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The Banque centrale du Luxembourg (BCL) is a public institution created by Luxembourg law. The BCL's independance is based on its organic law, the Treaty on the European Union and the Treaty on the Functioning of the European Union. The BCL is a member of the European System of Central Banks (ESCB) composed of the National Central Banks of all 28 EU Member States and the European Central Bank (ECB).

THE MISSION

The Bank is a member of the Eurosystem that consists of the European Central Bank and the National Central Banks of the Member States that have adopted the euro. It takes part in the Single Supervisory Mechanism (SSM). It is in charge of managing the monetary and financial responsibilities granted to it as one of the National Central Banks of the ESCB.

At the national level, the central bank has to carry out the tasks conferred on it by the national laws and conventions.

It is developing the following fields of competence:

- Research and studies and their communication thereof, which aim to prepare, on the one hand, monetary policy decisions and, on the other hand, the development of wider knowledge concerning monetary, financial and economic issues;
- Collection and analysis of statistics in the monetary, financial and balance of payments fields;
- Implementation of monetary policy;
- Organisation and supervision of payment and securities settlement systems;
- Issuance and circulation of banknotes and coins;
- Financial asset management, both on own account and for third parties;
- Participation in the prudential supervision of the financial system and the exercise of the oversight of payment and securities settlement systems, in order to ensure the stability of the financial system in Luxembourg;
- Advisory services to legislative and regulatory authorities in financial and monetary areas.

THE VISION

The BCL intends to become a centre of competence, excellence even, whose performance will generate public confidence in the Central Bank.

Among Luxembourg institutions, the BCL ensures that it is capable of fulfilling all its national, European and international obligations.

In view of the wide variety of its duties and activities, both in the public sector and in a competitive environment, the BCL must generate an income guaranteeing its institutional, functional and financial independence.

CORPORATE VALUES

Consequently, the values associated with its action are:

- Professionalism, guaranteed by highly specialised employees, high-performance tools and a high-level infrastructure;
- Quality in all its services;
- Stability provided by its long term vision of all its activities;
- Objectivity resulting from the establishment of precise rules that are equally applied;
- Integrity, guaranteed by the transparency of its internal operations and with respect to professional ethics;
- A good governance, within and through the governing bodies concerned with the use of the highest standards in governance.



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2020 was marked by the most severe recession that Europe has endured since World War II. The consequences of the health crisis were dire, both from a human and economic perspective. Consequently, the euro area economy contracted by almost 7% in 2020 compared to the previous year. Faced with this crisis, ambitious mitigation measures were put in place at European level and by Member States. Without these measures, the impact of the crisis would have been much more severe. According to recent projections by Eurosystem staff, the euro area economy should recover strongly and grow by 4.6% in 2021, owing in particular to our economies gradually coming out of lockdown. Real GDP is expected to grow by 4.7% in 2022 and 2.1% in 2023.

The COVID-19 crisis, an exogenous shock that affected both supply and demand, strongly dampened rises in consumer prices. Thus, annual inflation in the euro area averaged 0.3% in 2020, with prices even falling slightly in the last five months of the year. Eurosystem staff expect inflation to reach 1.9% in 2021. This increase is essentially due to temporary factors. According to these same projections, inflation should fall to 1.5% in 2022 and 1.4% in 2023.

In line with its mandate to ensure price stability, defined as annual consumer price inflation below, but close to 2% over the medium term, the Governing Council of the ECB has taken a number of monetary policy measures aimed at bringing inflation closer to its objective.

Thus, on 12 March 2020, the Governing Council took the decision to temporarily expand the envelope of its asset purchase programme (APP¹) €120 billion to purchase additional assets by the end of the same year. Purchases under this programme are carried out at a monthly rate of €20 billion and the Governing Council plans to use the net asset purchases under the APP for as long as necessary and to end the programme shortly before it starts raising the key ECB interest rates. In addition, the Governing Council also intends to continue to fully reinvest the principal repayments of maturing securities acquired under the APP. These reinvestments will be made for an extended period beyond the date on which the Governing Council begins to raise key interest rates, and in any case for as long as necessary to maintain favourable liquidity conditions and an ample degree of monetary accommodation.

On 18 March, the Governing Council announced the establishment of a temporary envelope of €750 billion dedicated to the emergency purchasing programme in the face of the pandemic (Pandemic Emergency Purchase Programme, PEPP). This envelope was subsequently increased twice, by €600 billion in June and €500 billion in December, to reach a total envelope of €1,850 billion. This unconventional monetary policy measure, the overall envelope of which will not necessarily be exhausted, aims to counter the significant risks that the pandemic poses to the monetary policy transmission mechanism and the outlook for the euro area. The related purchases will be made at least until the end of March 2022 and for as long as necessary, until such time as the Governing Council judges the coronavirus crisis to be over. Also, principal payments coming due will be reinvested at least until the end of 2023. This programme has undoubtedly helped to alleviate a deeper economic crisis and to avoid negative amplification effects on the financial sector. In view of the importance of the Luxembourg financial centre, its impact has been particularly beneficial for Luxembourg.

On 30 April 2020, the Governing Council decided to establish a series of non-targeted Pandemic Emergency Longer-Term Refinancing Operations (PELTROs). These new operations, initially a series of seven operations, carried out from May 2020 and maturing between July 2021 and September 2021, aim to provide support for liquidity conditions in the euro area financial system and contribute to

¹ Asset Purchase Programme.

preserving the smooth functioning of money markets. On 10 December 2020, the Governing Council decided to offer four additional refinancing operations, to be allocated in 2021.

In addition, the Governing Council decided to launch longer-term refinancing operations (Longer-Term Refinancing Operations, LTRO) and has on two occasions eased the financing conditions for the third round of targeted longer-term refinancing operations (Targeted Longer-Term Refinancing Operations III, TLTRO III) in order to encourage banks in the euro area to grant loans to economic agents more particularly affected by the health crisis, in particular small and medium-sized enterprises. Under certain conditions, the interest rate applied by the Eurosystem to participating credit institutions may drop down to -1%.

