

JSE CLEAR

Default Management Process

November 2020

Version Control

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Creation Date:	20 November 2020
Approved by:	JSE Clear Exco
Approval date	January 2021
Version:	1.0
Last update:	N/A

Version History

Version	Date	Summary of changes	Author
1.0	November 2020	Initial Draft of Process	JSE Clear Risk

Default Management Process

Purpose of / Introduction to Process

Default management ensures that the actions required to resolve a default event are executed in an orderly and timely fashion, and that disruption to the markets operated by JSE Clear is minimised and contained.

The desired outcome of successfully managing a default event is the maintenance of business-as-usual clearing activities throughout the default resolution.

The **Default Management Group Committee (DMGC)** of JSE Clear is responsible for carrying out the activities required for the management of a Clearing Member (CM) default. The members of the DMGC are:

- The JSEC CEO;
- The JSE's Head of Market Regulation;
- The JSEC CRO; and
- The JSEC COO.

Glossary:

JSEC: JSE Clear	CM: Clearing Member
CRO: Chief Risk Officer	Market Reg: Market Regulations Team
CEO: Chief Executive Officer	CSC: Customer Service Centre
COO: Chief Operating Officer	IS: Information Services
MoU: Memorandum of Understanding	JSEC Ops: JSE Clear Derivatives Operations Team
TM: Trading Member	Client: The client of a trading member

Note: The "Role-player" column in the table below indicates the person ultimately responsible for ensuring that the task gets actioned, although it may be completed by anyone within the team.

Seq	Process Description	Role-player	Resource / Tool	System
	<u>Default trigger: Default as a result of involuntary membership termination</u>			
An event occurs which indicates that it is highly unlikely that a CM will meet its JSE Clear payment obligations (i.e. an insolvency, business rescue or a sanction being imposed by a local or foreign regulator).				
1	JSEC representatives become aware of an insolvency, curatorship, business rescue, settlement with creditors etc. of a CM and escalate to the JSEC CEO, who in turn convenes the DMGC. JSE Clear may also be informed by the CM itself that it will be unable to meet an upcoming payment obligation.	JSEC CRO; JSEC CEO		
2	DMGC meets at the earliest possible convenience to discuss whether or not failure is imminent. The DMGC will review the size of the CM's imminent payment obligations. If the DMGC decides that default proceedings should not be invoked, proceed with business as usual.	DMGC		Clearing Systems
3	If the DMGC decides that default proceedings should be invoked, then the DMGC will consult the SARB in accordance with the Memorandum of Understanding between JSE and the SARB to obtain SARB's concurrence that the CM should be defaulted.	DMGC; Legal Counsel; SARB Governor	JSEC Rules; JSEC's policies and procedures; JSE-SARB MoU	

