X-pand into the Future

e u r e x *information*

Date: Frankfurt, November 25, 2002
Recipients: All Eurex Clearing members and vendors
Authorized by: Daniel Gisler

Central Counterparty – CCP Circulars 56/02 and 57/02

Contact: Functional Member Readiness: Tel. +49-69-2101-1700

Content may be most important for:	**Attachments:**
➲ Central Counterparty Coordinators	CCP Circular 56/02 (English/Deutsch) Release Notes - Corporate Actions (English only) CCP Circular 57/02 (English/Deutsch) Releasebeschreibung von Kapitalmaßnahmen (German only) Shaping (English/Deutsch)

Please find attached a copy of Central Counterparty Circulars 56/02 and 57/02 sent to Frankfurter Wertpapierbörse members and vendors recently.

The Circulars covers the publication of a document describing the handling of corporate actions after the introduction of the Equity Central Counterparty, in English and German respectively.

Eurex Clearing AG
D-60485 Frankfurt am Main
www.eurexchange.com

Functional Member Readiness
Tel. +49-69-2101-1700
Fax +49-69-2101-1701

Alternative
Tel. +49-69-9770-1700
Fax +49-69-9770-1701

Management Board:
Rudolf Ferscha (CEO), Daniel Gisler,
Thomas Lenz, Peter Reitz,
Jürg Spillmann, Michael Widmer

CCP Circular 56/02

To the FWB Members, Xetra® Members and Vendors

Recipients: Project Coordinators, System Administrators

FWB
Frankfurter
Wertpapierbörse

Management

Neue Börsenstraße 1
60487 Frankfurt am Main

Mailing Address
60485 Frankfurt am Main

Telephone
+49(0)69-21 01-16 60
+49(0)69-97 70-16 60

Telefax
+49(0)69-21 01-16 61
+49(0)69-97 70-16 61

Internet
deutsche-boerse.com

Central Counterparty – CCP November 19, 2002
Corporate Actions Documentation

Dear Sir or Madam,

Attached to this circular please find the "Release Notes Corporate Actions", which describe the handling of Corporate Actions with introduction of the Central Counterparty for Equities.

The respective German version will be provided in the course of this week.

Should you have further questions or require additional information, please do not hesitate to contact the CCP Change Management Team at telephone +49(0)69-21 01-16 60 or fax +49(0)69-21 01-16 61.

Yours faithfully
On behalf of the Management

Jens Hachmeister Christian Ochsner

Enclosure



6 days to go

Start of CCP Simulation
on November 25, 2002

General Managers:
Edward Backes
Dr. Heiko Beck
Rudolf Ferscha
Frank Gerstenschläger
Volker Potthoff

Central Counterparty for Equities (CCP)

Release Notes Corporate Actions

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1 Introduction

Corporate action events occur on equities and probably also on additional rights. These events lead to changes of the rights of the buyer or seller. Therefore, corporate action events have to be applied to pending trades, which the CCP processes. Corporate action events have an impact on the CCP's trade book and can have also impact on the security master data.

This documentation describes the CCP's corporate action event processing for "original runs", i.e. for any kind of corporate action that is announced in due time and can be processed on the "entitlement day" of the corporate action event.

"Backdated" corporate action events, i.e. corporate actions having an entitlement day that lies in the past, are not described in this document. Another member documentation will be published dealing with these "backdated" corporate action events. Analysis has shown that backdated corporate action events are highly unlikely for equity securities in scope of CCP Release 1.0. Therefore, the concept of processing backdated corporate actions is currently under CCP internal review. It will be published as soon as the concept has a reliable state.

In co-operation with Clearstream Banking Frankfurt, the CCP will provide a fully automated service for corporate actions processing ("original runs") on pending CCP trades. According to the corporate action event, the CCP will update its pending trades for further processing, consider the corporate action results in risk management, and provide customer reporting.

The CCP system offers corporate actions processing on two levels: level CCP-CM and level CM-Customer. From an obligation point of view, the CCP has to provide corporate actions processing on the level CCP-CM. Corporate action events must be applied to trades or partial trade quantities pending on level CCP-CM as they lead to changes in the receivables and liabilities resulting from the trade.
However, as a service to participants, the CCP provides corporate actions processing and reporting also for the level CM-Customer. The appliance of corporate actions on trades or partial trade quantities pending on level CM-Customer allows for a consistent trade management in the provided Gross Delivery Management functionality.[1]

This document describes the complete handling of corporate actions at the CCP and the impact on the CCP functionality and processes.

[1] In this context, any trade quantity not having status "settled" on level CM-Customer is referred to as "pending" on level CM-Customer in this document. The trades (partial trade quantities may have for example status "blocked" or "late".

2 General terms

Income events:	Event types, with cash payments only (e.g. dividend payments)
Non-income events:	Events without cash payments, such as capital adjustments. The CCP distinguishes between nominal changes, ISIN changes, Nominal & ISIN changes, and creation of rights.
Ex Date:	Date on which the security is traded ex for the first time and thus the buyer is no longer entitled to receive for instance the last income payment.
Record Date:	Date on which the issuer closes the register, i.e., the entitled positions are determined. In Germany, the term can be used as synonym for the entitlement day.
Entitlement Date:	Date on which the entitlement calculation is based (equivalent to 'GS — Stichtag/Trenntermin i.e. ex date – 1 business day). Date on which the coupon is cut.
Payment Date:	Value date of the event - date on which income payment is due. For German equities it is the ex date, if ex date is a business day, if not payment date is the business day after ex date.
Enhancement:	Capital adjustments like a capital increase are processed by the emission of additional rights. In addition to the original trade, the rights must be exchanged between buyer and seller.
Modifications:	Capital adjustments like a merger are processed by modifying e.g. the ISIN and/or Nominal of the existing trade.
Multiple Dividends:	Two or more dividend payments for the same security are processed on the same entitlement day.
CCP Business Day:	The CCP business day refers to a calendar day on that the CCP is open for processing. It is the time from start of CCP online availability until end of CCP online availability (start of end-of-day processing).
CCP Settlement Day:	The CCP settlement day is strongly related to the CBF settlement cycle. For the CCP, the next settlement day starts when the SDS2-processing is finished and when the report CE270 Settled Delivery has been published for SDS2. One settlement day comprises the three settlement runs STD, SDS1, SDS2.

3 Process Overview

This chapter will provide a high-level overview on the general process flow for corporate actions processing and will provide an indication with regards to the timing.

For CCP Release 1.0, corporate action events on CCP equity securities are applied on the **entitlement day** of the event, with value date being the ex-date of the corporate action event. For CCP equity securities and additional rights, the entitlement day is one day prior to the ex-date.

Depending on the trade date of trades, the CCP-system has two different processing times for corporate actions processing:

- For trades with trade date equal to the entitlement day of a corporate action event, the CCP provides corporate actions processing during end-of-day processing.
- For trades with trade date earlier than the entitlement day of a corporate action, the corporate actions processing is provided shortly before STD settlement netting processing.

However, reporting of corporate actions processing is always provided during end-of-day processing.

Any CCP trade quantity that is pending (on level CCP-CM and/or on level CM-Customer) on the entitlement day of the corporate action will be considered for corporate actions processing.

Looking at the regular cycle of a trade (from T until T+2) this has the following consequence:

Corporate Actions with entitlement day T

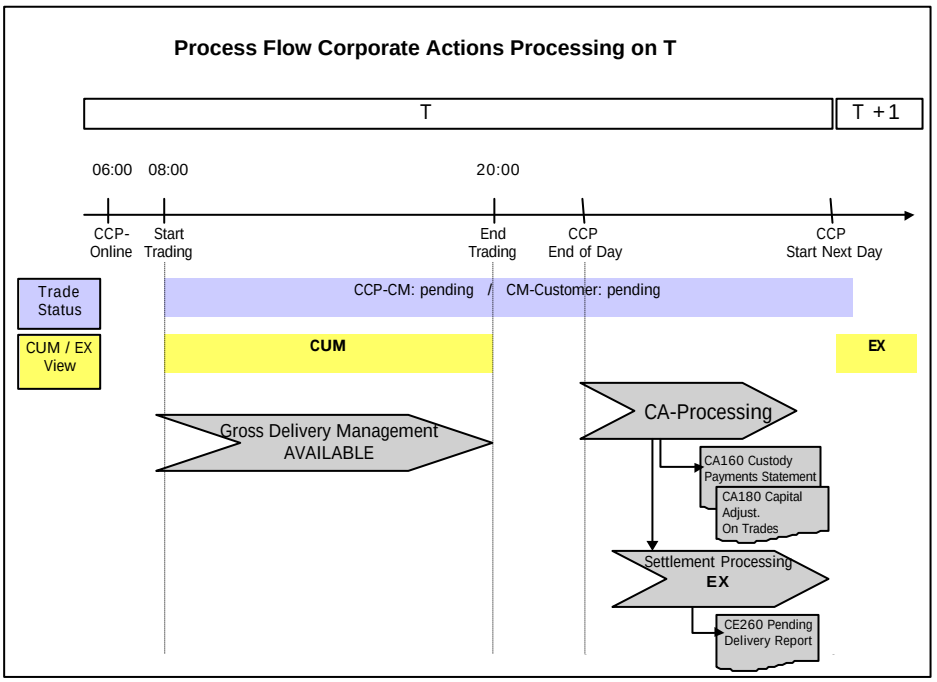


Figure 1: Process Flow Corporate Actions with entitlement day T for trades of day T

- On the trade day T, corporate actions processing is performed after end of trading during the CCP end-of-day processing. Any trade created on T will be considered for a corporate action event with entitlement T.
- As on T the trade will have the status pending on level CCP-CM and pending on level CM-Customer, the CCP-system will apply the corporate action event on both levels of the trade.
- Corporate Actions Processing Results will be published via the applicable reports RPTCA180/RPTCA181 for non-income events and RPTCA160/RPTCA161 for income events.
- The report RPTCE260 Pending Delivery provided during end-of-day processing will outline the "EX-view" of trades, i.e. after corporate actions processing. For example where a nominal change took place, the trade will be displayed with the new nominal amount.
- With start of the next business day, the trade is visible as "ex" in Gross Delivery Management functionality. For a non-income event this means, that either the trade is shown with adapted nominal amount and/or changed ISIN, or an additional right is visible in addition to the original trade.