The Governing Council also considered it necessary to take new measures concerning the guarantees accepted in the framework of monetary policy operations. Firstly, it agreed to broaden the range of eligible assets under the programme to purchase bonds issued by companies (Corporate Sector Purchase Programme, CSPP) non-financial commercial papers, by making all commercial paper of sufficient credit quality eligible for purchase under the CSPP. Subsequently, it took a set of temporary collateral relaxation measures aimed at facilitating the availability of eligible collateral for Eurosystem counterparties participating in liquidity-providing operations.

Finally, the ECB reactivated swap lines and improved existing swap lines with a number of central banks and introduced a new repo facility to provide liquidity in euros to central banks outside the euro area.

During the period under review, the Governing Council did not change the Eurosystem's key rates. Thus, the rate on the main refinancing operations stood at 0%, while the rates on the deposit facility and the marginal credit facility were -0.5% and 0.25% respectively.

At microprudential level, the Single Supervisory Mechanism has also taken steps to support credit flows to the real economy.

At Member State level, many initiatives have also helped to support economies, in particular through employment support measures, bank guarantees and moratoria. The same is true for many national macroprudential authorities, whose measures make it easier for banks to absorb any losses.

2020 was also marked by the decision of the Governing Council in January to launch an assessment of the Eurosystem's monetary policy strategy. While this strategy was adopted in 1998 and revised in 2003, the financial crisis and structural changes in the global economy have since pushed the Eurosystem's key interest rates down, forcing it to resort to unconventional monetary policy measures. In addition, major challenges such as climate change and digitisation, to name just two, have also

² Support to mitigate Unemployment Risks in an Emergency.

transformed the environment in which monetary policy is conducted. Against this backdrop, it was deemed necessary to carry out a review, performed in strict compliance with the ECB's mandate to maintain price stability. The scope of this exercise, which is expected to be finalised in July 2021, focuses on the quantitative definition of price stability, the various instruments of monetary policy, economic and monetary analysis and modes of communication. Other considerations relating to financial stability, sustainable development and employment will also be taken into account.

Two important aspects still deserve special mention. Firstly, a roadmap will be drawn up to integrate the evolution of the costs of owner-occupied housing in the European harmonised consumer price index. Secondly, an ambitious action plan will be drawn up integrating climate change considerations into the monetary policy strategy.

The Governing Council has decided to conduct this review in an inclusive manner, taking into account the views of civil society in each of the euro area Member States. As a result, each national central bank in the Eurosystem has launched a consultation exercise with a wide range of stakeholders. The Banque centrale du Luxembourg (BCL) has thus organised several consultations - internally, with civil society, as well as the academic and student community - in order to provide input on the subject. I would like to thank everyone who took part in these sessions.

In addition to these consultations, I had the opportunity to present to the Finance and Budget Committee of the Chamber of Deputies the purpose of this strategic review and the role played by the BCL in this context during an informal session.

During the period under review, the BCL also invested in three important areas: the continued greening of the investment of its own funds, the study of the possible introduction of a digital euro, which would be complementary to the euro banknotes and would also constitute a claim on the central banks of the Eurosystem, as well as the modernisation and further harmonisation of the payment infrastructure at European level.

Our greening strategy now also forms part of a common Eurosystem effort in this field. Indeed, in early February 2021, the latter agreed on a common position on sustainable and responsible investment principles related to climate change for non-policy related own portfolios denominated in euros. This common position encourages in particular the communication of information on risks linked to climate change. The Eurosystem aims to start publishing this information by early 2023.

With regard to the internal governance of the BCL, Mr Pierre Beck, Director of the BCL since 2009, retired on 1 June 2021, i.e. at the end of his second term of office as a member of the Management of the BCL. On behalf of the decision-making bodies and agents of the BCL, I would like to thank him for his invaluable contribution to the development of the BCL and wish him all the best for his well-deserved retirement. By virtue of a Grand-Ducal decree of 23 April 2021, the Council of Government has appointed Mr Nicolas Weber as his successor for a renewable term of six years.

To conclude, on behalf of the Management, I would like to thank all the BCL agents for their commitment and dedication during this health crisis. Their exemplary work has enabled the Bank to ensure the smooth continuity of its operations during these exceptional times.



Gaston Reinesch





1 THE BCL'S ACTIVITIES

1.1 MONETARY POLICY OPERATIONS

The Governing Council of the European Central Bank (ECB) defines monetary policy for the euro area as a whole. The primary objective of monetary policy is to ensure price stability. Monetary policy is implemented in a decentralised manner by the national central banks (NCBs) of the euro area and the BCL ensures the implementation in Luxembourg.

The instruments used to implement monetary policy include conventional measures (section 1.1.1) and non-conventional measures (section 1.1.2), which were initially introduced during the financial crisis of 2007-2008 and have since become predominant.

In response to the negative impact of the COVID-19 pandemic on the euro-area economy, the Eurosystem considerably eased its monetary policy stance in 2020 by launching a series of exceptional monetary policy measures, which were recalibrated several times during the year. These measures were aimed at easing the overall monetary policy stance and addressing the high risks that the pandemic poses to the monetary policy transmission mechanism and the economic outlook in the euro area.

In January 2020, the Governing Council decided to launch a review of the ECB's monetary policy strategy. Within the framework of the ECB's mandate, the strategy review focuses on, inter alia, the transmission, effectiveness and efficiency of monetary policy instruments, in particular those used since 2014. Even though the pandemic has delayed this review, it is expected to be completed in the second half of 2021.

1.1.1 Conventional operations

Conventional monetary policy operations, which have been used by the Eurosystem since its establishment, are operations related to the management of the liquidity needs of the banking system. They comprise three main instruments: open market operations, standing facilities and minimum reserves.

Due to the increase in excess liquidity in the banking system over time, the use of conventional operations has gradually declined, while non-conventional operations have been increasingly used to ensure the transmission of monetary policy.