4	<p>Depending on the outcome of the consultation with the SARB, JSEC either proceeds with business as usual, or invokes the default procedures in which case a series of communications are initiated, according to the following protocol:</p> <ul style="list-style-type: none"> • notify all JSE and JSEC governance structures, • contact the defaulting CM to inform them of the action that will be taken, • inform the trading members and the other CMs of the default situation, • notify the market that default proceedings will be instituted. <p>It should be noted that the SARB may make the initial communications regarding the default to the market, followed then by the specific derivatives markets communication by JSEC.</p>	DMGC; CSC; JSEC CEO; SARB Governor	Market notice	
Note: Throughout the default management process, the DMGC will communicate key activities to the authorities and the JSEC Board and Risk Committee. Events and activities that will be communicated will include the decision to institute default management activities, the initiation of the sale of the defaulter's portfolio, the completion thereof, the porting of healthy Trading Members and clients, the accessing of any liquidity facilities and the finalisation of default activities. The DMGC will also issue instructions to the JSE Clear Operations, Risk and IT teams.				
	<u>Default trigger: Default as a result of non-payment of an obligation that is due</u>			
1	07h30: Payment from a particular CM does not reflect in the JSEC bank account.	CM; JSEC Ops		RTC, Banking application
2	<p>JSE Clear Operations team contacts the CM to request them to settle.</p> <p>08h00: JSEC Ops follows up the reminder email with a telephone call, should payment still be outstanding at this time.</p> <p>08h00-11h00: JSEC Ops follows up periodically with the CM if payment remains unsettled, to establish the reason for the delay and the estimated time when the payment will be actioned.</p>	JSEC COO; JSEC Ops		
3	11h00: If payment is still not reflected, then JSEC Ops escalates to JSEC CRO and the JSEC CEO	JSEC COO; JSEC CRO; JSEC CEO		RTC, Banking application
4	The JSEC CRO and/or the JSEC CEO will attempt to resolve with the CM and if payment is still not made the JSEC CRO escalates to the DMGC.	JSEC COO; JSEC CRO; JSEC CEO		
5	<p>The following are scenarios for non-payment:</p> <ul style="list-style-type: none"> • If non-payment is a result of operational difficulties likely to be resolved before 11h00, then the DMGC monitors payments until 12h00. If payment is made, then default proceedings are not invoked. • If non-payment is a result of operational difficulties not likely to be resolved before 11h00, then the CM is requested to obtain credit from a different commercial bank by 12h00. If payment is made, then default proceedings are not invoked. • If non-payment is a result of credit or liquidity difficulties, then default procedures are invoked. 	DMGC; JSEC COO; Finance Treasury; JSEC CRO		
6	If payment is not received by 12h00, the DMGC will consult the SARB in accordance with the Memorandum of Understanding between JSE and the SARB to obtain SARB's concurrence that the CM be defaulted. The DMGC contacts the SARB Governor to discuss JSEC's need to institute default proceedings beginning with the suspension of trading, deal management and clearing and the changing of banking details (see next section).	DMGC; JSEC CEO; Governor SARB		

7	<p>If the SARB agrees that the default can be invoked, JSEC initiates the default procedures with a series of communications that are distributed according to the following protocol:</p> <ul style="list-style-type: none"> • notify all JSE and JSEC governance structures, • contact the defaulting CM to inform the CM of the action that will be taken, • inform the trading members and the other CMs of the default situation, • notify the market that default proceedings will be instituted. 	DMGC; CSC; JSEC CEO; SARB Governor		
8	JSEC's committed liquidity providers are contacted to inform them of the possible imminent requirement for cash under the committed facility agreement (this process is detailed in the section below entitled "Invoking of Liquidity Facilities").	Finance Treasury		
	<u>Default Processing: Suspend trading and deal management and change banking details</u>			
1	<p>All users of the defaulting CM are suspended from performing any activities on the Trading System, specifically capturing of reported trades. All technical logins are also suspended.</p> <p>All users of TMs that clear through the defaulting CM are suspended from trading.</p>	JSE Trading IT; IS Client Data	An excel spreadsheet with the names and member codes of all impacted TMs	JSE Trading System, MIT
2	<p>All users of the defaulting CM are suspended from all deal management and clearing activities in the clearing system.</p> <p>All users of TMs that clear through the defaulting CM are suspended from all deal management activities in the clearing system</p>	CSC	Excel spreadsheet with the names and member codes of all impacted CM and TMs	RTC
3	A script is provided to DBAs (database administrators) to set the risk limit of defaulting CM and its TMs to 0. This prevents these entities from trading.	JSE Trading IT	Script	NUCLEARS
4	All Dealer IDs of the defaulting CM and its TMs are suspended to prevent deal management.	IS Client Data		NUCLEARS
5	The bank account details of the defaulting CM are changed to those of the JSE Clear default account.	JSEC COO; IS Client Data		NUCLEARS, PCH, MDS
Note: The above processes should be completed within the shortest possible time after JSEC's decision to institute default proceedings, and before market opens if the decision to institute default proceedings is made post EOD.				
	<u>Default Processing: Determination of defaulting parties and processing of payments from/to non-defaulting TMs and clients</u>			
6	Compliance officers at all trading members (TMs) that clear through the defaulting CM are contacted in order to determine whether these TMs are in a sound financial position and able to meet their JSE Clear payment obligations. If it is confirmed that these TMs are unable to meet their payment obligations JSEC will institute default proceedings against them and their positions will be added to the defaulted portfolio to be closed down.	JSEC COO, JSEC CRO		Telephone, E mail
9	JSEC obtains bank details from non-defaulting TMs and in turn provides JSEC's bank details to non-defaulting TMs.	JSEC COO		Telephone, E mail

