano	
18	IT	RU-F	Dinazzano Po SpA	
19	IT	RU-F	Ferrovie del Gargano	
20	IT	RU-P	Italo - Nuovo Trasporto Viaggiatori S.p.A.	
21	IT	RU-P	SAD - Trasporto Locale SpA	
22	PL	RU-F	Captrain Polska Sp. z o.o.	
23	PL	RU-F	JSW Logistics Sp. z o.o.	
24	PL	RU-F	Kolej Bałtycka S.A.	
25	PL	WK	JSW Logistics Sp. z o.o.	
26	PT	RU-F	Medway - Operador Ferroviário e Logístico de Mercadorias, SA	

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#### 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/

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