



EUROPEAN CENTRAL BANK

EUROSYSTEM

# TARGET2 Incident on 11<sup>th</sup> of August 2020

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**AMI-Pay/SeCo**  
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DISCLAIMER:

*One of the authors of this presentation is member of one of the user groups with access to TARGET2 data in accordance with Article 1(2) of Decision ECB/2010/9 of 29 July 2010 on access to and use of certain TARGET2 data. The ECB, the MIB and the MIPC have checked the presentation against the rules for guaranteeing the confidentiality of transaction-level data imposed by the PSSC pursuant to Article 1(4) of the above mentioned issue.*

# Key steps (1/2)

11/08	13:09	TARGET2 disconnected from network
	13:55	1 <sup>st</sup> Crisis Managers call / decision to publish to market
	14:00 - 15:30	Several unsuccessful attempts to restore service on primary site
	15:35	Decision to perform intra-region failover and to delay closure
	16:43	Site recovery completed
		FIN traffic working
		ICM, AS files settlement and liquidity transfers to/from TIPS & T2S not available
	17:54	Connection to T2S restarts
	18:05	Liquidity transfers to/from T2S & TIPS available / AS processing not confirmed / ICM still unavailable / decision to activate the TARGET2 contingency network
	18:15	TARGET2 contingency network activated (ICM available) / AS processing available / decision to delay T2S event cut-offs
	18:30	A2A traffic (ICM & ASI) restored
19:00	All services operating, except U2A access to ICM via SWIFT	

# Key steps (2/2)

<b>11/08</b>	19:45	Automatic cash-sweep unsuccessful (TARGET2); End of Day postponed until 20:30
	20:10	Automatic cash-sweep successful / decision to postpone business day events / maintenance window postponed to 23:00 (shortened to 2h)
	20:30	Cut-off for interbank payments
	21:15	Business day change cannot take place / decision to delay start of T2S NTS phase
	21:51	ICM available
	22:13	Change of Business Day
	22:30	Technical completion of inter-region failover
	22:34	SSP closed automatically / maintenance window started (SSP close could not be moved to 23:30 as decided); this prevented the execution of Standing Facilities refunds, modification of credit lines and completion of transmission of MT950
<b>12/08</b>	01:09	Maintenance Window ends / MT950 messages completed successfully / Standing Facilities refunds reactivated at the start of the day trade phase
	07:00	TARGET2 reopening for daylight phase
	07:45	Refunding of overnight deposits
	18:00	TARGET2 end of day

# Root cause of the incident

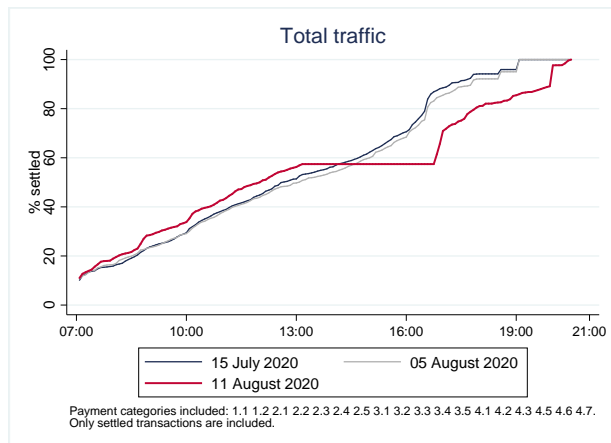
The initial investigations revealed that for the installation of a new computer unit, two new infrastructure components (so-called tap-off boxes) were connected in order to supply power to the new computer unit.

On the 11<sup>th</sup> of August, these tap-off boxes were integrated into a control system to enable monitoring and to allow for them to be set to 'on' and 'off'. The mainframe systems are redundantly connected to two separate power supplies. Due to a wrong assessment by the support staff (human error), work was carried out on both power supply units almost simultaneously, which led to a power failure for the connected part of the mainframe hosting TARGET2.

# Impact on the business

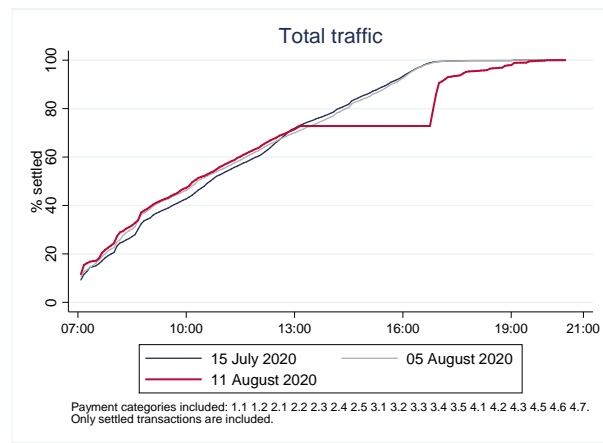
The incident had an impact on the availability of the TARGET2 ICM, FIN messages processing, liquidity transfers between TARGET2, T2S and TIPS, and the processing of AS files.

Chart 1: cumulated settlement in value of all payments



Source: TARGET2. Note: 1% of all the payment value settled between 07:00 CET and EoD corresponds to around €14.80bn, compared to €22.22bn on 15 July and €19.11bn on 05 August.

Chart 2: cumulated settlement in volume of all payments



Source: TARGET2. Note: 1% of all the payment volume settled between 07:00 CET and EoD corresponds to around 2,889 transactions, compared to 3,728 on 15 July and 3,165 on 05 August.

# Technical lessons learnt

On the side of the providing Central Banks, an initial analysis has shown that the following activities have to be performed in order to address the identified shortcomings.

## **PROPOSED ENHANCEMENTS:**

- Site Recovery Test to be scheduled as close as possible to the Rotation
- Internal technical test to be executed after major infrastructural changes
- Possible enhancement of the remote copy procedures under discussion

# Operational lessons learnt

## COMMUNICATION

TARGET2 participants are informed about incidents affecting TARGET2 via ECB website and communication channels between Central Banks and participants.

Current communication: website is only updated when there are new developments.

**Proposed ENHANCEMENT:** better manage customers' expectations, e.g.:

- a) update website every 30 min (also when new information is not available) or;
- b) indicate at each communication when next update will be available

## ECONS

Possibility of activating the contingency solution (ECONS) should be considered more pro-actively.

**Proposed ENHANCEMENT:** add decision making point to activate/not activate ECONS to the relevant operational documentation (crisis manager call checklist).

## TARGET2 CONTINGENCY NETWORK

**Proposed ENHANCEMENT:** add decision making point to activate/not activate the contingency network to the relevant operational documentation (crisis manager call checklist)



**Questions?**