10	Non-defaulting TMs are expected to pay all obligations relating to their activity in the exchange-traded derivatives market to JSEC directly – failure to do so will be treated as a new default and their positions will be added to the defaulted portfolio. (Finance team to settle the non-defaulting TMs directly, if money is owed to them, once the TM's banking details are verified.)	Non-defaulting TMs; Finance		SWIFT, Banking applications
16	Direct clients of the defaulting CM's own TM and clients of any other TMs that have been defaulted are contacted to determine whether these clients are in a sound financial position and able to meet their JSE Clear payment obligations. If it is confirmed that these clients are unable to meet their payment obligations JSEC will institute default proceedings against them and their positions will be added to the defaulted portfolio to be closed down.	JSEC COO, JSEC CRO		Telephone, E mail
	TMs are obligated by the JSE Clear Rules to provide JSE Clear with up to date contact details for all of their clients. In instances where JSEC is unable to obtain contact information for the relevant client within a period of no more than 2 hours, the client's positions are closed out. They are added to the defaulted portfolio and closed out through an auction.	JSEC COO		
19	JSEC obtains client bank details from non-defaulting clients and in turn provides JSEC bank details to non-defaulting clients.	JSEC COO		Telephone, E mail
20	Non-defaulting clients of defaulting TMs are expected to pay all obligations relating to their activity in the exchange traded derivatives market to JSEC directly – failure to do so will be treated as a new default. The Finance team settles the non-defaulting clients of defaulted TMs directly if money is owed to them.	Non-defaulting TMs		SWIFT, Banking applications
Three processes are executed in parallel at this point A. Invoking of liquidity facilities B. Closing down of the defaulted portfolio C. Porting of healthy TMs and clients				
	A. <u>Invoking of liquidity facilities</u>			
1	The total margin on call is established. At least 30% of the invested margin will be in call accounts in accordance with the JSEC investment mandate.	JSEC CRO		
2	The total margin on deposit attributable only to the defaulting entities under the defaulting CM is determined.	JSEC CRO		Clearing Systems
3	If the total margin on call is substantially greater than the margin of the defaulted parties, then there will likely be no need for invoking liquidity.	JSEC CRO		
4	If the total IM of the defaulted parties is greater than the amount of margin on call, then the liquidity lines will likely need to be invoked. Some discretion will be exercised: <ul style="list-style-type: none"> If it is expected that the total of the realised (unsettled VM call) and the unrealised losses that will be incurred in closing out the defaulter's portfolio will be greater than the margin on call, then the liquidity lines will be invoked. The liquidity lines may also be invoked if the aforementioned total losses do not exceed the margin on call but additional liquidity is deemed necessary and prudent to ensure the CCP can support ongoing operations and meet further liquidity needs that could arise from the default of other participants e.g. due to contagion effects. 	JSEC CRO; Finance		