Corporate Actions with entitlement day T+1

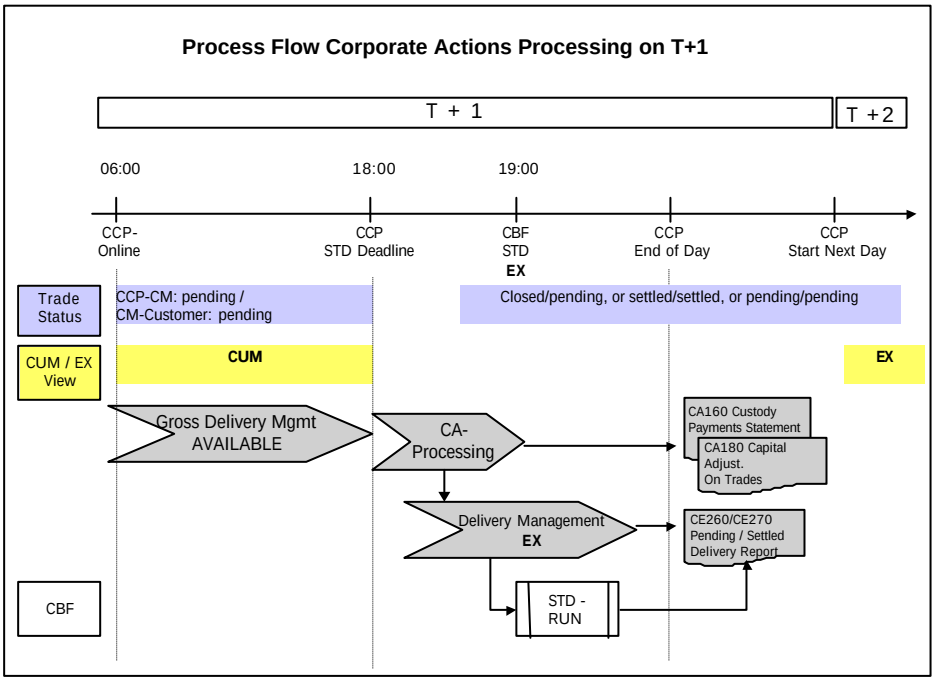


Figure 2: Process Flow Corporate Actions with entitlement day T+1 for trades of day T

- On T+1, corporate actions processing will be performed shortly before STD settlement netting starts. Any valid trade with trade day T (not cancelled on T+1) will be considered for a corporate action event with entitlement day T+1.

- As trades with trade day T will have the status pending on both levels, the CCP-system will apply the corporate action event on both levels of the trade.
- For STD settlement netting and for STD delivery instructions to CBF, the trades will be considered with "EX-view", i.e. after appliance of corporate actions. Meaning that the trades are considered with adapted nominal and/or ISIN, or that additional rights are considered for settlement netting.
- Corporate Actions Processing Results will be published during end-of-day processing via the applicable reports RPTCA180/RPTCA181 and RPTCA160/RPTCA161.
- The reports RPTCE260 Pending Delivery and RPTCE270 Settled Delivery provided after STD-processing will outline the "EX-view" of trades, i.e. after corporate actions processing.

Corporate Actions with entitlement day T+2 for trades of day T

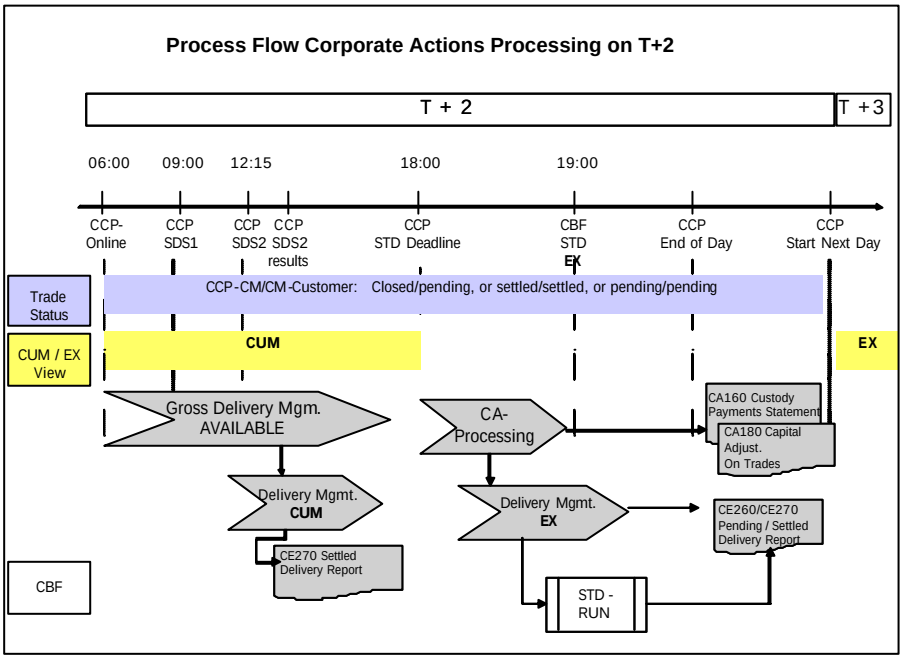


Figure 3: Process Flow Corporate Actions Processing with entitlement day T+2 for trades of day T

- On T+2, corporate actions processing will be performed shortly before STD settlement netting starts. Any valid trade will be considered for a corporate action event with entitlement day T+2.
- On T+2, trades with trade day T may have already been (partially) settled on level CCP-CM and/or on level CM-Customer. Any trade or partial trade quantity reported as settled on one or both of the two levels in the report CE270 Settled Delivery Report created on T+2 after SDS2 or earlier will not be considered for corporate actions processing anymore. Corporate Actions will be applied to all trades pending either on level CCP-CM and/or pending on level CM-Customer, i.e. with status: pending/pending, or closed/pending – whereby only the pending trade quantity on the respective level will be considered.

- For STD settlement netting and for STD delivery instructions to CBF, the trades will be considered with “EX-view”, i.e. after appliance of corporate actions.
- Corporate Actions Processing Results will be published during end-of-day processing via the applicable reports RPTCA180/RPTCA181 and RPTCA160/RPTCA161.
- The reports RPTCE260 Pending Delivery and RPTCE270 Settled Delivery provided after STD-processing will outline the “EX-view” of trades, i.e. after corporate actions processing.

Any corporate action with entitlement day T+n (n= 3) will be processed similar to the description for entitlement day = T+2.

4 Trade Management for corporate action affected trades

4.1 General rules

4.1.1 Master data for corporate actions processing

The CCP does not provide any corporate action related information to participants. As today, the announcement of corporate action events is available from the master data provider WM/WSS.

To ensure consistent corporate actions processing on holdings held at CBF and on pending trades processed by the CCP or processed by CBF in Cascade or LION, Clearstream Banking Frankfurt performs the event selection for the CCP. CBF selects which corporate action events have to be applied to pending CCP trades.

4.1.2 Time of transition from "CUM" to "EX"

As outlined above in chapter 2, SDS2 processing on the entitlement day of a corporate action event represents the time cut for the transition from trades being "CUM" (i.e. entitled for the corporate action) and trades being "EX" (i.e. after appliance of corporate actions processing).

Note: The transition from "CUM-view" of trades to "EX-view" of trades is not explicitly marked in the member GUI or reports. It can only be derived from the type of trade modification that will take place due to the corporate action event. I.e. for an upcoming ISIN-change, the "CUM-view" of trades will show the old ISIN of the trade, whereby the "EX-view" of trades will show the new ISIN of the trade. The only reports that allow an explicit distinction are the reports "RPTCE260 Pending Delivery" and "RPTCE270 Settled Delivery".[2] Where the field "Corporate Action" is set to "N" the reports show the "CUM-view" of trades, where the field is set to "Y" the reports show the "EX-view" of trades.

The CCP will only apply corporate action processing on trades or partial trade quantities, which are pending (on level CCP-CM and/or on level CM-Customer) on the entitlement day of a corporate action event. These can be either trades with trade day equal to entitlement day (reported as pending in report CE260 of the current business day) or trades with trade date earlier than the entitlement day.

- Where trades from previous days were reported as pending in report CE260 of the previous business day but were reported as settled in one of the reports CE270 of the current business day (for SDS1 or SDS2), the trades will not be considered for corporate actions processing, i.e. they will be reported "CUM".
- Where trades from previous days were reported as pending in report CE260 of the previous business day and were not reported as settled in one of the reports CE270 of the current business day (SDS1, SDS2), the trades will be considered for corporate actions processing, i.e. they will be reported "EX" in the reports CE260/CE270 created during end-of-day processing.

[2] This applies to any of the role-specific delivery reports, i.e. to CE260/CE261/CE262 and to CE270/CE271/CE272 and to the respective raw data reports.

The following list represents the situation on the entitlement day of a corporate action event. On all days before the entitlement day trade quantities (settled or pending) are reported CUM, on all days after the entitlement day trade quantities are reported EX.

