

PAYMENT AND SETTLEMENT SYSTEMS

Development of payment and settlement systems

The keyword in the management of payment and settlement systems in 2010 was preparations for the euro changeover. Until the end of 2010, Eesti Pank managed three interbank payment and settlement systems: the Settlement System of Ordinary Payments (ESTA) and the Real-Time Gross Settlement System (EP RTGS) for kroon payments, and the TARGET2-Eesti for express cross-border euro payments.

Eesti Pank changed the payment and settlement systems over to the euro on 1 January 2011 and closed the Real-Time Gross Settlement System EP RTGS on 31 December 2010. Most of the transactions that were so far settled in the EP RTGS (collateral transactions of the ESTA, currency transactions with Eesti Pank and transactions related to monetary policy operations) are now settled in the TARGET2-Eesti. Due to the renewal of the securities settlement system along with the euro changeover, the stock exchange and over-the-counter transactions that were previously settled in the EP RTGS are now executed on the account holder's liquidity accounts held with the Estonian CSD.

At the beginning of 2011, the number of participants in TARGET2-Eesti grew by 10 up to 19 members. All credit institutions that are subject to the minimum reserve requirement must be members of the TARGET2-Eesti. This membership gives banks much broader opportunities to manage their cash flows both on the level of individual Estonian banks and European-wide banking groups.

At the beginning of 2011, the settlement currency of the ESTA, the Estonian kroon, was replaced by the euro. As of 3 January 2011, the first banking day of the month of the changeover, Eesti Pank's payment and settlement systems settle pay-

ments only in euro. All these changes entailed a number of developments and required close cooperation with the commercial banks.

Amendments in the legal framework for payments and settlements

22 January 2010 marked the enforcement of the Payment Institutions and Electronic Money Institutions Act and amendments in other related acts, including amendments to the Law of Obligations Act, which were passed to adopt the EU **Payment Services Directive**. The most essential amendments to the Law of Obligations Act were made in Chapter 40 regarding the issues of payment orders and payment services. Operating credit institutions, the providers of payment services, had to bring their activities and documentation into compliance with the new legislation by 22 May 2010 at the latest.

Until the enforcement of the amended acts Eesti Pank regulated the procedures and deadlines for processing payments intermediated by credit institutions as set out in Eesti Pank Governor's Decree¹, which was repealed in 2010.

With the amendments to the Law of Obligations Act, Eesti Pank was granted the authority to enforce more specific requirements for credit institutions and other financial institutions in connection with holding payment accounts and settling payments. In May 2010, Eesti Pank enforced the Decree "Conditions for acceptance of payment orders", which regulates the content of payment orders, lays down clearer terms for the acceptance of payment orders, and enforces minimum requirements for the forwarding of information specified in the payment order.

The Payment Institutions and Electronic Money Institutions Act sets out that before applying for a licence to manage payment and settlement

¹ Governor's Decree No 2, 14/05/2001 "Confirmation of instructions for settlement of payments".

systems, a payment institution has to apply for Eesti Pank's approval to the technical, economic and legal principles of a payment and settlement system and to the draft rules for the operation of the system.

The directly applicable regulation of the European Parliament and of the Council on cross-border payments in the Community, which stepped into force in November 2009, was fully applicable as of the day Estonia joined the euro area. This regulation harmonises the **charges for cross-border and domestic payments in euro** in the European Community. To bring charges into compliance with the regulation, Estonian banks started to adjust their price lists gradually in the middle of 2010.

In spring 2010, the European Commission together with other international institutions compiled an in-depth analysis of how to make the implementation of the Single Euro Payments Area (SEPA) and the transition to the SEPA schemes more effective. The analysis showed that enforcing a European Union regulation² would be the most appropriate way. In December 2010, the Commission published the proposal for a regulation on the end-dates for the migration to the SEPA. This lays down technical requirements for credit transfers and direct debits in euro together with their implementation deadlines: the requirements for credit transfers must be implemented at least within 12 months and those of direct debits within at least 24 months after the enforcement of the regulation. Member States have submitted their initial comments on the proposal of the European Commission, work with the draft regulation continues in the first half of 2011 with the intention to adopt the regulation in 2011.