Open market operations

Traditionally, open market operations have played an important role in steering interest rates, managing bank liquidity and indicating the monetary policy stance. They comprise both weekly one-week euro liquidity-providing operations (main refinancing operation, MRO) and monthly three-month euro liquidity-providing operations (longer-term refinancing operation, LTRO). In normal circumstances MROs are used to steer short-term interest rates, manage bank liquidity and signal the stance of monetary policy in the euro area, while LTROs provide additional longer-term refinancing to the banking sector. These open market operations, which are loans secured by collateral, are conducted in a decentralised manner through regular tenders at the BCL.

Standing facilities

The standing facilities allow credit institutions to manage their liquidity on an overnight basis. The Eurosystem offers two types of standing facilities to credit institutions: the marginal lending facility, which provides liquidity against the mobilisation of a sufficient number of assets eligible as collateral, and the deposit facility, which allows overnight deposits. Marginal lending and deposit operations are remunerated at interest rates set by the Governing Council.

Minimum reserves

Credit institutions established in the euro area are required to hold minimum reserves with their NCBs.

Minimum reserves are one of the monetary policy instruments of the Eurosystem. These reserves have traditionally fulfilled two functions. On the one hand, they contribute to the stabilisation of short-term money market interest rates with the amount of reserves deposited being considered as an average over the maintenance period¹. On the other hand, as long as interest rate management was based on the structural liquidity deficit, they aimed to create (or increase) a structural need for refinancing of the euro area banking system, facilitating the regulation of the money market by the Eurosystem.

1.1.1.1 Open market operations in 2020

In the context of a monetary policy dominated by non-conventional measures, conventional open market operations have lost their predominant role in steering interest rates.

Following the introduction of non-conventional monetary policy measures, banks' reliance on conventional liquidity-providing operations has decreased considerably over time and banks have shifted their participation to longer-term operations, such as the targeted LTROs (see section 1.1.2.2.).

In 2020, however, the Eurosystem continued to provide liquidity through standard refinancing operations (weekly MROs and three-month LTROs), which have been executed under a fixed rate full allotment procedure since October 2008.

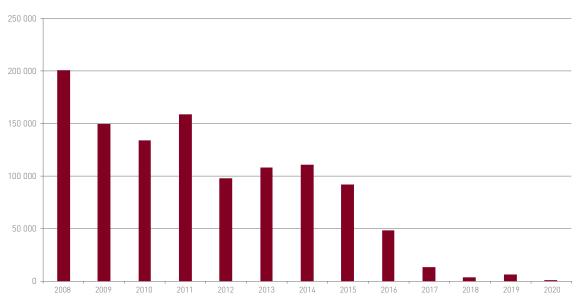
¹ The maintenance period denotes the period over which banks' compliance with the minimum reserve requirements is calculated.

In accordance with the Governing Council decision of 7 March 2019, the refinancing operations continue to be conducted as fixed rate full allotment operations. This allotment procedure should continue for as long as needed and at least until the end of the reserve maintenance period starting in March 2021.

In 2020, the MRO rate remained unchanged at 0%. This rate has been effective since 16 March 2016.

In 2020, the BCL provided a total of EUR 898 million in MROs (chart 1) and a total of EUR 6 million in LTROs, extending the decline of previous years in these operations. Domestic participation in the MRO accounted for 1.85% of total euro area (chart 2), while participation in LTRO stood at only 0.10%. At the Eurosystem level, the contribution of standard refinancing operations (MROs and LTROs) accounted for less than 2.50% of the total euro refinancing operations in 2020 (MROs, LTROs, TLTROs).

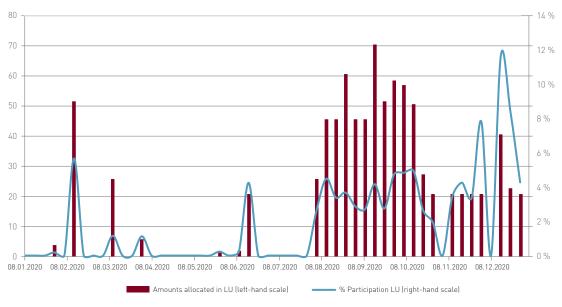
Chart 1: Average amounts allocated per main refinancing operation in the euro area (in million euros)



Source: BCL, ECB

Chart 2:

Main refinancing operations – amounts allocated in Luxembourg in 2020 and Luxembourg's share in the euro area (in million euros)



Source: BCL, ECB

1.1.1.2 Standing facilities in 2020

Luxembourg counterparties may use the standing deposit or marginal lending facilities of the BCL at rates set by the Governing Council.

In 2020, the rates of the deposit and marginal lending facilities remained unchanged at -0.50% and 0.25%. These rates have not changed since 16 March 2016 and 12 September 2019 respectively.

The deposit facility

Despite the negative interest rate, BCL counterparties continued to make considerable use of the deposit facility during 2020.

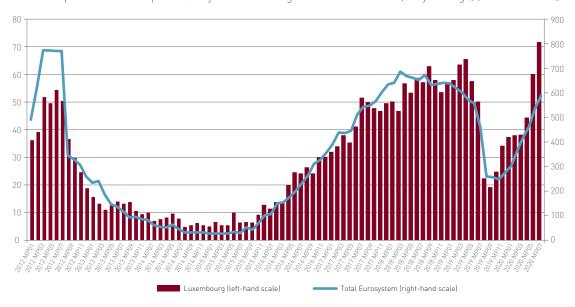
The marginal lending facility

The marginal lending facility was only used to a limited extent by Luxembourg counterparties in 2020.

The introduction on 30 October 2019 of a two-tier system for the remuneration of excess reserves (see section 1.1.1.3) had a significant impact on the deposit facility, whose use decreased, as shown in chart 3. Counterparties preferred to maintain their excess liquidity in the current account rather than placing it in the overnight deposit facility. However, the initial downward trend in liquidity placed in the deposit facility has reversed in 2020, reflecting the steady increase in excess liquidity in the banking system.