Report Name	CUM/EX View	Comment
RPTCA160/RPTCA161 Custody Payments Statement	CUM to EX	Shows the trade quantity cum and the related income payment (trade cum coupon represents in total the EX-view of the trade)
RPTCA180/RPTCA181 Capital Adjustment on Trades	CUM to EX	Shows the transition from cum to ex
CB220 Daily Fines	CUM	
CB230 Daily Gross Delivery Mgmt.	CUM	
CD250 Settled Cash Transactions	N/A	Not applicable, as no trade view
CD280 Pending Price Differences	CUM	As traded at the trading location
CE260 Pending Deliveries	EX	Created during end-of-day after corporate actions processing
CE270 Settled Deliveries	CUM for SDS1& SDS2, EX for STD	The reports CE270 created during SDS1 & SDS2 on entitlement day refer to the settlement day x = entitlement day (cum). The report CE270 created during STD on entitlement day refers to the settlement day x+1 = ex-day.
Risk Reports and Risk Based Margining Files	CUM	Starting on entitlement day +1 (=ex-day) the risk reports and files will be ex.

4.1.3 Trade quantities considered for CA-processing

Corporate action processing can potentially be applied to all trades in CCP securities (equities and additional rights) with the following characteristics at the entitlement day:

- Pending gross trades (pending on level CCP-CM and on level CM-Customer).
- Net trades pending on CCP-CM and/or on CM-Customer level.
  Net trades pending on CM-Customer level are selected to provide reporting of corporate action processing as a service for participants – for correct obligation fulfillment by the CCP it would not be required.
- The pending part of partially settled net trades.

In applying corporate action events to pending trades or partial trade quantities, the CCP considers the settlement status of trades:

- Trades or partial trade quantities settled on both levels (i.e. on level CCP-CM and on level CM-Customer) will not be considered for corporate actions processing.
- For trades or partial trade quantities with status "closed" on level CCP-CM but pending on level CM-Customer, corporate actions processing will only be applied on the second level of the trade.
- For trades or partial trade quantities with status "pending" on level CCP-CM and pending on level CM-Customer, corporate actions processing will be applied on both levels of the trade.

This principle is also considered for corporate action events leading to the creation of additional rights. Where the original trade is closed on level CCP-CM but pending on level CM-Customer, this can lead to the situation that an additional right is created but the additional right is only pending on level CM-Customer (as the original trade). For consistency purposes the corresponding quantity of additional rights is reported as "closed" on level CCP-CM.

4.1.4 Consideration of settlements on level CM-Customer

Where the cash deferral flag is set to "N", settlements on level CM-Customer can occur outside the "real" settlement processing (STD, SDS1, SDS2) immediately at release of a blocked sell trade belonging to the offsetting block.

These "immediate" settlements can also occur on an entitlement day after SDS2 processing has finished (and the report CE270 Settled Delivery was created) but before start of corporate action processing and STD processing.

As these settlements will be reported in the report CE270 Settled Delivery after STD-processing of the next settlement day, participants should be aware that the CCP will apply corporate actions processing to these settled trades or settled trade quantities. As outlined above, the CCP provides a consistent "EX-view" of trades in the reports created after STD-processing and during end-of-day. Consequently, the settled quantity will be reported as "EX" in the report CE270 Settled Delivery even though the participant has released the trade in a "CUM-view" of trades. Further, the trade will be displayed in the provided corporate action reports (RPTCA160/RPTCA161, RPTCA180/RPTCA181).

4.1.5 Trade Attributes of modified trades or additional rights

The following rules apply with regards to the trade attributes of the trades modified or added during corporate actions processing:

- Trade Date: Trade modifications keep and additional rights inherit the original trade date of the corresponding trade.
- Contractual Settlement Date:
  - ✓ Trade modifications keep their original contractual settlement date.
  - ✓ For additional rights corresponding to trades which are considered for the current STD settlement run, (i.e. with a contractual settlement date being the current day or older), the contractual settlement date will be set to the current STD date.
    For additional rights corresponding to trades which are not considered for the current STD settlement run, (i.e. with a contractual settlement date in the future), the contractual

settlement date of the additional right will be set to the contractual settlement date of the corresponding original trade.

- Trade Price: The Trade Price is shown as 0 (zero) in the case a corporate action event took place. I.e., if the corporate action indicator flag is set, the price is set to 0. This applies to trade modifications and to additional rights. The trade price is also set to 0, if an income event was applied to the trade.
- Settlement Amount: Stays unchanged for trade modifications and is set to "0" for additional rights.
- Corporate Action Indicator (visible on reports CE260, CE270; in trade overview window, in trade detail window, and in CCP Inquire Trade List VALUES request):
  - ✓ For trade modifications (either due to non-income or due to income-events) the corporate action indicator is set to "Y".
  - ✓ For additional rights and their corresponding original trade the corporate action indicator is set to "Y".
- Order Net Type: Trade modifications keep their order net type, for additional rights the default value "N" is set.
- Order Completion Flag: Trade modifications keep their order completion flag, for additional rights the value "Y" is set.
- ISIN: For trade modifications the ISIN is changed according to the corporate action event. Additional rights are created in the ISIN specified in the corporate action event.

All other trade attributes are applied according to the original corresponding trade.

4.1.6 General calculations and rounding rules

In applying corporate actions processing, the CCP takes over established calculation and rounding rules used by CBF today.

Nevertheless, rounding differences out of calculation processes (calculation of dividend, calculation of enhancements and modifications) can occur. They occur because calculation is done on trade level and the units of the nominal will always differ between buy side and sell side.

To keep rounding differences to a minimum, calculation is done on all available digits. In the last step, the quantity is rounded to the minimal settlement unit for non-income events and to 2 digits for income events (cash).[3] Taking all available digits, rounding is applied on the last digit shown. Rounding rule is: Round down till 4, round up from 5 (kaufmännisch runden).

Where the CCP-system holds partial quantities of a trade, the following rule applies:

In a first step, calculation is done on trade level to determine the overall result for the trade. Then, partitioning of the overall calculated trade nominal (or cash amount) is done.

The calculated overall trade quantity has to be apportioned to the following trade quantities (where applicable):

[3] For example: Where the minimal settlement unit is "1", calculation is done with 4 digits and in the last step the rounding rule is applied so that full units remain. I.e. "3.3333" will be rounded to 3 whereby "6.6666" will be rounded to 7. For additional rights, the MSU might be "0.001" so that "3.3333" is rounded to "3.333" and "6.6666" is rounded to "6.667".

- Partial trade quantity pending on level CCP-CM and pending (i.e. not settled) on level CM-Customer
- Partial trade quantity closed on level CCP-CM but pending (i.e. not settled) on level CM-Customer

and as a subset to the overall quantity pending (i.e. not settled) on level CM-Customer:

- Partial trade quantity pending on level CM-Customer and having status released
- Partial trade quantity pending on level CM-Customer and having status blocked

The following rules apply in partitioning the overall calculated trade nominal to the different partial trade quantities:

First, the CCP will calculate the partial quantity pending on both levels, applying rounding rules as specified above. Next, CCP subtracts the calculated quantity pending on both levels from the overall calculated trade quantity, to receive the quantity closed on level CCP-CM but pending on level CM-Customer. Then, CCP will re-apply the release/block status of the trade. First, calculation of the released quantity will be done applying rounding rules as outlined above. Second, the resulting released quantity will be subtracted from the overall calculated trade quantity to determine the blocked quantity.

4.1.6.1 Handling of member internal rounding differences

In applying event calculation and rounding rules on trade level as outlined above, the following situation can occur:

A set of buy and facing sell trades with originally no difference between the quantities may have different quantities after a corporate action event (either the buy quantities are higher than the sell quantities or vice versa). These trades are part of an off-setting block - therefore, the corresponding off-setting block may be "in-balanced" due to corporate actions processing.

The CCP will handle these kind of rounding differences as follows:

As on the reports CE260 Pending Delivery and CE270 Settled Delivery the trades are reported independently (in their own report lines) and no total is shown for the nominal quantity, the trades are reported with the adapted nominal amount. The participant can determine the potential rounding differences by building the total nominal quantity for the buy and sell side.

Due to rounding differences after applying corporate actions, an imbalance might appear between buy and sell trades in the offsetting block of a settlement netting unit. This situation occurs only for participants with cash deferral option “N” and refers to trades closed on the level CCP-CM but pending on the level CCP-Customer[4]. See Figure 4 for illustration.

These differences per settlement netting unit will be taken into account for further settlement netting processing during following settlement runs and will be reduced with every (partial) release of the sell trade within the offsetting block. When the rounding difference cannot be outbalanced with the first partial release of the sell trade, the remaining rounding difference will be taken into account for the next (partial) release. No pro-rata reduction will be done.

[4] Note: With cash deferral option, an offsetting block containing trades that are pending on both levels can only occur between STD and SDS2. After SDS2, the pending trades are removed from the offsetting block and in the next STD-settlement netting a new offsetting block is created.