The improvement of securities market infra-structures

In order to improve Estonia's financial system, Eesti Pank participates in the Eurosystem's project of TARGET2-Securities (T2S), the single technical platform for the settlement of securities transactions. Estonia is represented in the project by the **T2S Estonian National User Group (EENUG)**, which was established under the leadership of the central bank's experts who are currently also members of the group.

Year 2010 was successful for the project with developments both in policy and technical areas. Two major decisions were made in 2010:

1. In the first half of 2010, the go-live date of the T2S was postponed by one year. The T2S project is very extensive and includes many participants, and so the specification stage took longer than anticipated. The platform will be ready for use in September 2014.
2. In December 2010, the Governing Council of the European Central Bank gave a conditional approval to the T2S pricing policy for eight years (2014–2022³) and set the delivery versus payment price at 15 euro cents per instruction. One of the most significant changes was the change in the weighting of settlement services and other services (information service) in generating annual revenues of the T2S to 75% and 25% respectively.

In 2010, the T2S team did not yet finalise documents dealing with legal issues, but made preparations for the governance of the T2S project in the future and drafted agreements to regulate parties' relations. The signing of the Framework

² The regulations of the European Union are fully binding and mandatory for all Member States. Upon publication in the Official Journal of the European Union, regulations automatically become part of the legal system of the Member States without any domestic adjustment needed.

³ With a fixed increase in the first four years and not over 10% in the next four years.

Agreement between the Eurosystem and central securities depositories is scheduled for the second half of 2011.

Apart from the policy decisions adopted for the advancement of the project, the T2S team developed the documentation of T2S. Spring 2010 marked the completion of General Functional Specifications. The working group also started to develop User Detailed Functional Specifications for the users of T2S; public consultations regarding these matters started in March 2011.

After the adoption of the euro in Estonia, Eesti Pank became a full member of the Eurosystem and, in addition to its catalyst role that Eesti Pank has had in the T2S project so far, the central bank will be one of the future owners of the T2S platform. Even though the central bank's role increased, the domestic governance structure and the distribution of obligations and responsibilities in the T2S project remains the same. Eesti Pank continues to coordinate the Estonian national user group (EENUG) by supporting market participants in forming their positions, and, together with the Estonian CSD, represents the interests of the Estonian securities market in the T2S Advisory Group.

The most important issues for the EENUG are some technical and legal matters, especially as regards direct holding markets,⁴ such as the account allocation, pricing and potential connectivity with the T2S platform. In these matters, the T2S team and the Eurosystem in general have

made remarkable improvements, but there are still areas where the specificities of direct holding markets should be considered more. Another crucial issue for the EENUG is the Framework Agreement that regulates the relationship between the Eurosystem and CSDs.

Payments in the payment and settlement systems managed by Eesti Pank

In 2010, around 96,000 payments a day were settled in the interbank payment and settlement systems with the total value of 11.6 billion Estonian kroons.

The TARGET2-Eesti, a component system of the Trans-European Automated Real-Time Gross Settlement Express Transfer system, was launched on 19 May 2008. In 2010, TARGET2-Eesti gained more popularity as a channel for customer payments. Consequently, the average number of daily payments rose by 82% from 2009 to 130 payments in 2010. The average daily value of the payments initiated by the users of TARGET2-Eesti was 5.1 billion kroons (323 million euros), which is 2% less than in 2009. Estonian bank customers and banks received an average of 222 payments every day in the TARGET2 with the total value of 5.1 billion kroons (323 million euros).

In 2010, on average 212 payments a day were settled in the **Real-Time Gross Settlement System EP RTGS** with the total value of 4.9 billion kroons (313 million euros). Compared to 2009, the value of payments dropped by 15%,

Table 1. The use of Eesti Pank's settlement systems in 2010 (daily average)

Settlement system	Turnover (EEK billion)	% in total payment turnover	Number of payments	% in total number of payments
ESTA	1.6	14.1%	96,007	99.6%
EP RTGS	4.9	42.1%	212	0.2%
TARGET2-Eesti	5.1	43.8%	130	0.1%
Total	11.6		96,349	

⁴ A market where an account in the depository may be opened in the name of the final investor (end-user), not the representative (e.g. credit institution).

