

RRS Release 1.4

Transaction Reporting

Participant Simulation Guide

Frankfurter Wertpapierbörse (FWB®, the Frankfurt Stock Exchange)
Eurex Deutschland

© Deutsche Börse Group 2024

This publication is for informational purposes only. None of the information in this publication constitutes investment advice and does not constitute an offer to sell or a solicitation of an offer to purchase any contract, share or other financial instrument. This publication is not intended for solicitation purposes but only for use as general information. All descriptions, examples and calculations contained in this publication are for illustrative purposes only.

Deutsche Börse AG, Frankfurter Wertpapierbörse (FWB[®], the Frankfurt Stock Exchange), Eurex Frankfurt AG, Eurex Deutschland and Eurex Clearing AG do not represent that the information in this publication is comprehensive, complete or accurate and exclude liability for any consequence resulting from acting upon the contents of this or another publication, in so far as no wilful violation of obligations took place or, as the case may be, no injury to life, health or body arises or claims resulting from the Product Liability Act are affected.

Securities traded on the Frankfurt Stock Exchange and Eurex derivatives (other than EURO STOXX 50[®] Index Futures contracts, EURO STOXX[®] Select Dividend 30 Index Futures contracts, STOXX[®] Europe 50 Index Futures contracts, STOXX[®] Europe 600 Index Futures contracts, STOXX[®] Europe Large/Mid/Small 200 Index Futures contracts, EURO STOXX[®] Banks Sector Futures contracts, STOXX[®] Europe 600 Banks/Industrial Goods & Services/Insurance/Media/Personal & Household Goods/Travel & Leisure/Utilities Futures contracts, Dow Jones Global Titans 50 IndexSM Futures contracts, DAX[®] Futures contracts, MDAX[®] Futures contracts, TecDAX[®] Futures contracts, SMIM[®] Futures contracts, SLI Swiss Leader Index[®] Futures contracts, RDXxt[®] USD - RDX Extended Index Futures contracts, Eurex inflation/commodity/weather/property and interest rate derivatives) are currently not available for offer, sale or trading in the United States nor may they be offered, sold or traded by persons to whom US tax laws apply.

The fund shares listed in XTF Exchange Traded Funds[®] are admitted for trading on the Frankfurt Stock Exchange. Users of this information service who legally reside outside Germany are herewith advised that sale of the fund shares listed in XTF Exchange Traded Funds may not be permitted in their country of residence. The user makes use of the information at their own risk.

Legal validity of this disclaimer

In the event that individual parts of or formulations contained in this text are not, or are no longer, legally valid (either in whole or in part), the content and validity of the remaining parts of the document are not affected.

Trademarks

The following names and designations are registered trademarks of Deutsche Börse AG or an affiliate of Deutsche Börse Group:

1585[®]; A7[®]; Buxl[®]; C7[®]; CDAX[®]; CEF[®]; CEF alpha[®]; CEF ultra[®]; CFF[®]; Classic All Share[®]; Clearstream[®]; CX[®]; D7[®]; DAX[®]; DAXglobal[®]; DAXplus[®]; DB1 Ventures[®]; DBIX Deutsche Börse India Index[®]; Deutsche Börse[®]; Deutsche Börse Capital Markets Partner[®]; Deutsche Börse Commodities[®]; Deutsche Börse Venture Network[®]; Deutsches Eigenkapitalforum[®]; DivDAX[®]; eb.rexx[®]; eb.rexx Jumbo Pfandbriefe[®]; ERS[®]; eTriParty[®]; Eurex[®]; Eurex Bonds[®]; Eurex Clearing Prisma[®]; Eurex Improve[®]; Eurex Repo[®]; Euro GC[®]; ExServes[®]; EXTF[®]; F7[®]; FDAX[®]; FWB[®]; GC Pooling[®]; GCP1[®]; GEX[®]; Global Emission Markets Access – GEMA[®]; HDAX[®]; iNAV[®]; L-DAX[®]; L-MDAX[®]; L-SDAX[®]; L-TecDAX[®]; M7[®]; MDAX[®]; N7[®]; ODAX[®]; ÖkoDAX[®]; PROPRI[®]; REX[®]; RX REIT Index[®]; SCHATZ-FUTURE[®]; SDAX[®]; ShortDAX[®]; StatistiX[®]; T7[®]; TecDAX[®]; Technology All Share[®]; TRICE[®]; USD GC Pooling[®]; VDAX[®]; VDAX-NEW[®]; Vestima[®]; Xscreen[®]; Xemac[®]; Xentric[®]; Xetra[®]; Xetra-Gold[®]; Xpect[®]; Xpider[®]; XTF[®]; XTF Exchange Traded Funds[®]; We make markets work[®]