Chart 3:

Amounts deposited on the deposit facility in Luxembourg and in the euro area (daily average) (in billion euros)



Source: BCL, ECB

1.1.1.3 Reserve requirements in 2020

Since January 2012, the reserve requirement ratio has been set at 1% of banks' liabilities corresponding to deposits, debt securities and money market instruments with a maturity of up to two years, as defined in the framework for the collection of ECB money and banking statistics.

The minimum reserves are remunerated at the rate of the Eurosystem's main refinancing operations, weighted by the number of days in the reserve maintenance period.

Under the two-tier system introduced at the end of 2019, part of the excess reserves held by credit institutions with the Eurosystem is remunerated at an annual rate of 0%, while excess reserves not exempted by the two-tier system are remunerated at the lower rate of 0% or the deposit facility rate.

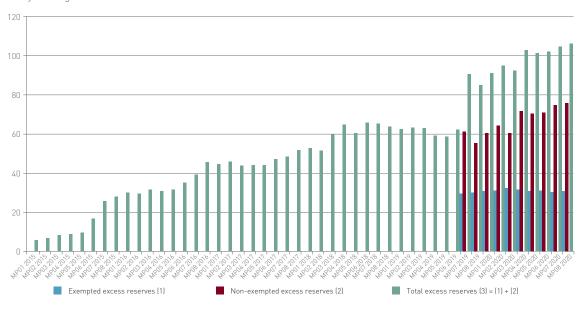
For each credit institution, the Governing Council has set the share of excess reserves not subject to negative remuneration (exempted quota) at six times the amount of its reserve requirement.

The multiplier and the rate of remuneration of the exempted excess reserves may vary over time.

Since 2015, the amount of excess reserves held by banks in Luxembourg has continued to increase mainly due to the asset purchase programmes (see section 1.1.2.3), but also, to a lesser extent, due to regulatory liquidity requirements.

In 2020, the average reserve requirement per maintenance period for all banks in Luxembourg amounted to EUR 5.3 billion while the average liquidity held on reserve accounts amounted to approximately EUR 103.9 billion.

Chart 4: Excess reserves of Luxembourg-based counterparties since the introduction of the two-tier system (daily average) (in billion euros)



Source: BCL

1.1.2 Non-conventional operations

Since the start of the financial crisis in 2007, the Eurosystem has gradually broadened its range of monetary policy tools through a series of non-conventional operations. The following sections provide more detail in that regard, notably on the provision of liquidity in foreign currencies, the successive extension of maturities of refinancing operations and the asset purchase programmes.

1.1.2.1 Liquidity provision in foreign currencies

Since 2007, the Eurosystem has established bilateral swap arrangements with a number of major central banks to provide foreign currency liquidity to euro area counterparties.

In response to the emergency induced by the COVID-19 pandemic, the Eurosystem extended its temporary swap lines in March and April 2020 to ensure the provision of liquidity in the main international currencies; in particular in US dollars.

Specifically, on 15 March 2020, the ECB announced, in a coordinated action with other central banks, that it would offer weekly 84-day US dollar liquidity-providing operations (in addition to the one-week operations) and subsequently lower the pricing of all its US dollar operations to 25 basis points above the Overnight Index Swap (OIS) rate.

Following this announcement, the ECB adjusted the frequency of these operations (daily, weekly or monthly) in line with the conditions prevailing on the US dollar market.

While the participation of Luxembourg-based counterparties in US dollar operations was rather limited in previous years, the tensions in the US dollar market in spring 2020 prompted several counterparties to take part in these operations. As a result, in 2020, the BCL allocated USD 4.04 billion to Luxembourg-based banks, which represents about 1.47% of the US dollar amounts allocated in the euro area as a whole via the swap agreement with the US Federal Reserve.

1.1.2.2 Extension of the maturities of operations

Since the financial crisis of 2007, the ECB has implemented non-conventional longer-term refinancing operations (LTROs) on several occasions. Among these operations, targeted operations (TLTROs) deserve special mention because of their volume and unique incentive mechanism, encouraging banks to provide loans to firms and households.

Longer-Term Refinancing Operations (LTROs)

The developments in financial markets since 2007 have led the Governing Council to introduce several types of non-conventional longer-term refinancing operations (LTROs) in line with the developments in the financial markets. The table below provides an overview of these operations.

Table 1:
Overview of non-standard longer-term refinancing operations (LTROs) since 2007

Туре	Number of operations conducted until end of 2020	Allocation of the first and the last operation	Total amount allocated in the euro area (in EUR billion)
Suppl. 3 month LTRO	24	August-07 - December-09	831
6 month LTRO	20	April-08 - August-11	416
1 month LTRO	70	September-08 - July-14	2599
1 year LTRO	4	June-09 - October-11	671
3 year LTRO	2	December-11 - February-12	1019
TLTRO	8	September-14 - June-16	432
TLTRO II	4	June-16 - March-17	740
TLTRO III	6	September-19 - ongoing	1749
" bridge TLTRO "	13	March 20 - June 20	389
PELTRO	7	May 20 - December 20	27

Source: BCL, ECB

Targeted Longer-Term Refinancing Operations (TLTROs)

In the context of the targeted longer-term refinancing operations (TLTROs), banks may borrow from the Eurosystem up to an individual borrowing allowance, which is proportional to the volume of their lending to the non-financial sector and households (excluding mortgages) at a reference date. The interest rate on these TLTRO loans will be determined only at the end of each operation and depends on the bank's performance in lending to the non-financial sector and households. Counterparties whose performance exceeds certain benchmarks are entitled to borrow at favourable rates, in accordance with the decisions of the Governing Council.

On 7 March 2019, the third round of targeted refinancing operations (TLTRO-III) was announced, initially comprising seven operations. Each operation is conducted on a quarterly basis, starting in September 2019, with a maturity of three years. An early repayment option is foreseen after two years.