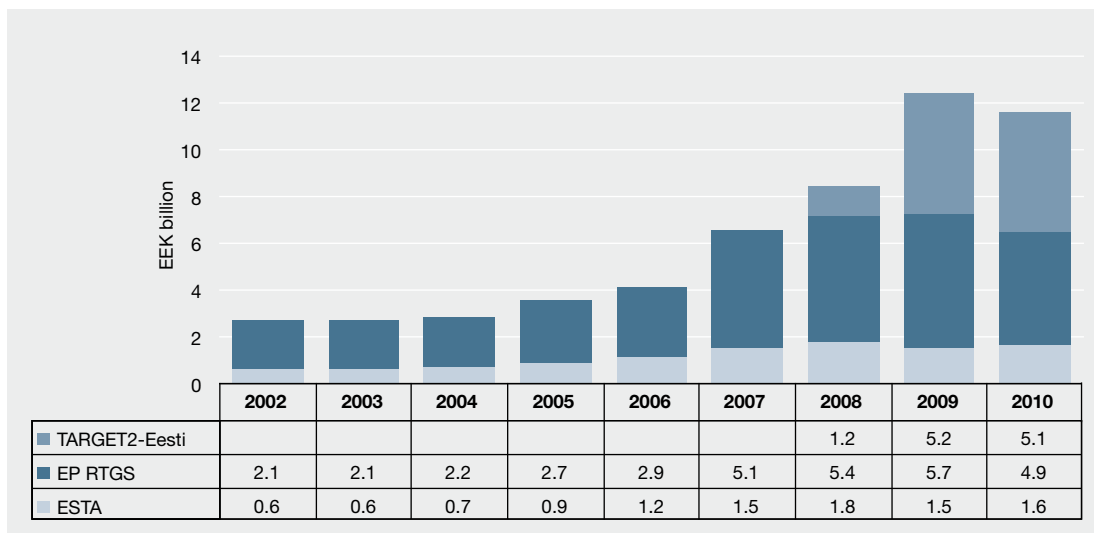


Figure 1. Daily average turnover of settlement system

while the number of payments grew by 10%. The changes stemmed from customer payments, as their value decreased by 36% from 2009. Though the number of customer payments was higher in 2009, their size was smaller. Customer payments comprised about 75% of the volume, but only 9% of the value of payments in the EP RTGS. Half of the value of EP RTGS payments stemmed from transactions related to the collateral account of the ESTA, and 25% from currency and foreign exchange transactions with Eesti Pank. The average size of a payment in the EP RTGS stood at 2.8 million kroons (0.2 million euros) in 2010. The settlement in TARGET2-Eesti and the EP RTGS is processed immediately, transfers between banks take around five minutes.

The Settlement System of Ordinary Payments, the ESTA, settled about 99.6% of total interbank payments in Estonia, but only 14% of the total value of the three systems. 75% of the payments settled in the ESTA were smaller than 5,000 kroons (320 euros), although the size of a payment in the ESTA is not limited. Only 0.2% of the payments in 2010 exceeded 1 million kroons (64,000 euros). The average payment was 17,711 kroons, having increased

by 10% over the year. The total value of the payments settled in the ESTA was 8.6% higher and the total volume was 2.4% smaller than in 2009. The ESTA is among the fastest systems in Europe. Payments are transferred to accounts in other banks ten times a day.

The oversight of payment and settlement systems

Eesti Pank's key tasks in the oversight of payment and settlement systems in 2010 were related to the adoption of the euro.

In order to change over to the euro, all important payment and settlement systems of the country must comply with the requirements of the Eurosystem and be deemed eligible for the Eurosystem.

In 2010, important payment and settlement systems in Estonia included the securities settlement system managed by the Estonian CSD and three payment and settlement systems managed by Eesti Pank:

- the TARGET2-Eesti, a component system of the Trans-European Automated Real-Time Gross Settlement Express Transfer system

- for settling cross-border payments in euro;
- the Real-Time Gross Settlement System EP RTGS for Estonian kroon payments;
- the ESTA, the Settlement System of Ordinary Payments.

There were no such incidents in the operation of these systems in 2010 that would have jeopardised the smooth functioning of settlements or the stability of the financial sector.