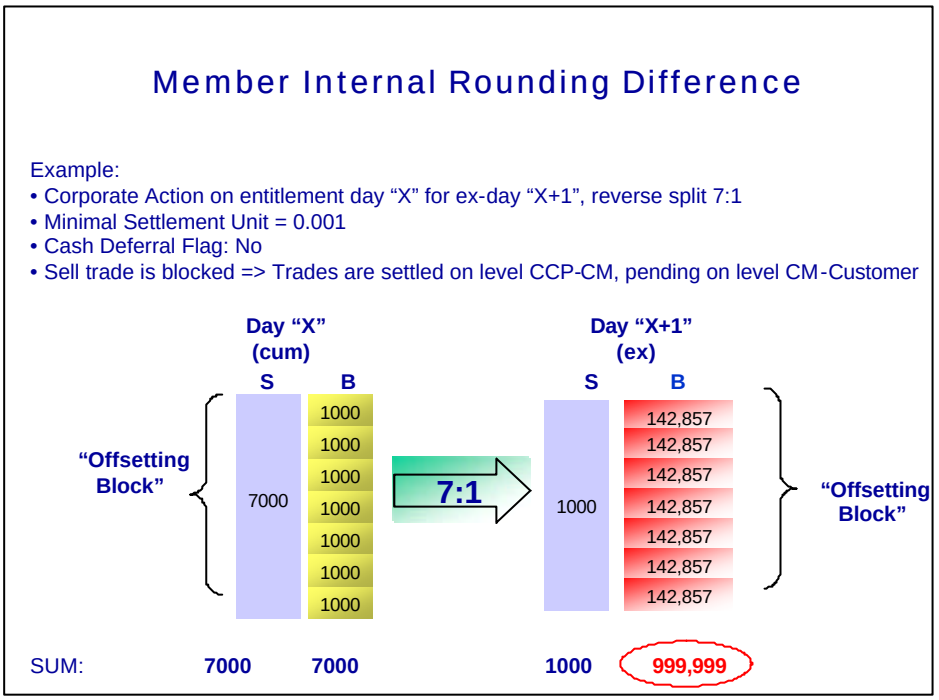


Figure 4: Member Internal Rounding Difference at appliance of non-income events

4.1.7 Handling of T+1 trade cancellations received from the trading location

The trading location XONTRO allows canceling trades on T+1. The CCP will receive these trade cancellations on T+1 before start of corporate actions processing. The receipt of trade cancellations has an effect on corporate actions handling:

- Corporate action events with entitlement day T have to be reversed for the cancelled trade
- Corporate action events with entitlement day T+1 may not be considered anymore on the cancelled trade.

4.1.7.1 Automatically create reverse cash transactions for income events

If on T+1 a XONTRO trade cancellation is received for a trade with trade date T and the original trade was affected by a corporate action income event in T, the CCP automatically creates a reverse cash transaction. The reverse cash transactions are instructed with the next available Bundesbank run, but not before CBF has debited/credited the corresponding corporate action cash transaction to the members.

For trade cancellations received on T+1 before the CCP's Cash Settlement run with Deutsche Bundesbank for SDS2 (usually used for settlement of trades from T-1 or older), the value date of the corresponding reverse cash transaction will be T+1 (Trade-date +1=ex-day), meaning they have same day value. For trade cancellations received after the CCP's SDS2-processing, the value date of the reverse cash transaction will be the next day (i.e. (T+1)+1).

The CCP Core System provides the following cash transaction types to instruct reverse cash transaction for trade cancellations received in T+1.

- 464 DIVID TRD.CANCEL.RCV
- 466 DIVID TRD.CANCEL.PAID

The reversed income cash payment will be reported in the CCP report RPTCD250 Settled Cash Transactions and in RPTCA160/RPTCA161 Custody Payments Statement.

4.1.7.2 Automatically cancel related corporate action positions

After receipt of a XONTRO trade cancellation in T+1, the CCP-System automatically cancels all related non-income event positions from Gross Delivery Management. Related non-income event positions in this context are positions created due to an additional right on the cancelled trade. If the cancelled trade is modified as a result of a corporate action event (e.g., the trade quantity is changed due to a stock split), the resulting trade including the modification will be cancelled.

The cancelled trade and where applicable the cancelled additional right is displayed as deleted in reports "RPTCA180/RPTCA181 Capital Adjustment on Trades", which is provided on T+1 during end-of-day processing.

4.1.8 Handling of multiple events

Multiple corporate action events on the same ISIN and with the same entitlement day can occur. For example:

- on ISIN X and entitlement day Y, one event results in a nominal change, another in additional rights
- on ISIN X and entitlement day Y, two income events are announced

All events will be applied to the "original" pending trade quantity, pending on entitlement day Y.

Income events will be processed independently from non-income events.

Multiple income events on the same ISIN and entitlement day will be summarized into one single income event, so that only one aggregated income event per trade will be considered for corporate actions processing.[5]

4.2 Gross Delivery Management for CA affected trades

4.2.1 Availability of Gross Delivery Management

Corporate actions' processing affects pending CCP trades and changes the trades from "CUM-view" to "EX-view". As a consequence, Gross Delivery Management functionality is affected by corporate actions processing. In order to provide a consistent view on trades, Gross Delivery Management functionality for all trades affected of an ISIN which is affected by a corporate action non-income event becomes unavailable for participants as soon as the corporate action processing starts until end

[5] This procedure is in line with the current CBF process.

of day. [6] This restriction applies to trades with trade day equal to the previous business day or earlier (i.e. entitled for STD-settlement).

The term "Gross Delivery Management functionality" refers to the three different member interfaces the CCP provides to its participants: the member GUI "@Xpert", VALUES API, and the settlement instruction data carrier.

The VALUES API-request "CCP Inquire Trade List" will not show trades after applying a corporate action to the trade on the entitlement date. These trades are also not taken into consideration for the VALUES API requests CCP Inquire Gross Obligation and CCP Inquire Net Obligation. I.e., all VALUES requests do only show trades CUM.

4.2.2 Appliance of Gross Delivery Management attributes

As outlined above, the CCP applies corporate action events on pending trade quantities, resulting in either trade modifications or in additional rights. Upon update of the pending trades, the CCP automatically applies:

- Gross /Net flag
- Blocking/Release Status
- Manual Linking
- Automatic Linking

according to the following rules:

- Modified trades keep and additional rights inherit the gross flag and (partial) release status of the corresponding original trade.
- Modified trades keep and additional rights inherit the automatic linking reference of the corresponding original trade.
- Modified trades keep the manual linking to other trades
- Additional rights will not inherit the manual linking of the corresponding original trade. Only, the member default release method is applied to the additional right.

In Gross Delivery Management functionality, additional rights are treated like any other pending trade, i.e. the rights can be blocked, released, and linked independently of the corresponding original transaction.

4.3 Appliance of Income Events

Basically, the CCP has outsourced the income corporate actions processing to Clearstream Banking Frankfurt. CBF will provide income event processing for pending CCP trades as today in place for pending LION stock exchange trades.

On behalf of the CCP, CBF will:

- Apply income corporate action events to pending CCP trades

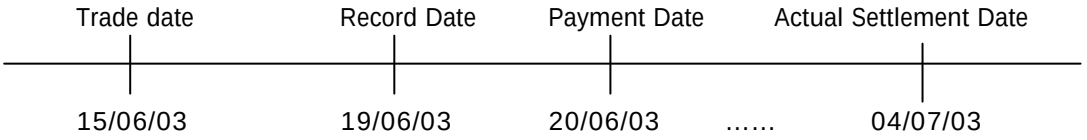
[6] Concrete processing times cannot be announced at the moment, but the CCP aims at processing corporate actions shortly before STD settlement netting starts.

- Provide customer reporting for income events to settlement institutions
- Instruct income payments at Deutsche Bundesbank (former LZB)
- Provide AWV reporting for the debitor/creditor accounts

In order to enable CBF doing so, the CCP will provide the pending trades on a gross basis to CBF.

The method of compensation applied by CBF for pending CCP trades follows the CSC market specific rule: If the buyer buys a security before or on the record date ("CBF-Stichtag") it is a trade CUM coupon. Therefore, he receives the coupon proceeds on payment date (for CCP Release 1.0, record date +1) as dividend compensation regardless whether the trade actually settles or not on T+2.

Example: Client A sells to client B on 15/06/03, the trade is late (pending on level CCP-CM and on level CM-Customer), the record date (entitlement day) is on 19.06.03, payment date (value date) is 20.06.03. Finally, the trade settles on 04.07.03 (after the payment date).



CBF will select applicable income events and will calculate the corresponding income payment per trade. In this example, CBF will apply the income event on 19.06.02 and will debit Client A with the income payment and credit Client B, value date of the trade being 20.06.03.

The following calculation will be performed:

- Dividend cash amount before tax (gross) = Buy/Sell Nominal Quantity * Dividend amount
- Capital yield tax amount = dividend cash amount before tax (gross) * capital yield tax /100
- Solidarity tax amount = capital yield tax amount * solidarity tax/100
- Dividend amount after tax (net) = Dividend cash amount before tax (gross) – capital yield tax amount – solidarity tax amount.

It can happen for certain dividend payment that there is no tax to pay; in that case the net dividend amount will be equal to the gross dividend amount.

Rounding rule: calculation is done with 4 digits. In the last step the cash amount is rounded to 2 digits. Round down till 4, round up from 5 ("kaufmännisch runden").

CBF will instruct the net income payment at Deutsche Bundesbank, using the participant's Bundesbank-account (former LZB-account) that corresponds to the settlement account of the trade. As today already in place, CBF will create a compound entry on the participants Bundesbank-account (former LZB-account), summarizing income payments by cash booking type and value date, i.e. all dividend payments will be booked as one compound entry per value date.

Processing of income events on pending trades takes place during end-of-day processing.[7] The resulting income cash payments are instructed for Cash Settlement at Deutsche Bundesbank within CBF's settlement run SDS1 on the payment date of the corporate action.

As today for existing processes, CBF will provide income reporting for CCP trades (pending on level CCP-CM or pending on level CM-Customer), in particular via the "Custody Payments File" (replacing the KADI-Cash Data Carrier).[8]

Whereby multiple income events will be compiled into one income reporting in the Custody Payments File, but the single income events per trade will be reported in the detailed reporting provided by CBF. In addition to CBF providing customer reporting to settlement institutions, the CCP will provide income reporting for clearing members and settlement institutions using the report "RPTCA160/RPTCA161 Custody Payments Statement". Basically, this report provides the same information as the CBF Custody Payments File, but provides a different layout and role-specific information for settlement institutions and clearing member.

Participants should be aware that reverse income cash transactions resulting from trade cancellations on T+1 will **only** be reported by the CCP in report RPTCA160/RPTCA161 Custody Payments Statement and RPTCD250 Settled Cash Transactions.

4.4 Appliance of Non-Income Events

In applying non-income events to pending CCP trades, the CCP does not distinguish between the business reasons for a corporate action event. This means that the CCP reporting does not provide the distinction between conversion, pari passu, split, or rights issue and bonus rights issue.