Default Processing: Close-out defaulting positions				
B. Closing down of portfolio				
Positions of all defaulted parties are closed out. The primary mechanism for closing out defaulted positions is the auction. Below is a description of the auction process.				
1	The net positions of all defaulting entities (the defaulting CM's own TM's house account, all other defaulting TM house accounts, and all defaulting client accounts) are determined.	JSEC CRO	Position extracts will be used to calculate these net positions.	Clearing System(s)
2	The positions of all defaulting participants (client and TMs) that cleared through the defaulting CM, are added to the defaulted portfolio to be auctioned.	JSEC COO; JSEC CRO		Nuclears; RTC
3	The DMGC is presented with an "auction set per asset class", and advises that the auction can be initiated.	JSEC CRO		
4	An e-mail is sent to the Head of Clearing at all non-defaulting CMs and their trading desks informing them that an auction will be held. This communication will include the steps in the auction and the timing of each of these, as well as details of which instruments will be in the auction sets. This is important for Trading Desks, in order to mobilise personnel in anticipation of the auction and to get feedback from trading desks that may not have the authority to trade one or more of these instruments.	DMGC; JSEC COO		E-mail
5	The Head of Clearing at all non-defaulting CMs will provide JSEC with a written response indicating interest in bidding.	Non-defaulting CMs; DMGC		
6	The DMGC sends an email to the Head of Clearing at all non-defaulting CMs and their trading desks that indicated interest in bidding, with an excel spreadsheet showing the set of positions per auction set, that will be auctioned, including the mirror opposite portfolio for participants to submit two-way bids. This is to prevent information leakage of the defaulted portfolio being auctioned.	DMGC; Non-defaulting CMs	Spreadsheet highlighting the market risk within each auction set – incl. various "greeks", VaR and ETL type risk metrics, and the most recent MtM values of the respective positions.	E-mail
7	A cut-off time is decided upon, beyond which bids will no longer be accepted for the auction. A distinct cut-off time is set for each auction set.	DMGC;		
8	Non-defaulting CMs are expected to place bids for the auction sets on a "winner takes all" basis.	Non-defaulting CMs	Bids are received via email to a dedicated default management mailbox.	E-mail
9	After the bidding has closed, the winning bidder for each auction set is determined. If no bids were received, or if the DMGC is of the opinion that better bids can be obtained from a new auction in a particular auction set, or by deconstructing a particular auction set into various smaller auction sets, a new cut-off time will be determined for the particular auction set.	DMGC		
10	The winning bidders are notified and the direction of the portfolios that they won is provided. All participants are notified that the successful bidders have been notified.	DMGC; Non-defaulting CMs		E-mail

Note: This process will be repeated until a successful bid is received for each auction set. However, if this process is repeatedly unsuccessful for a particular auction set, JSEC may at its discretion decide to terminate some or all of the contracts in the said auction set, closing these out at a fair price determined by JSEC. The counterparties to these terminated transactions will be selected by the DMGC using a pro-rata-based approach.

11	The positions of the defaulter are closed by selling all positions to the auction winners at the winning bid price (or to the counterparties selected in the termination process at the fair price determined by the DMGC).	JSEC COO; JSEC CRO		Nuclears; RTC
12	Trades for the commodity derivatives and interest rate derivatives markets are captured on Nutron directly, with the counterparty of each trade, and feed into Nuclears. These trades are zero-fee'd in Nuclears. For the equity derivatives and currency derivatives markets trades will be uploaded into RTC.	JSEC COO; JSEC CRO		Nutron; Nuclears; RTC
13	JSEC Ops generate position reports for successful bidders to confirm that positions were transferred correctly to the winners' accounts (Nuclears and RTC).	JSEC COO		Nuclears; RTC
14	JSEC requests winning bidders confirm that positions have been transferred at the correct price.	DMGC; Non-defaulting CMs		Telephone, E-mail
15	JSEC requests winning bidders confirm that the auctioned positions have been booked at the correct price.	DMGC; Non-defaulting CMs		Telephone, E-mail
C. <u>Porting of non-defaulting TMs and their clients</u>				
1	The DMGC is presented with a list of all healthy TMs and clients who clear through the defaulting CM.	GMGC; JSEC COO, JSEC CRO		
2	JSEC will transfer all positions of non-defaulting TMs of the defaulting CM and their clients as follows: <ul style="list-style-type: none"> to the alternate CMs designated by the clients or TMs in terms of the exchange rules; or if an alternate CM has not been designated JSE Clear will endeavour to transfer the relevant positions to another CM or CMs, at its discretion and with the consent of such CM or CMs. 	GMGC; JSEC COO, JSEC CRO		Clearing systems
3	If an alternate CM has been designated by the clients or TMs, JSEC will transfer the TMs to their nominated CMs.	GMGC; JSEC COO, JSEC CRO		Clearing systems
4	If an alternate CM has not been designated by the clients or TMs, JSE Clear will determine the proposed allocation of the healthy TMs amongst the healthy CMs.	GMGC; JSEC COO, JSEC CRO		Clearing systems
5	The Executives at all non-defaulting CMs are contacted to assess their appetite to accept the proposed allocation of healthy TMs.	DMGC; Non-defaulting CMs		Telephone, E-mail
6	Clearing Members assess the allocated TMs, conducting KYC and credit assessments. As far as possible, JSEC assists with the completion of KYC and credit related information of non-defaulting TMs, to expedite the porting process.	Non-defaulting CMs; JSEC COO, JSEC CRO		Telephone, E-mail