The names and trademarks listed above do not represent a complete list and, as well as all other trademarks and protected rights mentioned in this publication, are subject unreservedly to the applicable trademark law in each case and are not permitted to be used without the express permission of the registered owner. The simple fact that this publication mentions them does not imply that trademarks are not protected by the rights of third parties.

The STOXX[®] indices, the data included therein and the trademarks used in the index names are the intellectual property of STOXX Ltd., Zug, Switzerland and/or its licensors. Eurex' derivatives based on the STOXX indices are in no way sponsored, endorsed, sold or promoted by STOXX and its licensors and neither STOXX nor its licensors shall have any liability with respect thereto.

STOXX iSTUDIO[®] is a registered trademark of STOXX Ltd., Zug, Switzerland.

TRADEGATE[®] is a registered trademark of Tradegate AG Wertpapierhandelsbank.

EEX[®] is a registered trademark of European Energy Exchange AG.

Flexible is better.[®] is a registered trademark of Axioma, Inc.

Abstract

This document describes the timeline and enhancements as for the RRS Release 1.4 Simulation. Trading participants should use this document to plan and prepare their RRS Release 1.4 Simulation participation. This document should be read alongside the RRS Release 1.4 Release Circular and the Simulation Calendar.

RRS Technology

Internal reporting solution – Regulatory Reporting Solution (RRS) – is a technical infrastructure to comply with the Article 26(5) MiFIR to the Trading Venues. RRS provides an extract of the reportable transactions of Non-MiFIR participants of Eurex or FWB and allows the participants to:

- enrich or correct the fields not known to the Trading Venue or
- to send independently all transaction data which the Trading Venue requires by referencing each transaction.

History

Version	Date	Reason
1.0	01.10.2024	Introduction for RRS Release 1.4

List of Abbreviations

Article 26(5)	“The operator of a trading venue shall report details of transactions in financial instruments traded on its platform which are executed through its systems by a firm which is not subject to this Regulation in accordance with paragraphs 1 and 3.”
CET	Central European Time
CRE	Common Report Engine
CTS	Customer Technical Support
CUE	Common Upload Engine
DBAG	Deutsche Börse AG
MIFID	Markets in Financial Instruments Directive
NCA	National competent authorities
RRS	Regulatory Reporting Solution
SCLC	Short Code/Long Code (Short Code and Algo ID solution)
SPoC	Single Point of Contact
T7	T7 trading system developed by Deutsche Börse Group

Table of Contents

1	Simulation Overview	5
1.1	Introduction	5
1.2	Further Information	5
1.3	Intended audience	5
1.4	Timeline.....	5
1.5	Simulation Calendar	6
1.5.1	Guiding principles for Simulation Calendar.....	6
2	Functional Enhancements.....	6
3	Simulation preparation.....	7
3.1	Organizational preparation	7
3.2	Functional preparation	7
3.3	Technical preparation	7
3.4	Reporting process overview.....	8
3.5	Recommended test scenarios to be executed by participants	8
3.5.1	Testing of the visibility of Midpoint-Transactions in the Extract File	8
3.5.2	Testing of visibility and correct display of short codes registered using the new ShortCode and Algo ID regime of Deutsche Börse AG.	9
4	Known Limitations for Simulation	10
4.1	Known Limitation in terms of capacity	10
5	Contact.....	10

Table of Figures

Figure 1: Trading Venue Transaction Reporting process.....	8
--	---

1 Simulation Overview

1.1 Introduction

The purpose of RRS Release 1.4 Simulation is to provide an opportunity for participants to become familiar with the enhanced technical setup of RRS Release 1.4 and to prepare for production. The production launch date for RRS Release 1.4 is planned for 18th November 2024.