The only distinction the CCP makes is with regards to the effects a corporate action can have on pending CCP trades. A non-income event can result in:

- Change of the nominal quantity of trades
- Change of the ISIN of trades
- Change of the nominal quantity and ISIN of trades
- Creation of additional rights

Whereby the first three change types lead to modifications of existing trades, and the last change type leads to the creation of new CCP trades.

Reporting on non-income events is provided in the CCP-report RPTCA180/RPTCA181 Capital Adjustment on Trades.

In modifying existing CCP trades or creating new CCP trades, the CCP-system assures that the reference to the original "entitled" trade is kept. Trade modifications keep and additional rights inherit the main CCP trade attributes of the original trade:

- Trade Date
- Trading Location

---

7 CBF processing times cannot be communicated by the CCP. Reporting via Custody Payments File is expected approximately at 11:00 p.m.

8 Details about CBF income reporting can be obtained from Clearstream Banking Frankfurt.

- Trade Number
- Order Number
- ISIN (is only kept for nominal changes)

4.4.1 Change of Nominal

As outlined in chapter 4.1.3, the CCP applies corporate action events to any trade quantity that is pending on the entitlement day of the event.

The new quantity is calculated as follows:

New Quantity = Nominal Quantity old * Exchange ratio denominator / Exchange ratio numerator

The calculation is done applying rounding rules and partitioning of the overall trade quantity as outlined in chapter 4.1.6. After calculation of the new quantity, the CCP modifies existing pending trades in the pending trade book applying trade attributes as outlined in section 4.1.5. The key trade attributes of a CCP trade: trade date, trading location, trade number, order number and ISIN are kept. The report RPTCA180/RPTCA181 shows the original trade with the old quantity as a delete entry and the modified trade with the new quantity as an add entry. The reports RPTCE260 Pending Delivery and RPTCE270 Settled Delivery produced during end-of-day processing will outline the affected trades with adapted nominal quantity and with corporate action indicator "Yes".

A basic example is provided in the figure 5 below.

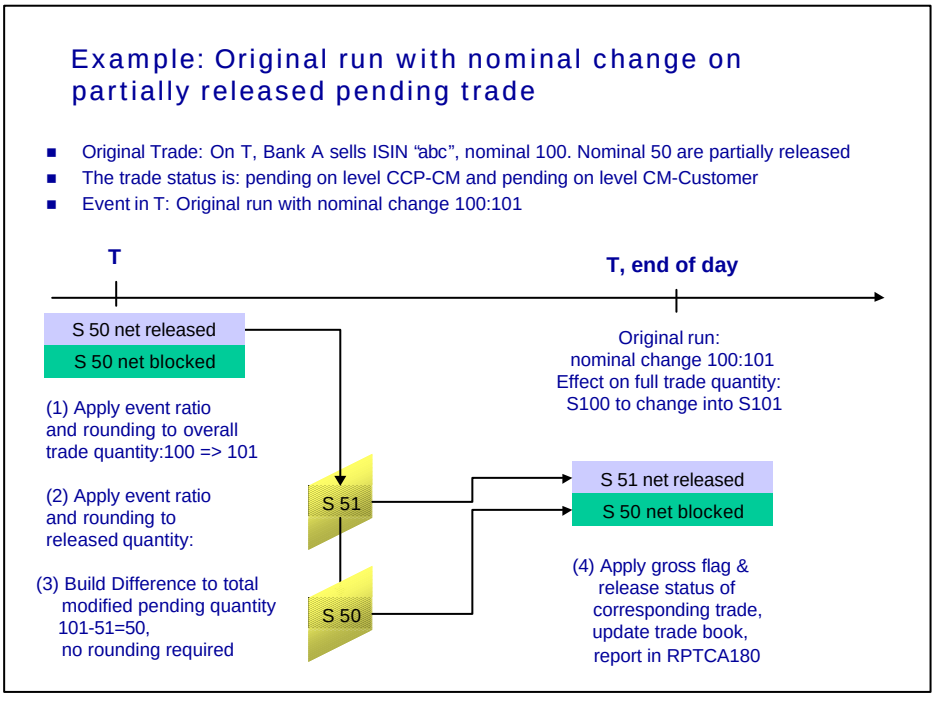


Figure 5: Appliance of nominal changes to CCP trades

4.4.2 Change of ISIN

As outlined in chapter 4.1.3, the CCP applies corporate action events to any trade quantity that is pending on the entitlement day of the event. For this event type the CCP simply modifies the ISIN of the affected trade, keeps the other four key trade attributes (trade date, trading location, trade number, order number), and sets other relevant trade data as outlined in chapter 4.1.5. The report RPTCA180/RPTCA181 shows the original trade with the old ISIN as a delete entry and the modified trade with the new ISIN as an add entry. The reports RPTCE260 Pending Delivery and RPTCE270 Settled Delivery produced during end-of-day processing will outline the affected trades with adapted ISIN and with corporate action indicator “Yes”.

4.4.3 Change of Nominal & ISIN

As outlined in chapter 4.1.3, the CCP applies corporate action events to any trade quantity that is pending on the entitlement day of the event.

The new quantity is calculated as follows:

New Quantity new ISIN = Nominal Quantity old ISIN * Exchange ratio denominator / Exchange ratio numerator

The calculation is done applying rounding rules and partitioning of the overall trade quantity as outlined in chapter 4.1.6. After calculation of the new quantity, the CCP modifies existing pending trades in the pending trade book and applies the new ISIN. The report RPTCA180/RPTCA181 shows the original trade with the old quantity and old ISIN as a delete entry and the modified trade with the new quantity and new ISIN as an add entry. The reports RPTCE260 Pending Delivery and RPTCE270 Settled Delivery produced during end-of-day processing will outline the affected trades with adapted nominal amount and new ISIN and with corporate action indicator “Yes”.

A basic example is provided in the figure 6 below.

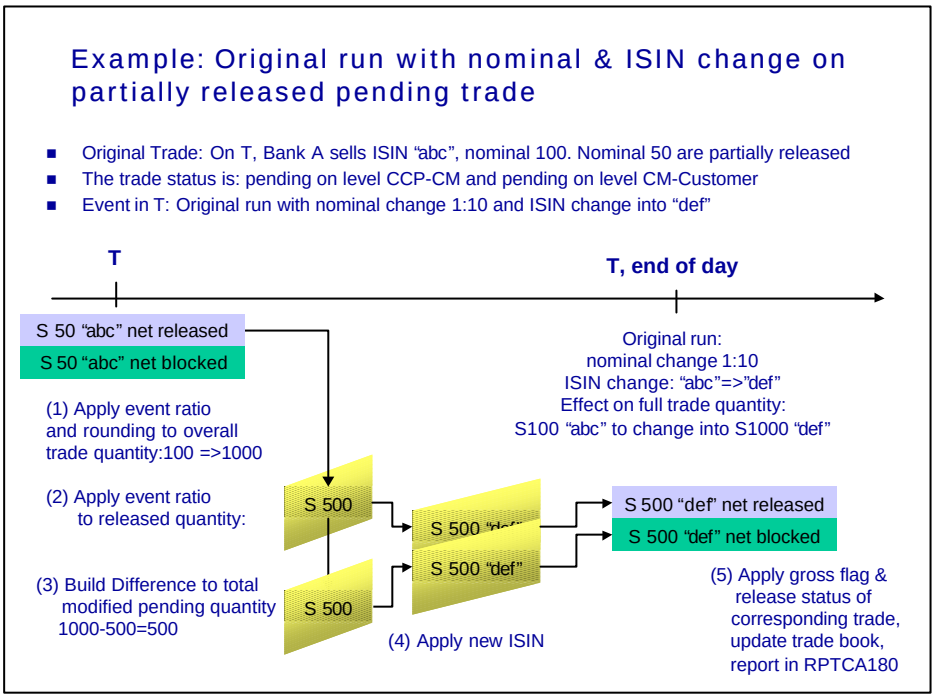


Figure 6: Appliance of nominal & ISIN changes to pending CCP trades

4.4.4 Creation of Additional rights

As outlined in chapter 4.1.3, the CCP applies corporate action events to any trade quantity that is pending on the entitlement day of the event. In applying rights issues, the CCP keeps the existing pending trade and inserts an additional trade to the pending trade book. The trade attributes of the new additional rights are set as outlined in chapter 4.1.5.

The only trade attribute of the original corresponding trade that will change is the "Corporate Action Indicator". The flag is set to "Y" to indicate, that a corporate action was applied to the trade.

The CCP Core System does not distinguish between the type of rights, i.e. subscription rights, partial rights, bonus rights, etc., all kind of rights are generally referred to as "additional rights" and are treated as normal CCP trades.[9]

The quantity of the new additional trade is calculated as follows:

Nominal Quantity of rights = Nominal Quantity pending CCP trade * Adaptation ratio numerator / Adaptation ratio denominator

The calculation is done applying rounding rules and partitioning of the overall trade quantity as outlined in chapter 4.1.6. After calculation of the new additional right, the CCP inserts an additional trade into the CCP trade book. The report RPTCA180/RPTCA181 shows the original trade with corporate action indicator "Y" as an unchanged entry and the new additional trade as an add entry. Both trades have four main trade attributes in common: trade date, trading location, trade number, order number, and differ only in their ISIN. The reports RPTCE260 Pending Delivery and RPTCE270 Settled Delivery produced during end-of-day processing will outline the original corresponding trade

[9] However, in risk based margining the CCP distinguishes between conditional and unconditional subscription rights.

unchanged but with corporate action indicator “Yes” and the additional right with corporate action indicator “Yes”.