7	Clearing Members will be required to revert within a strictly defined time period as to their willingness to accept the allocated TMs.	Non-defaulting CMs		Telephone, E-mail
8	If a non-defaulting TM is not successfully accepted by a new CM, the porting process will be deemed to have failed for that TM. JSE Clear then institutes default proceedings against the particular TM.	DMGC; JSEC COO; JSEC CRO; Market Reg		
9	If a particular CM is willing to accept a non-defaulting TM, the process is facilitated by the JSEC Ops team, using the member transfer functionality in the clearing system(s).	JSEC COO		Clearing System(s)
<u>Settlement of defaulter's obligations as at the time the default was determined:</u>				
1	<p>The cash collateral of the defaulting entity is transferred from the IM investment pool to JSEC's dedicated JSEC default management trust account.</p> <p>JSEC's liquidity facility may have been invoked to fund the IM tied up in term deposits, for example if the defaulter's IM makes up more than 30% of the total IM that is on call.</p> <p>Defaulting CM's default fund deposit is transferred to the abovementioned trust account if necessary.</p>	Finance Treasury		SWIFT, Banking applications
2	Payment obligations (all obligations except for initial margin) associated with the positions of the defaulting entities are settled, using the funds available in the abovementioned trust account.	JSEC COO; Finance Treasury		
3	Any cash due to the defaulting entities is transferred to the trust account.	Finance Treasury		SWIFT, Banking applications
4	If the defaulting entity's IM and default fund contribution is exhausted, then first the JSE Clear's default fund contribution and then the non-defaulting CMs' default contributions are made available to cover the defaulting entity's losses.	JSEC CRO; JSEC COO		
5	If there is still a shortfall after utilizing the default fund, the shortfall will be apportioned across each market in which the defaulting CM participated on a pro rata basis (as detailed in section 10.2.14 of the JSEC Rules). A claim will be instituted against the defaulting CM for the shortfall.	JSEC CRO, JSEC COO		
<u>Settlement of obligations associated with the close down of the defaulted portfolio and post default activities</u>				
1	<p>The total losses incurred in closing the positions of all defaulting entities are calculated¹. Any fees (agent fees for selling securities collateral, penalties for liquidating term deposits etc.) that were incurred during the default management process, are added.</p> <p>This amount is then set-off against the total amount of collateral remaining after settling the payment obligations described in the section above.</p> <p>¹The losses will be calculated by considering the difference between the set of MtM prices on which the defaulting entity's last successful VM payment was based, and the set of prices at which the positions were auctioned or terminated.</p>	JSEC CRO; IS Valuations; Legal Counsel		
2	Finance corroborates the collateral calculations made by JSEC Risk.	Finance Treasury		

3	Finance is instructed to pay any balance remaining, after the above set-off, to the curator of the defaulting estate.	DMGC	DMGC to contact curator to obtain details.	
4	The non-defaulting CMs are notified of the extent to which their default fund contributions were utilized.	DMGC		
5	The Finance Team then re-balances the investments of initial margin to ensure the funds are invested within the limits prescribed by the JSEC Investment Policy.	Finance Treasury	JSEC Investment Policy	
6	A new size for the JSEC default fund is calculated and the default fund replenishment requirements are communicated to all non-defaulting CMs.	JSEC CRO		
7	A full reconciliation of the default management process is conducted by JSEC Internal Audit.	JSEC Internal Audit	This reconciliation will include a review of the actions of the DMGC; the sale of the defaulter's portfolio in terms of process, prices and proceeds; and the sale of collateral.	
8	JSEC conducts a solvency check on its own operations, which will include regulatory and economic capital.	JSEC CRO		
9	JSEC checks that all accounts that were ported have appropriate legal documentation concluded.	JSEC CRO; JSEC COO; Market Regulation		
Seq	Process Description – Trading Member Default	Role-player	Resource / Tool	System
	<u>Default trigger: Default as a result of a trading member not meeting its obligations with its clearing member in respect of trades and positions</u>			
1	JSEC representatives are informed by a clearing member that a TM is no longer meeting its obligations with them and are advised by the clearing member that they declare the TM to be in default, or JSEC in its sole discretion determines the TM to be in default. Escalation to the JSEC CEO, who in turn convenes the DMGC.	JSEC CEO, JSEC CRO, JSEC COO, Clearing Member; Market Regulation		
2	The clearing member of the defaulting TM and/or the JSE suspend all users of the defaulting TM from performing any activities on the Trading System. All technical logins are also suspended.	JSE Trading IT; IS Client Data, Clearing Member	An excel spreadsheet with the names and member codes of the impacted TM	JSE Trading System, MIT
3	All users of the defaulting TM are suspended from all deal management and administration activities such as the creation of client accounts in the clearing system.	CSC	Excel spreadsheet with the names and member codes of the impacted TM	RTC
4	A script is provided to DBAs (database administrators) to set the risk limit of defaulting TM to 0. This prevents these entities from trading.	JSE Trading IT	Script	NUCLEARS