The key objectives of the RRS Release 1.4 Simulation:

- Provide high quality information and simulation to support participant readiness.
- Familiarize participants with the changes resulting from the T7 Release 13 initiatives
- Early identification of issues both from the Exchange and from the participants' side to minimize risk of RRS Release 1.4 launch and production operation.

The RRS Release 1.4 Simulation covers both, the cash and the derivatives markets which means all markets on the RRS Simulation environment. The "RRS Release 1.4 Simulation" always includes all the environments described above, unless explicitly stated otherwise.

The participant simulation period for RRS Release 1.4 is planned to start on 28th October 2024.

1.2 Further Information

Please note and be aware of the following RRS Release 1.4 Simulation condition:

The RRS Release Simulation is a shared simulation environment with the purpose of providing participants the opportunity to test functional and technical enhancements for the forthcoming RRS Release. Following a release, the environment will be available with the current software for further testing of all RRS related functionality.

1.3 Intended audience

This document serves as the guide for all simulation participants, i.e., current, and future users of the RRS system. In particular, the following participants will be involved in the simulation:

- Non-MiFIR Exchange trading participants

In order to achieve a common understanding of the responsibilities and tasks, the distribution of this Simulation Guide to the appropriate project teams and line organizations is recommended as soon as possible. All parties involved, e.g., central coordinators, system administrators, traders should be aware of their tasks before the start of the Simulation.

1.4 Timeline

Deutsche Börse AG is planning to launch Release 1.4 of RRS on 18th November 2024.

The following timeline gives an overview of the introduction schedule for RRS releases in 2024:

RRS Release 1.4 Simulation Execution	28 th October 2024 - onwards
RRS Release 1.4 Production Launch	18 th November 2024

1.5 Simulation Calendar

The Simulation Calendar for the derivatives market is available under the following path:

Eurex:

eurex.com > Support > Initiatives & Releases > Simulation Calendar

Xetra:

Whereas the Simulation Calendar for the cash market can be found on the following link:

xetra.com > Trading > Trading calendar and trading hours

1.5.1 Guiding principles for Simulation Calendar

- The simulation will be set up and run from both a functional and technical perspective as production-like as possible to help stimulate business processes under realistic conditions. In order to provide a production-like system environment, the different RRS components will be set up as an integrated simulation environment. Nevertheless, system availability and technical performance will be scaled to simulation requirements and will differ from production.
- RRS Release 1.3 permanent simulation was terminated with the end of day processing on 25th October 2024. The RRS Simulation will not be available for participants from 26th October 2024 to 27th October 2024 to prepare the RRS Release 1.4 Simulation. As a result, the Venue Extract File will not be available for the Software version 1.3 on Monday 28th October 2024.
- The RRS Release 1.4 Simulation is planned to start on 28th October 2024 and will last until further notice. The last batch day in simulation before introduction of RRS Release 1.4 in Production will be on 13th November 2024.
- After the release simulation, we will continue with the permanent simulation on 18th November 2024.
- On batch days, calendar days correspond to actual business days. The following days until the next batch day have the business date of this forthcoming batch day. Here several calendar days (with 24 hours trading availability) may constitute one business day.
- Weekends are generally open for simulation, but no technical and functional support will be available.

2 Functional Enhancements

With the introduction of RRS Release 1.4 effective 18th November 2024 The introduction of RRS Release 1.4 ensures compatibility with the T7 Release 13.0 software version and the new Short Code and Algo ID solution.