A basic example is provided in the picture below:

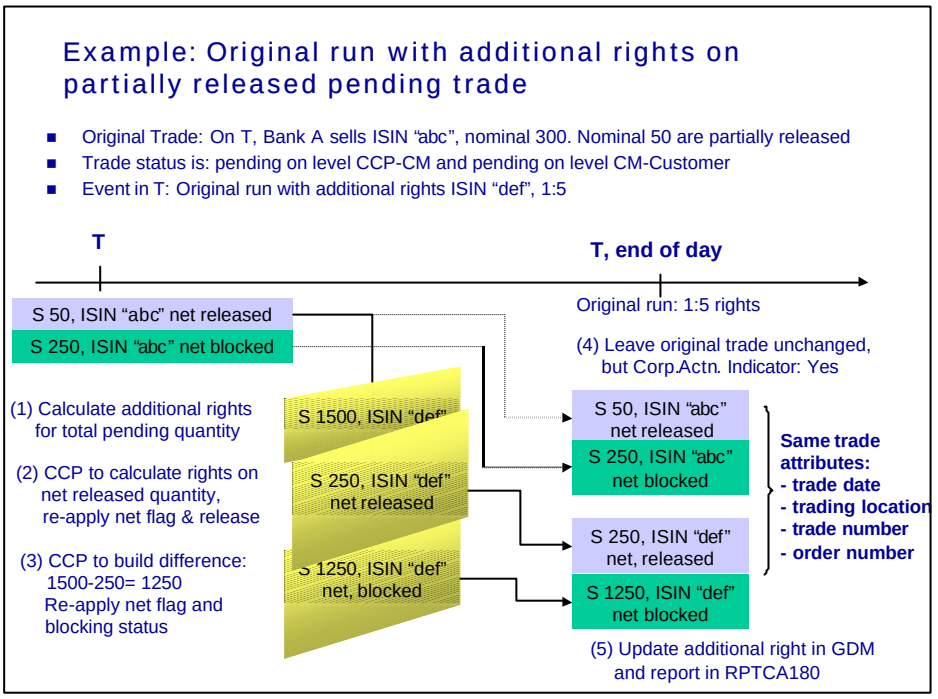


Figure 7: Appliance of rights issues to pending CCP trades

5 Risk Management for corporate action affected trades

The specification of corporate actions processing has not changed the already published specification of risk based margining for CCP Release 1.0. Therefore, this chapter only gives a brief summary of the major design statements. For details please refer to the “Final Functional Release Notes” published on September 6, 2002.

On the day of the corporate action processing the created and modified trades and cash payments are not considered in risk based margining. The original trades are considered “cum” and, therefore, implicitly contain the upcoming change by the corporate action event. The effect of a non-income event on a trade is considered in risk based margining from the morning of the ex-day of the corporate action event, i.e. starting from the intra-day risk based margining calculation at the ex-day.

Cash payments created due to corporate action events are to be treated as pure cash risk positions in risk based margining.

All trades, which are created or modified due to a corporate action event, are to be treated as risk positions like any other (exchange) trade.

For corporate actions processing that are considered in risk management, the CM-NCM relationship of the original underlying trade will be applied.

The specifications of the risk report CC080 Security/Cash Risk Position contains for the field “position type” a value “ACRP” (Associated Cash Risk Position). This value will not be used in CCP Release 1.0 but is introduced for future purposes of corporate actions processing. The same applies to report RPTCA180/RPTCA181 Capital Adjustment on Trades – the fields “ACRP Cash Long Factor” and “ACRP Cash Short Factor” as well as the column “Associated Cash Risk Position” are not used for CCP Release 1.0.

6 Delivery Management for corporate action affected trades

All trades modified or created due to corporate action events will be handled as other (exchange) trades in the delivery management as the trades represent the obligations between the CCP and members. In particular, this means that the CCP-system will:

- Consider trade modifications and additional rights for settlement netting
- Create delivery instructions (DvP, RvP, FoP) for the surplus or for gross trades
- Apply late delivery handling (fees, fines, buy-in, cash-settlement) to modified trades and to additional rights

Additional rights resulting from corporate actions processing are handled as any other trade received from the trading location and are treated as independent from the original corresponding transaction. This means for example that additional rights are considered for settlement netting (building a separate offsetting block from the corresponding original trade), for late delivery handling (being subject to fines and interest of delay or buy-in and cash settlement), and for delivery management (creation of delivery instructions as free of payment).

7 Cash Management for corporate action affected trades

Income corporate action events have an impact on the cash management for CCP trades.

As outlined in chapter 4.2 Clearstream Banking Frankfurt provides income event processing on behalf of the CCP. Thereby, CBF instructs income cash transactions at Deutsche Bundesbank and reports the initiated cash transactions to the account holder of the cash account. Income cash transactions which are initiated by CBF will not be reported in the CCP cash reports, in particular the report RPTCD250 Settled Cash Transactions will not outline these cash transaction types.[10] Participants should be aware that this procedure differs from the report values outlined in the "Final Description Report Layouts and Raw Data Files" published in on October 8, 2002. The cash transaction types:

- 456 DIVID COMPENS RCV
- 458 DIVID COMPENS PAID
- 460 DIVID CA. CANCEL.RCV
- 462 DIVID CA. CANCEL.PAID

will not be reported in report CD250 Settled Cash Transactions.

However, the CCP will report the effects of income corporate action events in the report RPTCA160/RPTCA161 Custody Payments Statement.

Still, as outlined in chapter 4.1.7.1 the CCP will reverse income cash payments at receipt of trade cancellations on T+1. Consequently, the CCP will instruct the cash transaction types:

- 464 DIVID TRD.CANCEL.RCV
- 466 DIVID TRD.CANCEL.PAID

at Deutsche Bundesbank and will report these cash transactions in the report RPTCD250 Settled Cash Transactions. In addition, the cancelled trade and the corresponding cancelled income cash transaction will be reported in report RPTCA160/RPTCA161 Custody Payments Statement.

[10] Only in the event of manual emergency processing, where the CCP manually instructs these cash transactions at Bundesbank, these cash transaction types will be contained in report CD250 and not in CBF reporting.

8 Reporting of corporate action events

CCP does not report any details on corporate action events to participants, i.e. only the effect of corporate actions on pending CCP trades is reported to participants. The following provides an overview on the corporate action reporting:

- The risk reports show the security and cash risk positions, which were modified or created due to corporate action events.
- The reports RPTCE260 Pending Deliveries and RPTCE270 Settled Deliveries indicate if a trade was modified or created by a corporate action event (yes/no)
- The report RPTCA160/RPTCA161 Custody Payments Statement shows all trades and income event payments, which were created for them. This report is actually a different representation of the "CBF Custody Payment" file.
- The report RPTCA180/RPTCA181 Capital Adjustment on Trades shows all trades together with modification of these trades and corresponding additional trades.

8.1 RPTCA160/RPTCA161 Custody Payment Statement

Report Name:

Custody Payment Statement

Report Code:

- RPTCA160 (Clearing Member).
- RPTCA161 (Settlement Institution).

Purpose:

This report provides cash payments out of corporate action events with all trades that are affected by the event. The report also shows reversal cash payments resulting from trade cancellations on T+1.

Notes on format:

This report is also available as raw data file:

- RAWCA160 (Clearing Member).
- RAWCA161 (Settlement Institution).

The raw data files are specified in the document "Final Description of Report Layouts and Raw Data" published on October 8, 2002.

Notes on creation:

This report is available for Clearing Members and Settlement Institutions. The report is created during end-of-day processing.

Fields:

REF	FIELD NAME	DESCRIPTION
1	SETTLEMENT ACCT	Branch settlement account.
2	SETTLEMENT LOCATION	Settlement location: e.g. “CBF”.
3	CLEARING MEMBER	Clearing Member.
4	EXCHANGE MEMBER	Exchange Member.
5	ACCOUNT	Account type: “A1” or “PP”.
6	LZB-ACCOUNT	Central bank account number.
7	ISIN	ISIN of the event affected security.
8	LONG-NAME	Long name of the instrument.
9	CURRENCY	Currency of the dividend.
10	VALUE DATE	Value date of the cash bookings.
11	ENTITLEMENT DATE	Entitlement date of corporate action event.
12	TRADE DATE	Trading date.
13	TRADE LOC	Trading location – market identification: “XETR”, “XFRA”.
14	TRADE NUMBER	Trading number as provided from the trading location.
15	ORDER NUMBER	Order number.
16	B/S	“B” – Buy/“S” – Sell Indicator.
17	STS	“S” – Fully settled on both levels. “ ” – Trade is still pending on levels CCP – Clearing Member and Clearing Member – customer or on level Clearing Member – customer.
18	NOMINAL/QUANTITY	Nominal/quantity security amount considered for income event.
19	CUSTODY PAYMENT DEBIT	Cash payment debit.
20	CUSTODY PAYMENT CREDIT	Cash payment credit.
21	TOTAL DEBIT/CREDIT	Sum of “Custody payment debit” and “Custody payment credit”.
22	TOTAL	Sum of “Total Debit/Credit”.
23	TOTAL PER EXCHANGE MEMBER AND VALUE DATE	Total sum per Exchange Member and value date.
24	TOTAL PER LZB ACCOUNT, CM AND VALUE DATE	Total sum per central bank account, Clearing Member and value date.
25	TOTAL PER CLEARING MEMBER AND VALUE DATE	Total sum of per Clearing Member and value date.
26	TOTAL PER SETTLEMENT ACCOUNT AND VALUE DATE	Total sum per settlement account and value date.