In view of the COVID-19 pandemic and its economic and financial consequences, the Eurosystem adjusted the terms of the TLTRO-III operations several times during 2020. In March 2020, the Governing Council decided to apply more favourable conditions to all outstanding TLTRO-III operations during the period from June 2020 to June 2021 (the special interest rate period). During this period, the base interest rate was reduced to 25 basis points below the average interest rate on the Eurosystem's main refinancing operations. Counterparties reaching the most ambitious benchmark could be assigned an interest rate of 25 basis points below the average rate on the deposit facility. In addition, the borrowing allowance was increased from 30% to 50% of their outstanding eligible loans.

In view of the deteriorating economic outlook, the Governing Council decided in April 2020 to further ease the conditions attached to TLTRO-III by reducing, over the period from June 2020 to June 2021, the base

interest rate to 50 basis points below the average interest rate on the Eurosystem's main refinancing operations. For counterparties reaching the most ambitious benchmark, the interest rate applied over the period could even be as low as 50 basis points below the average rate of the deposit facility prevailing over the same period.

On 10 December 2020, the Governing Council announced three additional TLTRO-III operations to be allotted in June, September and December 2021, a one-year extension (until June 2022) of the period during which the more favourable interest rates apply (additional special interest rate period), and an increase in the borrowing allocation of counterparties (from 50% to 55% of their outstanding eligible loans as of 28 February 2019). This new borrowing allowance applies as of the March 2021 operation.

TLTRO-III operations accounted for the largest share of refinancing granted to Luxembourg banks in 2020, with a total of EUR 14.55 billion granted to 10 counterparties. This amount equals 0.88% of the total Eurosystem TLTRO-III allotments (EUR 1,650 billion) in 2020.

At the euro area level, the fourth TLTRO-III operation (TLTRO-III.4) in June 2020 attracted bids for EUR 1,308 billion, an amount never previously achieved. This operation was the first to offer a rate of 50 basis points lower than the average rate of the deposit facility for banks reaching the benchmarks.

The liquidity provided to euro area banks through TLTROs represented approximately 78% of the total liquidity provided by refinancing operations in 2020.

Table 2 below shows the allotted amount of all outstanding targeted operations as of 31 December 2020, as well as Luxembourg's share in these operations. The liquidity provided in Luxembourg under the TLTROs represented 0.86% of the total amount of TLTROs provided in the Eurosystem in 2020.

Table 2: Overview of TLTRO allotted amounts of outstanding operations (in billion euros)

	Start Date	Maturity Date	Luxembourg	Eurosystem	LU % share
*TLTRO II.4	Mar-17	Mar-21	1,53	233,47	0,65 %
Total TLTRO II			1,53	233,47	0,65 %
TLTR0 III.1	Sep-19	Sep-22	-	3,40	0,00 %
TLTRO III.2	Dec-19	Dec-22	0,43	97,72	0,44 %
TLTRO III.3	Mar-20	Mar-23	0,40	114,98	0,35 %
TLTRO III.4	Jun-20	Jun-23	6,11	1.308,43	0,47 %
TLTRO III.5	Sep-20	Sep-23	8,02	174,46	4,60 %
TLTRO III.6	Dec-20	Dec-23	0,02	50,41	0,04 %
Total TLTRO III			14,98	1.749,40	0,86 %
Total			16,50	1.982,88	0,83 %

Source: BCL, ECB

^{*} Note: for Luxembourg, approximatively EUR 1 billion has already been repaid; for the Eurosystem as a whole, approximatively EUR 218 billion have been repaid as of 31 December 2020.

1.1.2.3 Other Longer-term operations and PELTROS

Longer-term refinancing operations ('bridge LTROs')

On 12 March 2020, the Governing Council announced a series of 13 additional weekly longer-term refinancing operations ('bridge LTROs') maturing in June 2020. These operations were designed to provide immediate liquidity support to banks and to preserve the functioning of the money market. These operations were conducted at the average rate of the deposit facility, under a fixed rate full allotment procedure.

In total, the BCL's counterparties borrowed EUR 1.08 billion under these operations in 2020, representing 0.28% of the euro area total.

Pandemic emergency longer-term refinancing operations (PELTROs)

On 30 April 2020, the Governing Council decided on a new series of seven non-targeted PELTROs to further support liquidity conditions during the pandemic in the euro area financial system and to help preserve the smooth functioning of money markets. The operations were allotted at 25 basis points below the average rate of MRO operations over the life of each PELTRO, on a near-monthly basis. They mature in the third quarter of 2021.

These operations allowed longer-term refinancing of counterparties with a maturity of 16 months in the first operation and 8 months in the last one.

Despite their favourable terms, these operations attracted limited interest in 2020 from Luxembourg counterparties, with a total of EUR 115 million allocated, which corresponds to 0.43% of the total PELTRO liquidity provided by the Eurosystem.

On 10 December 2020, the Governing Council decided to conduct four additional PELTROs in 2021. Each operation will take place quarterly and has a duration of one year, with the same conditions as the previous PELTROs.

Table 3 provides an overview of the total liquidity provided by refinancing operations in 2020.

Table 3: Total liquidity provided through refinancing operations in the euro area and in Luxembourg in 2020 (in billion euros)

	Luxembourg	Eurosystem	LU % share		
Standard open market operations					
MROs	0.86	46.71	1.85 %		
LTROs	0.006	6.29	0.10 %		
Non-standard open market operations					
TLTROs	14.55	1 648.29	0.88 %		
'Bridge LTROs'	1.08	388.84	0.28 %		
PELTRO	0.12	26.58	0.43 %		
Total	16.61	2 116.71	0.78 %		

Source: BCL, ECB

1.1.2.4 Asset purchase programmes

In addition to refinancing operations, non-conventional monetary policy measures also include asset purchase programmes, comprising bonds issued by private and public entities.

In October 2014, against the background of a deteriorating medium-term inflation outlook for the euro area, the Governing Council introduced non-conventional monetary policy measures in the form of broad asset

purchase programmes to further ease monetary and financial conditions, to support the convergence of inflation towards the medium-term objective, while reducing risk premia.