The introduction of RRS Release 1.4 will ensure compatibility with following initiatives:

Cash Market

- With T7 Release 13.0, Xetra (MIC: XETR) will offer Xetra Midpoint trading, a new execution service at the midpoint price between the real-time Best Bid and Offer (BBO) price taken from Xetra's central limit orderbook (CLOB). The introduction of RRS Release 1.4 will ensure that resulting transactions are reflected accordingly in the transaction report for non-MiFIR members.

Cash and Derivatives Markets

- With T7 Release 13.0 an enhanced registration and maintenance process for Short Code and Algo IDs will be introduced. The introduction of RRS Release 1.4 will ensure that validly registered Short Codes and Algo IDs are submitted to RRS as part of the transaction report creation process for non-MiFIR members.

Details on the existing RRS functionalities and the list of known limitations are communicated to the participants in the form of two RRS Release 1.4 Release Circulars, directed at the Eurex and Xetra customer base respectively:

Eurex:

www.eurex.com > Support > Initiatives & Releases > Readiness for projects > Regulatory Reporting Solution 1.4 for Non-MiFIR firms

Xetra:

www.xetra.com > Newsroom > Current regulatory topics > MiFID II and MiFIR > Non-MiFIR firms RRS Release 1.4

3 Simulation preparation

Preparation activities should be completed prior to the start of RRS Release 1.4 Simulation.

3.1 Organizational preparation

Prior to the start of RRS Release 1.4 Simulation, to simulate the individual requirements participants are encouraged to define specific simulation objectives and scenarios on their own as an organisational preparatory activity to ensure readiness for the simulation phase.

3.2 Functional preparation

Participants planning to participate in the simulation should verify their individual setup and inform the exchange of any changes that may be required prior to the start of their simulation testing activity. The completion of functional preparations prior to production start is mandatory.

3.3 Technical preparation

To ensure technical readiness for simulation, trading members should consider the following topics:

- A technical connection to T7, Common Report Engine ("CRE") and CUE systems needs to be established (if not existing).
- Internal resources for timely installation of simulation software should be identified and confirmed.
- Related in-house systems should be set up to simulate subsequent processing.

3.4 Reporting process overview

The Chart below illustrates high level the reporting process chain offered by RRS.