Layout:

```
  0        1        2        3        4        5        6        7        8        9        10       11       12       13
  01234567890123456789012345678901234567890123456789012345678901234567890123456789012345678901234567890123456789012345678901234567890123456789012
01|EUREX                                                CUSTODY PAYMENT STATEMENT                                        PAGE:       1
02|RPTCA160                                                                                                      AS OF DATE: 16-11-01
03|                                                                                                               RUN DATE: 16-11-01
04|SETTLEMENT ACCT : 133045678901 (1)                SETTLEMENT LOCATION: CBF (2)
05|CLEARING MEMBER : ABCFR (3)                       ACCOUNT:           PP (5)    LZB ACCOUNT:  12345678 (6)
06|EXCHANGE MEMBER : ABCFR (4)
07|                                                                                                                        (9)
08|ISIN               : DE3333333331  SARDINEN IN SENF SOSSE AG             (7/8)                                  CURRENCY:  EUR
09|VALUE DATE         : 19-11-01     (10)        ENTITLEMENT DAY: 16-11-01     (11)
10|
11| TRADE   TRADE TRADE    ORDER          B                          CUSTODY PAYMENT      CUSTODY PAYMENT
12|  DATE    LOC  NUMBER   NUMBER         S STS   NOMINAL/QUANTITY          DEBIT              CREDIT
13|-------- ----- ------- ---------------- - --- -------------------- -------------------- --------------------
     (12)  (13)   (14)    (15)          (16)(17)            (18)                (19)                (20)
14|15-11-01 XETR  7000001 9999999277163257 S                2,000-             1,355.00
15|15-11-01 XETR  7000002 9999999277163911 S                2,000-             1,355.00
16|15-11-01 XETR  7000003 9999999277161112 B                4,000                                 2,710.00
17|15-11-01 XFRA  7001234 9999999111163258 B                4,000                                 2,710.00
18|                                                                 -------------------- --------------------
19|TOTAL DEBIT/ CREDIT                      : (21)                             2,710.00            5,420.00

20|                                                                 --------------------------------------
21|TOTAL                                    : (22)                                                 2,710.00
22|                                                                                                ==========
...
30|TOTAL PER EXCHANGE MEMBER AND VALUE DATE   : (23)                                              8,420.00
31|                                                                                                ==========
...
40|TOTAL PER LZB ACCOUNT, CM, AND VALUE DATE  : (24)                                             10,734.12-
41|                                                                                                ==========
...
50|TOTAL PER CLEARING MEMBER AND VALUE DATE   : (25)                                              7,777.00-
51|                                                                                                ==========
...
60|TOTAL PER SETTLEMENT ACCOUNT AND VALUE DATE: (26)                                             33,333.39
61|                                                                                                ==========
...
70|*** THE ACTUAL PAYMENTS AT THE LANDESZENTRALBANK HESSEN ARE INSTRUCTED BY CLEARSTREAM BANKING ON BEHALF OF EUREX CLEARING AG ***
```

8.2 RPTCA180/RPTCA181 Capital Adjustments on Trades

Report Name:

Capital Adjustments on Trades

Report Code:

- RPTCA180 (Clearing Member).
- RPTCA181 (Settlement Institution).

Purpose:

This report shows the impact of corporate action non-income events on trades. The original trade is always shown first. The report also shows trade cancellations received from the trading location XONTRO on T+1 in the event that the cancelled trade was affected by a non-income event with entitlement day T. In this event the cancelled trade is displayed as deleted, where an additional right was created on T, the right is also shown as deleted.

Notes on format:

This report is also available as raw data file:

- RAWCA180 (Clearing Member).
- RAWCA181 (Settlement Institution).

The raw data files are specified in the document “Final Description of Report Layouts and Raw Data” published on October 8, 2002.

Notes on creation:

This report is available for Clearing Members and Settlement Institutions. The report is created during end-of-day processing.

Fields:

REF	FIELD NAME	DESCRIPTION
1	SETTLEMENT ACCT	Branch settlement account.
2	SETTLEMENT LOCATION	Settlement location: e.g. “CBF”.
3	CLEARING MEMBER	Clearing Member.
4	EXCHANGE MEMBER	Exchange Member.
5	ACCOUNT	Account type: “A1” or “PP”.
6	ORIGINAL SECURITY	ISIN and long name of the original security.
7	ENTITLEMENT DATE	Entitlement date of corporate action event.
8	ACRP CASH LONG FACTOR	The field is not used for CCP Release 1.0
9	ACRP CASH SHORT FACTOR	The field is not used for CCP Release 1.0
10	TRADE DATE	Trading date.
11	TRADE LOC	Trading location – market identification: “XETR”, “XFRA”
12	TRADE NUMBER	Trading number as provided from the trading location.
13	ORDER NUMBER	Order number.
14	B/S	“B” – Buy/“S” – Sell Indicator.
15	SETTLMNT DATE	Contractual settlement date.
16	STS	“S” – Fully settled on both levels. “ ” – Trade is still pending.
17	ISIN	ISIN of the security.
18	CUR	Settlement currency.
19	NOMINAL/QUANTITY	Nominal/quantity security amount.
20	SETTLEMENT AMOUNT	Settlement amount.
21	ASSOCIATED CASH RISK POSITION	The field is not used for CCP Release 1.0
22	D/A	“A” new trade or replacement trade of deleted trade (i.e. modification). “D” trade, which is deleted. “ ” trade, which is not modified. Note: a modification is shown by a “D” line followed by a “A” line.