To date, there are four extended asset purchase programmes (known as APP 2), covering both public and private sector securities:

- the third Covered Bond Purchase Programme (CBPP3), which began on 20 October 2014;
- the Asset-Backed Securities Purchase Programme (ABSPP) introduced on 21 November 2014;
- the Public Sector Securities Purchase Programme (PSPP), which was launched on 9 March 2015;
- the Corporate Sector Securities Purchase Programme (CSPP) conducted since 8 June 2016.

The APP has undergone several recalibrations since 2016, resulting in adjustments to the net monthly pace of purchases based on economic and monetary indicators.

On 13 December 2018, the Governing Council decided to discontinue net purchases under the APP as of 1 January 2019, while continuing to reinvest the principal repayments of maturing securities.

Thus, from January to October 2019, the Eurosystem reinvested nominal amounts of the matured securities held in APP portfolios with the aim of maintaining the level of cumulative net purchases reached as at 31 December 2018 in each programme.

On 12 September 2019, the Governing Council decided to resume net purchases at a monthly rate of EUR 20 billion starting on 1 November 2019. These purchases will continue for as long as needed to reinforce the accommodative effect of the ECB's key interest rates and should end shortly before these rates are increased. In addition, reinvestments of the principal repayments will be maintained for an extended period of time beyond the date on which the Governing Council begins to raise the ECB's key interest rates, and in any case for as long as necessary to maintain favourable liquidity conditions.

Ultimately, an envelope of EUR 120 billion was added to the APP until the end of 2020, following the Governing Council decision in March 2020, to preserve favourable financing conditions for the real economy during the period of heightened uncertainty caused by the pandemic.

In March and April 2020, to complement existing non-conventional measures, the Governing Council decided to launch a new temporary private and public sector securities purchase programme, known as the Pandemic Emergency Purchase Programme ('PEPP').

With respect to the PEPP, the Governing Council initially decided on a total purchase volume of EUR 750 billion.

The PEPP covers all categories of assets eligible under the APP. The design of the PEPP serves a dual purpose: first, to ensure an accommodative monetary policy stance, and second, to provide the flexibility needed to fulfil effectively the market stabilisation role.

The protracted effects of the pandemic on the euro area economy and downward revisions to inflation prompted the Governing Council to recalibrate the PEPP twice during 2020, in June and December.

The June 2020 recalibration included an increase in PEPP purchases by EUR 600 billion (for a total of EUR 1,350 billion), an extension of the horizon for net purchases to at least the end of June 2021, and an extension of the reinvestment of principal repayments on maturing securities until at least the end of 2022.

The second recalibration in December 2020 added a further increase of EUR 500 billion (to reach a total of EUR 1,850 billion), an extension of the horizon for net purchases to at least the end of March 2022, and an extension of the reinvestment of principal repayments of maturing securities to at least the end of 2023. The Governing Council also clarified that as long as favourable financing conditions could be maintained with

² Taken together, the purchase programmes are commonly referred to as the Asset Purchase Programme or APP. The Public Sector Securities Purchase Programme accounts for the largest portion of the APP.

asset purchase flows that do not exhaust the envelope over the net purchase horizon of the PEPP, the envelope would not need to be used in full. At the same time, the Governing Council did not rule out increasing this envelope if financing conditions within the euro area were to evolve unfavourably.

The Governing Council will terminate net asset purchases under the PEPP when it considers the COVID-19 crisis phase to be over, but not before the end of March 2022.

In implementing its asset purchases, the Eurosystem continues to adhere to the principle of market neutrality by adopting a flexible and consistent implementation. Securities purchased as part of the monetary policy portfolios are also made available for securities lending to support market liquidity and the availability of collateral. Only marketable assets accepted as collateral by the Eurosystem are potentially eligible for asset purchases. In addition, specific eligibility criteria apply for each purchase programme.

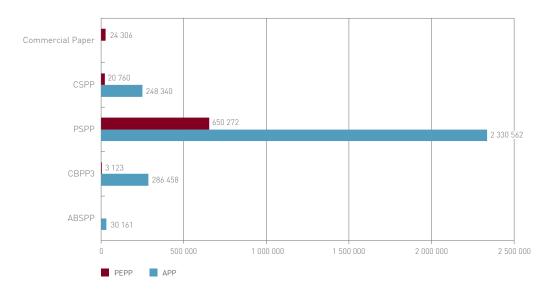
All categories of assets that are eligible under the APP are eligible under the PEPP, with the latter including a derogation from the eligibility requirements for securities issued by the Greek government. In addition, in March 2020, the eligibility of non-financial commercial paper under the CSPP was expanded to include securities with a residual maturity of at least 28 days.

In all purchase programmes, limits are in place to take into account operational, legal and risk management considerations. The limits on public sector assets aim to preserve the functioning of the market, ensure proportionality, reduce risk concentration and prevent the Eurosystem from becoming the dominant creditor of euro area governments. In the context of the PEPP, due to its emergency and temporary nature, some of the limitations that could hamper the fulfilment of the Eurosystem's mandate can be applied in a more flexible manner. For private sector purchase programmes, the Eurosystem conducts ongoing credit risk reassessments.

In line with the decentralised approach to monetary policy implementation, all national central banks participate in the coordinated execution of securities purchases. Reinvestments of principal repayments continue to be spread over time to allow a regular and balanced presence in the market.

Chart 5 shows the Eurosystem's holdings under the APP and the PEPP in millions of euro at amortised cost at the end of November 2020. The size of the PEPP in terms of amortised cost represented about 24 % of the APP at this reference date.

Chart 5: Eurosystem APP and PEPP holdings (as at 30 November 2020) (in million euros at amortised cost)



Source: BCL, ECB

1.1.3 Collateralisation of Eurosystem credit operations

In accordance with Article 18 of the Statute of the European System of Central Banks (ESCB) and the ECB, all Eurosystem credit operations are conducted on the basis of 'adequate collateral'. As such, each counterparty provides assets as collateral for its credit operations with a Eurosystem national central bank. These assets must comply with the eligibility criteria specified in the Eurosystem's General Documentation on Eurosystem monetary policy instruments and procedures.