5	All Dealer IDs of the defaulting TM are suspended to prevent deal management.	IS Client Data		NUCLEARS
6	<p>The clearing member of the defaulting TM is required to transfer the defaulting TM's positions to the clearing member by either:</p> <p>1) trading, using its own account with the defaulting TM to close the positions at a price approved by JSEC</p> <p>or</p> <p>2) JSEC transferring the positions of the defaulting TM to the clearing member at a price approved by JSEC</p> <p>The approach followed for the transfer of positions is agreed between the JSEC DMGC and the clearing member of the defaulting TM at the time the default is declared.</p> <p>This process is required to be completed within 2 days of the TM default being declared or within a time period as agreed to by JSEC</p>	JSEC Clear Operations, Clearing Member		MIT, RTC, NUTRON
7	The clearing member of the defaulting TM is required to contact all clients of the defaulting TM and inform them of the default and of the arrangements that these positions will be transferred to the trading member of the clearing member OR arrange a transfer to a trading member at an alternative clearing member	Clearing Member		
8	The clearing member ensures that all clients of the defaulting TM that become clients of the trading member of the clearing member have the relevant client agreements in place.	Clearing Member		
9	All settlements (initial and variation margin) due to JSEC in respect of the defaulting TM and its clients trades and positions are settled by the clearing member of the defaulting TM as per the daily settlement process on T+1 after JSEC's end of day processing.	Clearing Member, JSE Clear Operations		SWIFT, RTC, NUCLEARS
	<u>Default trigger: Default as a result of a client not meeting its obligations with its trading member in respect of trades and positions</u>			
1	<p>JSEC representatives are informed by a trading member that a client is no longer meeting its obligations with them and are advised by the trading member that the client is considered to be in default, or JSEC in its sole discretion determines a client to be in default.</p> <p>JSEC may at this time deem the same client to be in default with another trading member it is registered under.</p> <p>Escalation to the JSEC CEO, who in turn convenes the DMGC.</p>	JSEC CEO, JSEC CRO, JSEC COO, Clearing Member Market Regulation		
2	The trading member of the defaulting client suspends all users of the defaulting client should any direct market access arrangements be in place and ceases to perform any trading or deal management on instruction of the client.	Trading Member		

3	<p>The trading member of the defaulting client is required to transfer the defaulting clients positions to the trading member's own account by either:</p> <ol style="list-style-type: none"> 1) trading, using its own account, with the defaulting client to close the positions at a price approved by JSEC or 2) JSEC transferring the positions of the defaulting client to the trading member at a price approved by JSEC <p>The approach followed for the transfer of positions is agreed between the JSEC DMGC and the trading member at the time the default is declared.</p> <p>This process is required to be completed within 2 days of the client default being declared or within a time period as agreed to by JSEC</p>	JSEC Clear Operations, Trading Member		MIT, RTC, NUTRON
4	<p>All settlements (initial and variation margin) due to the clearing member in respect of the defaulting client's trades and positions are settled by the trading member of the defaulting client as per the daily settlement process on T+1 after JSEC's end of day processing.</p>	Trading Member, Clearing Member, JSE Clear Operations		SWIFT, RTC, NUCLEARS