The TARGET2-Eesti, a component system of the TARGET2, is overseen based on the Eurosystem oversight policy framework and is in compliance with international standards.⁵ The EP RTGS was not assessed by Eesti Pank, because the system was closed along with the adoption of the euro. From thereon, real-time express payments are settled in the TARGET2-Eesti. The TARGET2 is the only real-time express transfer system of gross settlements in the euro area that enables settlements in central bank money. The TARGET2 is used by the Eurosystem's central banks for settling payments stemming from monetary policy operations. The ESTA will be assessed by Eesti Pank after the changeover to the euro, because before joining the euro area, Estonia as an EU Member State only had to assess all systemically important payment and settlement systems. Eesti Pank did not classify the ESTA as a systemically important system in the euro area. For Estonia, the ESTA still remains an important payment and settlement system domestically and Eesti Pank is responsible for its oversight.

From among the important payment and settlement systems of Estonia, the only direct assessment object for the European System of Central Banks (ESCB) in 2010 was the securities settlement system of the Estonian CSD. In addition, the ESCB assessed the eligibility of the solution applied

between Eesti Pank and commercial banks for the mobilisation of cross-border collaterals in international central securities depositories (ICSD)⁶. The securities settlement systems were assessed to determine their eligibility for the use in ESCB credit operations between Eesti Pank and Estonian credit institutions that stem from monetary policy operations and intraday credit transactions.

The Eurosystem enables to use four solutions to transfer assets eligible for collateralising the monetary policy and intraday credit operations of the ESCB:

- 1) a domestic securities settlement system that is eligible for the Eurosystem;
- 2) links between securities settlement systems that are eligible for the Eurosystem;
- 3) the Correspondent Central Banking Model (CCBM);
- 4) exceptions granted by the Governing Council of the European Central Bank.

The assessments of the securities settlement systems were based on international standards. The ESCB conducted the assessment in cooperation with Eesti Pank.

The assessment of the ECSD's securities settlement system was complicated by the fact that the ECSD planned to replace the existing depository and settlement system Depo2000 along with the euro changeover. Therefore, it was necessary to assess both the new settlement system Depend to be launched in 2011 and Depo2000, which was used at the time of the assessment and which the ECSD was supposed to use as a back-up solution, should the changeover to Depend fail. The greatest difference between Depend and Depo2000 is that the new system is no longer a net settlement system where the final settlement is performed on

⁵ See Financial Stability Review No 1/2008, pp 66-67, http://www.eestipank.info/pub/en/dokumendid/publikatsioonid/seeriad/finantsvahendus/_2008_1/_6_108.pdf.

⁶ Clearstream Banking Luxembourg in Luxembourg and Euroclear Bank in Belgium.

net basis in Eesti Pank. It is a transaction-based gross settlement system where the final settlement is performed in central bank money, but on the liquidity accounts of the account holders in the securities settlement system of the ECSD.

Both securities settlement systems of the ECSD were deemed generally eligible for use in ESCB credit operations. The securities settlement system of the ECSD will reach full compliance with the Eurosystem's standards, if

- the ECSD implements the recommendations set out in the assessment⁷; there will be securities issued in the ECSD that are eligible as collateral in the ESCB credit operations, or it will be possible to settle such securities of other countries through the eligible links with the securities settlement systems of other countries.⁸

The ESCB assessed the solution of using ICSDs in ESCB credit operations between Eesti Pank and commercial banks after the Governing Council of the European Central Bank had authorised the use of this exception. The solution, which was previously used in Estonia in the management of the reserve requirement and in the provision of intraday credit in the Estonian kroon, was deemed eligible for the Eurosystem and compatible with international standards. Estonia needed this solution because the CCBM is not available for the eligible counterparties in Estonia throughout the settlement day (the working hours of the CCBM are from 10:00 to 17:00 local time). The use of CCBM would have put Estonian commercial banks at a disadvantage compared to the other commercial banks in the Eurosystem.

⁷ The ECSD has implemented most of the recommendations provided in the assessment in 2006.

⁸ Such links between the securities settlement systems must be assessed before they can be deemed eligible for their use in ESCB credit operations.