The Eurosystem accepts marketable and non-marketable assets, including credit claims, as collateral. The list of eligible marketable assets is published on the ECB's website.

Eurosystem counterparties use different channels and procedures for the mobilisation of eligible assets. The mobilisation of marketable assets requires the involvement of one or more securities settlement systems. Non-marketable assets are mobilised according to procedures established by each national central bank (domestic mobilisation), or with the intermediation of a correspondent central bank (cross-border mobilisation).

In April 2020, the Governing Council adopted a set of easing measures for eligible collateral in order to increase banks' borrowing capacity from the Eurosystem, which was intended to enable them to increase their lending volume and thus improve financing conditions for the real economy during the COVID-19 pandemic.

The first collateral easing measures were announced on 7 April 2020 and aimed at ensuring the availability of sufficient eligible collateral to allow Eurosystem counterparties to access liquidity-providing operations such as TLTROs. They included a temporary increase in the Eurosystem's credit risk tolerance, a relaxation of the conditions for the use of credit claims as collateral and a general reduction in the valuation haircuts applied to collateral.

These measures were reinforced on 22 April 2020 to mitigate the effect of possible rating downgrades on the availability of collateral. Specifically, the Governing Council decided that marketable assets and issuers that met the minimum credit quality requirements on 7 April 2020 would continue to be eligible in the event of a rating downgrade, as long as the ratings remain above a certain minimum credit quality level.

1.2 FOREIGN EXCHANGE RESERVE MANAGEMENT BY BCL

The ECB's foreign exchange reserves have been managed in a decentralised manner by the national central banks of the Eurosystem since January 1999. In accordance with the statutes of the Eurosystem and in line with its share in the ECB's capital key, the Banque centrale du Luxembourg (BCL) initially transferred € 74.6 million in foreign exchange assets to the ECB.

For every NCB, the capital allocation key is adjusted every five years in line with its gross domestic product (GDP) and population. After the last regular adjustment in 2019, the capital key for the BCL was set at 0.227%.

As of 31 December 2020, the ECB's foreign reserves managed by the BCL corresponded to a market value of € 401.9 million. One of the objectives of the management of the foreign exchange reserves is to ensure that the Eurosystem has a sufficient amount of liquidity at all times for possible intervention in foreign exchange markets. Security and liquidity are therefore essential requirements for the management of these reserves.

In the same context, the amount of gold holdings that are passively managed is set by the Governing Council, which takes into account strategic considerations as well as market conditions.

1.3 MANAGEMENT OF THE BCL'S ASSETS

1.3.1 Conceptual framework

1.3.1.1 Investment policy objectives

The main objectives of the investment policy are to generate a stable income and to ensure, over the long term, a return that takes into account capital preservation and liquidity considerations. The BCL applies an investment policy which prioritizes the following objectives:

- Security and stability of financial assets;
- Coverage of the operational expenses;
- Generation of profit.

This investment management policy follows the principle of risk diversification and is based on modern portfolio management theory.

The investment approach incorporates:

- an analysis of economic conditions and international financial markets;
- an asset allocation process that involves assessing the returns on different international markets;
- the development of a clearly defined strategy;
- the preservation of the capital value of the assets by following a risk-diversification process and by requiring investments to be of a specific quality;
- the application of strict risk control measures.

Investment decisions are based on both fundamental and technical analysis which take the following into account:

- market risk (interest rates, foreign exchange rates, equity prices, commodity prices);
- credit risk (minimum credit ratings criteria by international rating agencies);
- liquidity risk (concentration limits per sector, issuer and issue, with efforts to ensure geographic diversification in the day-to-day management).

1.3.1.2 Sustainable investment policy objectives

Within the limits of its mandate, the BCL supports initiatives to combat climate change. In this context, the management of the BCL's own funds is carried out according to investment criteria that comply with environmental, social and governance (ESG) principles. The share of socially responsible and sustainable investments in the portfolios increased significantly in 2020.

Since 2018, the BCL has been a member of the Network of Central Banks and Supervisors for the Greening of the Financial System (NGFS), which contributes in particular to the development of environmental and climate risk management within the financial sector.

All of the BCL's investments are regularly monitored using ESG data made available by specialist service providers. This data is used to exclude issuers with controversial activities, to verify the level of compliance with ESG criteria and to measure the carbon footprint of investments. In the event of non-compliance with ESG criteria, issuers are in principle excluded from BCL investments.

During 2020, the share of sustainable and socially responsible investments increased significantly. The BCL's US dollar reserves are now almost entirely invested in green bonds or other socially responsible investments. For operational reasons, a minor part of these reserves are invested in cash / US Federal government debt securities (Treasury bonds).

The BCL pension fund investments have also been shifted towards sustainable assets in 2020. More than 80% of the pension fund's equity investments are now invested in stock market indices that comply with ESG or sustainable development standards. The pension fund's green bond investments represented 28% of all bond investments at the end of 2020, a share that is steadily increasing. This investment in sustainable bonds corresponds to approximately 9% of the total portfolio due to the significant holding in cash.

There are also plans to increase the share of socially responsible investments in the main euro investment portfolio, once market conditions offer better investment opportunities to increase the size of the portfolio.

1.3.1.3 Performance measurement

The quality of investment decisions is measured by comparing the performance to external benchmarks. This allows performance to be attributed to decisions made at strategic and tactical levels as well as to day-to-day management.

1.3.2 Institutional structure

Asset management is based on a five-level intervention structure, in addition to risk control:

Level 1: The Council

The BCL Council approves the guidelines of the asset management framework. It has authorized the BCL to provide asset management services to third parties and to set up its own portfolios in order to ensure the diversification of its income. These guidelines also include the risk control framework applied to asset management.