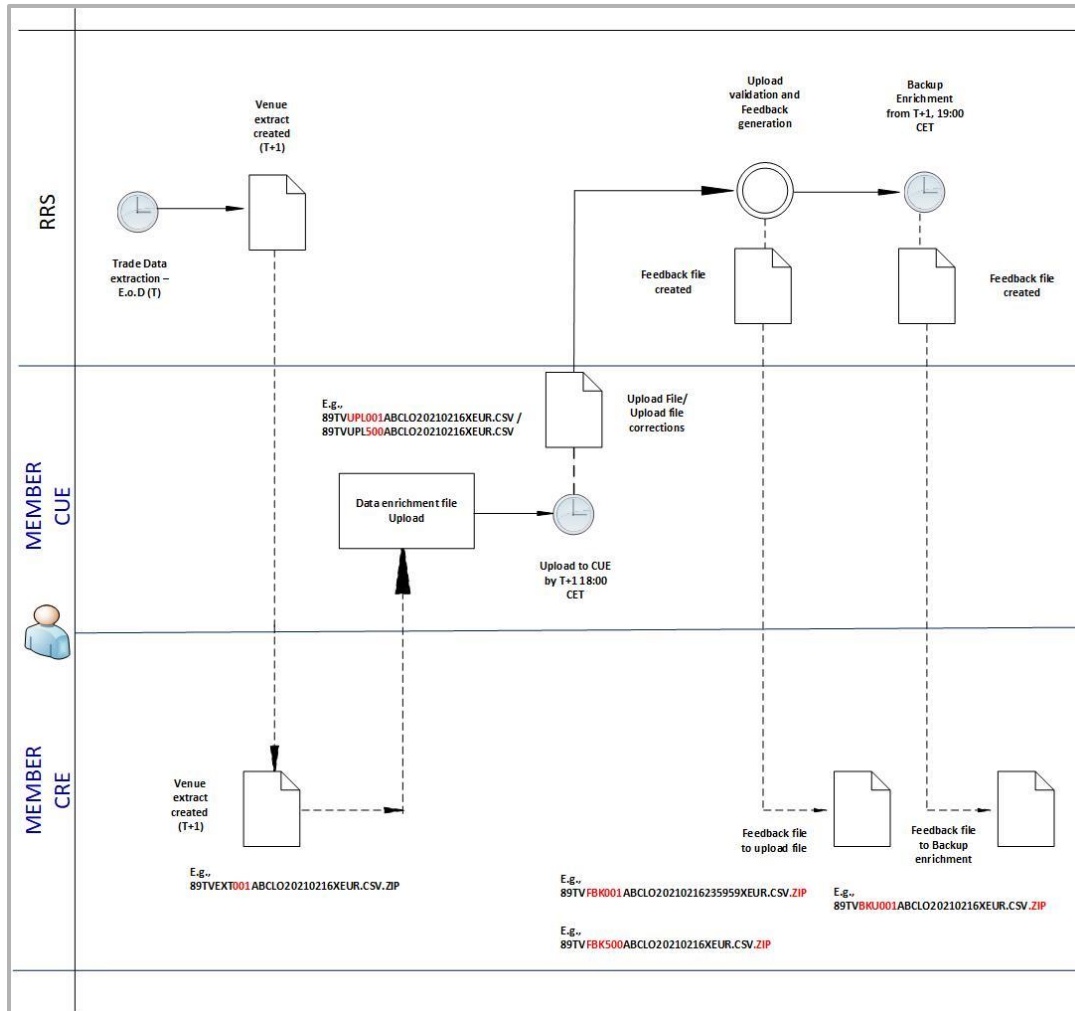


Figure 1: Trading Venue Transaction Reporting process

Please note that the data in the historical file TVUPL500 should be uploaded earliest on T+2 for trade date T.

3.5 Recommended test scenarios to be executed by participants

The following test scenarios can be executed anytime by participants in Simulation. There are no special tasks to be performed by the exchange.

3.5.1 Testing of the visibility of Midpoint-Transactions in the Extract File

Participants interested in Xetra midpoint trading are encouraged to test whether the Xetra Midpoint orders entered in T7 are visible in the RRS trade venue Extract File.

Test scenario:

Step 1: To ensure that sufficient test data is available, the non-MiFIR participant enters Midpoint orders into T7 (simulation environment) and ensures that they are executed. For details concerning Xetra Midpoint trading and instruments that are tradable on Xetra Midpoint please visit the Xetra T7 related documentation

Xetra:

Xetra.com > Technology > T7 > System-Documentation > release13-0 > Simulation > T7 Release 13.0 - Derivatives and Cash Markets - Participant Simulation Guide, Version 1

Step 2: On T+1 (after the first available Simulation Batch) the participant verifies the Venue Extract File created by RRS (e.g., 88TVEXT001ABCLO20210216XETR.CSV.ZIP) and available in the designated participant Simulation "mifid" folder in the CRE. The non-MiFIR trading Participant verifies the trade venue field and checks that it is filled with the Xetra Midpoint MIC codes.

3.5.2 Testing of visibility and correct display of short codes registered using the new ShortCode and Algo ID regime of Deutsche Börse AG.

Short codes can be used in the order/quote for fields "Client identification code", "Execution within firm" and "Investment decision within firm". For correct registration instructions of short codes please refer to the Reporting Handbook for audit trail and other regulatory reporting under the MiFID II/ MiFIR Regime

Eurex:

www.eurex.com > Support > Initiatives & Releases > Readiness for projects > Short Code and Algo ID Solution 2.0

Xetra:

www.xetra.com > Newsroom > Current regulatory topics > MiFID II and MiFIR > Reference data reporting

Test scenario:

Step 1: The non-MiFIR participant should register valid short codes in accordance with the Short Code and Algo ID Solution 2.0 guidelines. RRS will map the relevant field to the long code that the Member has provided with the short code/long code upload file in the simulation environment.