Layout:

```
  0        1        2        3        4        5        6        7        8        9        10       11       12       13
  01234567890123456789012345678901234567890123456789012345678901234567890123456789012345678901234567890123456789012345678901234567890123456789012
01|EUREX                                          CAPTIAL ADJUSTMENTS ON TRADES                                    PAGE:       1
02|RPTCA180                                                                                                    AS OF DATE: 16-11-00
03|                                                                                                            RUN DATE: 16-11-00
04|SETTLEMENT ACCT  : 123456789012 (1)                    SETTLEMENT LOCATION: CBF     (2)
05|CLEARING MEMBER  : MBRFR       (3)
06|EXCHANGE MEMBER  : MBRFR       (4)                    ACCOUNT           : A1      (5)
07|
08|ORIGINAL SECURITY     : DE1234567811 VEREINIGTE ZAHNSTOCHER AG  (6) ENTITLEMENT DATE   : 16-11-01 (7)
09|ACRP CASH LONG FACTOR :  (8)            ACRP CASH SHORT FACTOR:  (9)
10|
11|
12| TRADE   TRD  TRADE    ORDER         B SETTLMNT ST                                                          ASSOCIATED CASH   D
13| DATE    LOC  NUMBER   NUMBER        S  DATE    S     ISIN     CUR  NOMINAL/QUANTITY    SETTLEMENT AMOUNT   RISK POSITION    A
14|-------- ---- ------- ---------------- - -------- -- ------------ --- ------------------- ------------------ ------------------ -
     (10)   (11) (12)      (13)        (14) (15) (16)   (17)      (18)        (19)              (20)               (21)       (22)
15|15-11-00 XETR 7000001 9999999277163257 S 19-11-00    DE1234567811 EUR          2,000.000-      20,000,000.00
16|15-11-00 XETR 7000001 9999999277163257 S 19-11-00    DE1234567891 EUR          2,000.000-           0.00                   A
17|15-11-00 XFRA 7000002 9999999277163258 B 19-11-00    DE1234567811 EUR          4,000.000      36,000,000.00-
18|15-11-00 XFRA 7000002 9999999277163258 B 19-11-00    DE1234567891 EUR          4,000.000           0.00                   A
19|
20|EUREX                                          CAPTIAL ADJUSTMENTS ON TRADES                                    PAGE:       2
21|RPTCA180                                                                                                    AS OF DATE: 16-11-00
22|                                                                                                            RUN DATE: 16-11-00
23|SETTLEMENT ACCT  : 123456789012 (1)                    SETTLEMENT LOCATION: CBF     (2)
24|CLEARING MEMBER  : MBRFR       (3)
25|EXCHANGE MEMBER  : MBRFR       (4)                    ACCOUNT           : A1      (5)
26|
27|ORIGINAL SECURITY     : DE3111111111 ELEKTRONIX AG            (6) ENTITLEMENT DATE   : 16-11-01 (7)
28|ACRP CASH LONG FACTOR :  (8)            ACRP CASH SHORT FACTOR:  (9)
29|
30|
31| TRADE   TRD  TRADE    ORDER         B SETTLMNT ST                                                          ASSOCIATED CASH   D
32| DATE    LOC  NUMBER   NUMBER        S  DATE    S     ISIN     CUR  NOMINAL/QUANTITY    SETTLEMENT AMOUNT   RISK POSITION    A
33|-------- ---- ------- ---------------- - -------- -- ------------ --- ------------------- ------------------ ------------------ -
     (10)   (11) (12)      (13)        (14) (15) (16)   (17)      (18)        (19)              (20)               (21)       (22)
34|16-11-00 XETR 3999999 9999999277163257 S 20-11-00    DE3111111111 EUR          2,000.000-      10,700,340.00                  D
35|16-11-00 XETR 3999999 9999999277163257 S 20-11-00    DE1222222222 EUR          4,000.000-      10,700,340.00                  A
36|16-11-00 XETR 4444444 9999999277163258 B 20-11-00    DE3111111111 EUR          4,000.000      14,000,680.00-                  D
37|16-11-00 XETR 4444444 9999999277163258 B 20-11-00    DE1222222222 EUR          8,000.000      14,000,680.00-                  A
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CCP Circular 57/02

To the FWB Members, Xetra® Members and Vendors

Recipients: Project Coordinators, System Administrators

FWB
Frankfurter
Wertpapierbörse

Management

Neue Börsenstraße 1
60487 Frankfurt am Main

Mailing Address
60485 Frankfurt am Main

Telephone
+49(0)69-21 01-16 60
+49(0)69-97 70-16 60

Telefax
+49(0)69-21 01-16 61
+49(0)69-97 70-16 61

Internet
deutsche-boerse.com

Central Counterparty – CCP November 22, 2002
Member documentation - Corporate Actions (German version), Shaping

Dear Sir or Madam,

With this circular we provide you with further documentations regarding the Central Counterparty for Equities (CCP).

As announced in CCP Circular 56/02 as of November 19, 2002, you receive today the German version of the documentation on the handling of Corporate Actions with introduction of the CCP.

The second attachment provides you with a documentation on the shaping of delivery instructions as a CCP functionality.

Should you have further questions or require additional information, please do not hesitate to contact the CCP Change Management Team at telephone +49(0)69-21 01-16 60 or fax +49(0)69-21 01-16 61.

Yours faithfully
On behalf of the Management

Jens Hachmeister Christian Ochsner

Enclosure



3 days to go

Start of CCP Simulation
on November 25, 2002

General Managers:
Edward Backes
Dr. Heiko Beck
Rudolf Ferscha
Frank Gerstenschläger
Volker Potthoff

Central Counterparty for Equities (CCP)

Shaping

This document describes the Shaping of delivery instructions as a functionality of CCP Release 1.0.

As outlined in the document "Final Functional Release Notes" (CCP Circular 37/02), the Settlement Netting for trades on the evening of T+1 is carried out per Settlement Netting Unit. This Settlement Netting process results in an offsetting block as well as in a balance of not offsetable trades, the so-called "surplus". Trades marked for gross processing are not subject to Settlement Netting. For these trades separate gross delivery instructions are generated.

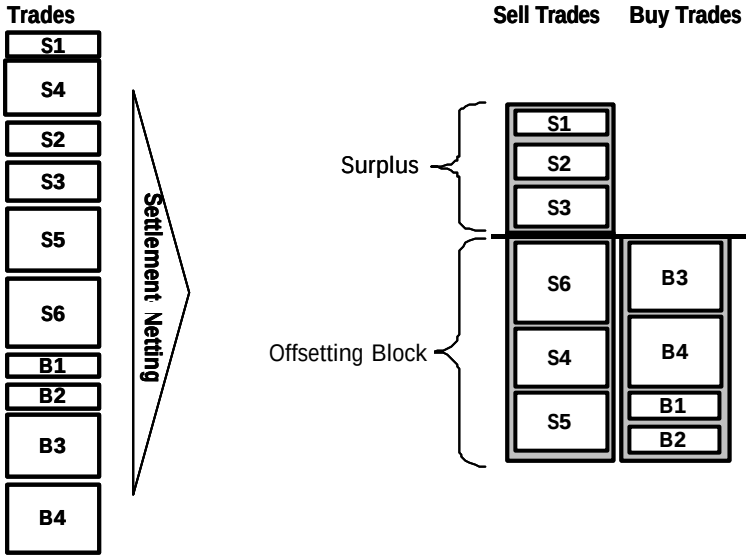


Figure 1: Settlement Netting

For all pending/released trades in the surplus, one or more delivery instructions have to be generated. The same applies for any pending/released trade marked for gross processing.

The number of generated delivery instructions depends on the size of the surplus or the size of the trade marked for gross processing. The partition into several identically sized delivery instructions is called 'Shaping". To ensure a smooth settlement process, buy as well as sell delivery instructions are subject to Shaping. The settlement of delivery instructions is carried out as Delivery-versus-Payment-(DvP) or Receipt-versus-Payment-Transactions (RvP), respectively, by Clearstream Banking Frankfurt (CBF).

The following example explains how Shaping is executed separately for each surplus on the sell and buy side as well as for each trade marked for gross processing.

- Seller DCMFR has three trades with a total of 13,000 shares in the surplus
- Buyer GCMMU has one trade of 8,000 shares in the surplus and a trade of 5,000 marked for gross processing
- The size of a Shaping block for this equity is delimited to 3,000 shares

The following figure illustrates that, for the seller, the CCP generates four delivery instructions of 3,000 shares (trades S1-S3) and one instruction for the remaining 1,000 shares (S3).

For the buyer, the CCP generates two receipt instructions for 3,000 shares (B1) and a further instruction for the remaining 2,000 shares (B1). Additionally, for the buy trade marked for gross processing, one instruction stating receipt is generated for 3,000 shares (B2) and one instruction for the remaining 2,000 shares (B2).

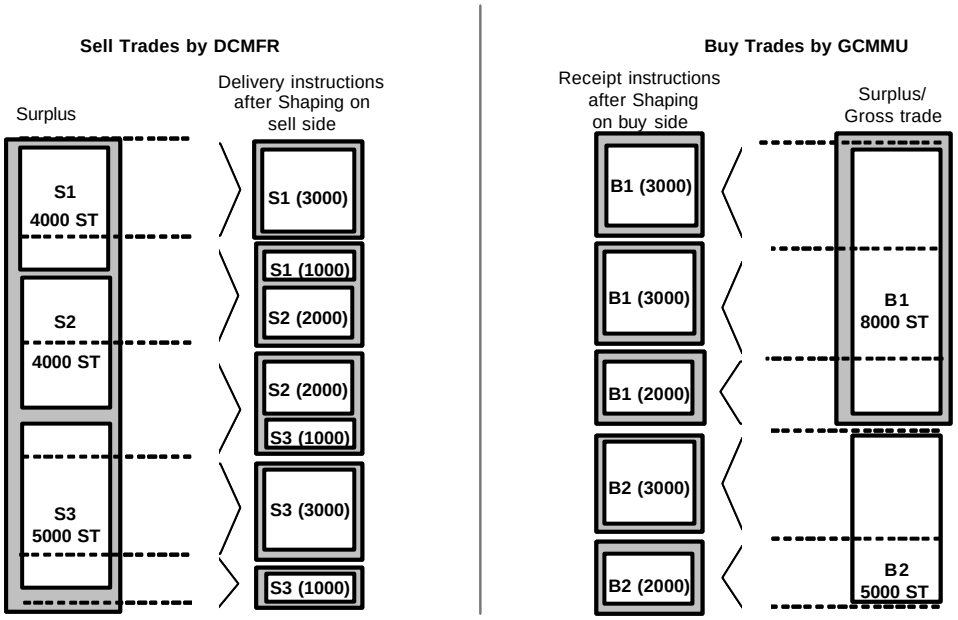


Figure 2: Shaping in the CCP

The disposition of shares is carried out in the context of the CBF settlement cycle. Here, it becomes obvious, that the number of available shares does not suffice to cover all delivery instructions.

In this example only 11,000 of the required 13,000 shares are available from the seller's stock (DCMFR). Without Shaping, the CCP would have sent a delivery instruction of 13,000 shares to CBF, which consequently would not have been settled due to a lack in the number of shares available. Due to Shaping, at least 10,000 shares can be delivered to the CCP, which the CCP then forwards to the buyer (here: GCMMU).

The following figure illustrates the delivery instructions which are generated by the CCP and then sent to CBF. At CBF, the currently applied processing algorithm will also be applied to the CCP delivery instructions.

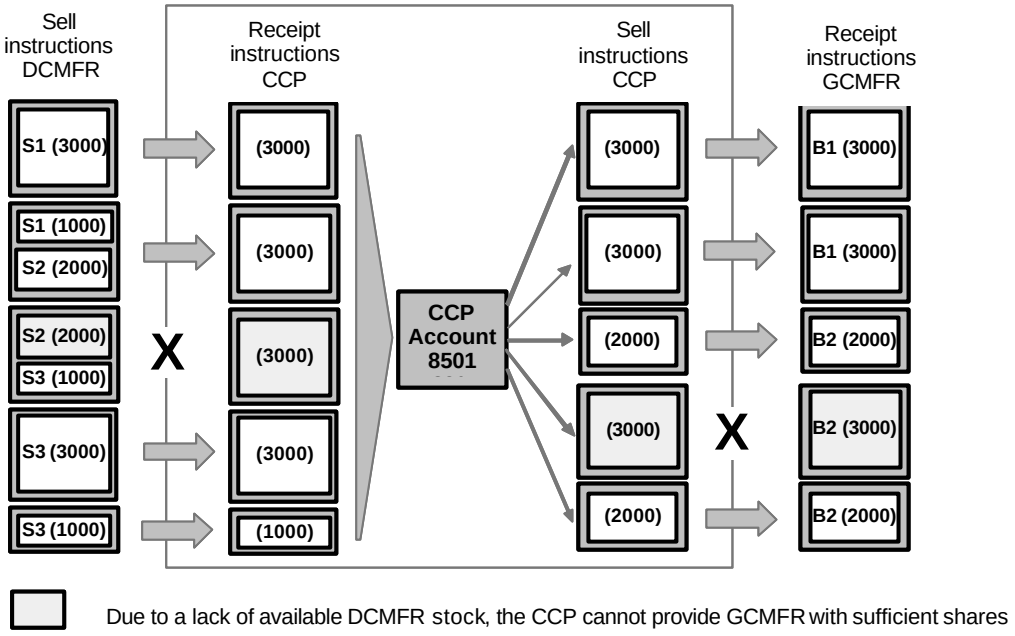


Figure 3: Settlement at CBF

Summarizing, the following applies:

- Shaping is carried out
  - for any pending buy surplus or released buy surplus originating from Settlement Netting, and
  - for any single pending/released trade marked for gross processing.
- The size of the Shaping blocks is determined per instrument (ISIN). A Shaping block for the final delivery instruction may be smaller than the ones of the preceding delivery instructions. The specific instrument's average daily trade volume is the basis for the determination of the Shaping block size. An adjustment of the Shaping sizes is scheduled to be carried out on a monthly basis.
- The lower limit of a Shaping block is defined by the "Minimum Settlement Unit (MSU)". The latter is recorded in the individual security's master data.
- Depending on the size of a trade and the size of the Shaping block, a trade may be divided into several Shaping blocks.
- Additionally, the surplus from Settlement Netting may contain more than one trade.
- For every Shaping block one delivery instruction or instruction confirming receipt is generated.
- For every Shaping block a unique Delivery ID is generated.