Step 2: To ensure that sufficient test data is available, the non-MiFIR participant enters orders and/or quotes into T7 (simulation environment) and ensures that they are executed. The participant should use previously registered codes by respective order and/or quote entry in T7. The non-MiFIR trading participant ensures that Used short code/long code combinations are no older than T-1 and T.

Step 3: On T+1 (after the first available Simulation Batch), the non-MiFIR participant shall review the venue extract file generated by RRS (e.g. 89TVEXT001ABCLO20210216XEUR.CSV.ZIP) and available in the participant's designated "mifid" simulation folder in the CRE. The non-MiFIR Trading participant verifies if the registered long code(s) used are displayed as expected. Please note, that only Short Code/Long Code combinations validly uploaded up to and no later than T eod will be displayed in the extract, while all Short Code/Long Code combinations uploaded on T+1 will not be mapped to the extract.

Optional further Steps:

Step 4: The non-MiFIR trading participant enriches the transactions, if needed, with the necessary data (marked with "Y" in the respective data field of the Venue Extract File and uploads a transaction CSV file with file name according to the file name convention (e.g., 89TVUPL001ABCLO20210216XEUR.CSV). The upload should occur on T+1 (after the first available Simulation Batch) by 18:00 CET/CEST.

Step 5: After the upload, the CUE checks for newly uploaded files and verifies that the file name and structure conform to validation conventions. If these validations are successful, an additional validation is performed on a transaction record. Please refer to the User Manual Chapter 4.4 for validation details to ensure successful file validation.

Step 6: The Feedback File to the Upload (e.g., 89TVFBK001ABCLO20210216125959XEUR.CSV.ZIP) will be provided in the “mifid” subfolder in CRE for the same participant ID and trading day as the Upload File in CUE

Step 7: On T+2 (after the second available Simulation Batch) the participant makes the necessary corrections if applicable for trading day T. For this purpose, the member has the possibility to analyse the Backup Enrichment file available to the participant via CRE for the trading date for which the correction is to be made (e.g., 89TVBKU001ABCLO20210216XEUR.CSV.ZIP). The transactions to be corrected have been backup enriched with a dummy value on T+1 before having been sent to the NCA (status “backup enriched” in TVBKU file).

Step 8: Corrections or cancellations of transaction reports from before the previous trading day than must be sent to CUE in a separate upload file (e.g., 89TVUPL500ABCLO20210216XEUR.CSV), earliest on T+2 (after the second available Simulation Batch)

Step 9: The member checks the related TVFBK500 file for its historical upload. Invalid historical records are reported with the related error message in the respective historical (TVFBK500) file and simply not processed further. Valid records are NOT reported in the historical FBK file at all.

4 Known Limitations for Simulation

Participants should be aware and respect the limitations in the Simulation environment.

4.1 Known Limitation in terms of capacity

The RRS Simulation is not designed for very extensive or even performance testing.

The CUE Upload directories can only support and process 5 parallel file uploads with a maximal joint size of 50 MB. Participants should refrain from uploading more than 5 files and should comply with the files size limitation. The fact dates used in historical correction are limited to max 50 distinct fact dates. Additional fact dates beyond that will not be supported by the RRS Simulation environment.

5 Contact

For technical support please contact the Customer Technical Support (CTS), which is available 24/5, from Monday 00:00 to Friday 22:00 CET:

- Technical Key Account Manager (TKAM) via dedicated phone number
- CTS via hotline +49 69 211 10 888 or by email at cts@deutsche-boerse.com

For functional support please contact the Regulatory Reporting Analysts, which are available from Monday to Friday between 9:00 and 18:00 CET/CEST:

- Regulatory Reporting Analyst via hotline +49 69 211 28991 or by email at client.services@deutsche-boerse.com
-