Level 2: The Executive Board

The Executive Board defines and quantifies the risk management framework. It determines the maximum level of risk that can be taken in the management of the assets of the BCL and specifies the corresponding risk management measures such as the Value at Risk (VaR) method and stress testing scenario analysis. The Executive Board also sets warning thresholds that trigger the convening of emergency meetings to assess the situation. Additionally, the Board determines the annual budget.

Level 3: The Asset and Liability Management Committee ALCO

The Asset and Liability Management Committee (ALCO) determines the strategic benchmark in accordance with the framework specified annually by the Executive Board. This is achieved by examining the potential impact of each investment risk (market, credit and liquidity risk) which would arise from the proposed investment policies, on both the balance sheet and the profit and loss account of the BCL. During the year, the ALCO regularly reviews the results of the investment policy.

Level 4: The tactical committees

The tactical committees (which cover the BCL's own funds, foreign exchange reserves and the BCL's pension fund) develop proposals for tactical benchmarks that comply with the permitted deviation relative to the strategic benchmark and also monitor the evolution of the portfolios on a short-term basis.

Level 5: The Portfolio Management Team

The Portfolio Managers execute transactions within the authorised investment limits.

1.3.3 Risk control

The Risk Management unit monitors the positions of all the portfolios and verifies that they comply with predefined investment limits. This monitoring is carried out on a daily basis and independently of the BCL Front Office. The analysis incorporates portfolio risk management measurements such as Value at Risk (VaR) and stress testing scenarios.

1.3.4 Structure and composition of the portfolios

The majority of the BCL's own funds are invested in fixed income securities denominated in euros. The strategic orientation enables diversification into other asset categories.

The BCL manages different types of portfolios, namely:

Investment portfolio

In 2020, the size of the portfolio was further reduced due to the lack of investment opportunities offering a sufficient return to compensate for the risks involved.

During 2020, the percentage of fixed-rate securities with maturities of more than three years decreased from 24% to 20% of the portfolio, while the percentage of bonds with maturities of between one and three years increased from 42% to 46%. At the end of 2020, the percentage of bonds with a maturity of less than one year represented 34% of the portfolio.

The securities included in this portfolio are broadly diversified, both geographically and in terms of industry sectors and issuers

Liquidity portfolio:

The liquidity portfolio represents other assets held, consisting mainly of counterparties to TARGET2 accounts and other liabilities based on an agreement within the Eurosystem. This portfolio also aims to increase the revenue of the bank. The instruments used are mainly short-term fixed-coupon bonds, floating-rate bonds and commercial paper, provided that these instruments comply with strict and predefined investment criteria. Due to negative short-term interest rates, this portfolio remains inactive for the time being.

Table 4: Breakdown of assets as of December 31, 2020

	Investment Portfolio	Liquidity Portfolio
<1 year	34 %	0 %
1-3 years	46 %	0 %
> 3 years	20 %	0 %

Source: Wall Street System

Own reserve foreign exchange portfolios:

The main objective of the portfolio of own reserves in foreign currencies is to have an intervention portfolio in place, in addition to the common foreign exchange reserves transferred to the ECB. The principal objective of this portfolio is to maintain security and liquidity. As of 31 December 2020, the total market value of this foreign currency portfolio was \leqslant 176.6 million.

In addition to the USD portfolio, the BCL launched a multicurrency portfolio consisting of G10 currencies. The market value of this portfolio was \leqslant 30 million as of 31 December 2020.

Pension fund portfolio:

The management of this fund is presented in section 2.2.3 of the Annual Report.

ECB reserve portfolio:

The management of this portfolio is described in section 1.2 of the Annual Report.

Third-party portfolios and reserve management services:

The BCL provides non-standardised discretionary management services to institutional clients (central banks and international organisations). Furthermore, within the Eurosystem, the BCL, together with seven other national central banks and the ECB, provides reserve management services to institutional clients (central banks and international organisations) within a standardised framework defined by the ECB.

1.4 BANKNOTES AND COINS

The Banque centrale du Luxembourg (BCL), in cooperation with the European Central Bank (ECB) and the other national central banks (NCBs) of the Eurosystem, is responsible for putting euro banknotes and coins into circulation. It contributes to maintaining public confidence in the single currency by managing the circulation of banknotes and coins and combating counterfeiting. Through its activities in the field of Luxembourg's numismatics, it contributes to the further enhancing of the reputation of the Grand Duchy of Luxembourg.

1.4.1 Production of banknotes and coins

Within the Eurosystem, the production of euro banknotes is allocated according to a decentralised pooling scheme adopted in 2002. Each NCB is responsible for providing part of the total requirements for specific denominations.

Euro banknotes are produced on the basis of requirements expressed by the NCBs and aggregated by the ECB.

In this context, the BCL was responsible in 2020 for the production of 21.76 million 20 euro banknotes of the "Europa" series for the needs of the Eurosystem (compared to 14.82 million 20 euro banknotes of the "Europa" series in 2019). The BCL had these banknotes produced following a tender procedure organised with other central banks (see section 1.4.4 National and international cooperation). The entire volume of banknotes to be produced by this group of central banks was printed on banknote paper made from 100% sustainably grown cotton.

Under the terms of an agreement concluded with the Luxembourg State, the BCL also ensures the production of the Luxembourg's euro coins that it placed into circulation. Following a call for tenders, the BCL produced 1.5 million 2020 10-cent coins and 2 million 5-cent coins, to meet all the stakeholders' needs. In order to contribute, at European level, to the reduction of unused inventories of coins, the BCL bought from De Nederlandsche Bank a surplus stock of 2.5 million 20-cent coins, 4 million 2-cent coins and 4 million 1-cent coins.

1.4.2 Circulation of banknotes and coins

1.4.2.1 Euro banknotes and coins

1.4.2.1.1 Banknotes

During the year under review, the BCL posted a negative net issuance of 4.3 million banknotes. More precisely, the number of 10, 20 and 50 euro banknotes deposited by financial organisations exceeded that of banknotes withdrawn. While this phenomenon has been explained for many years by the fact that the denominations of 10 and 20 euros are brought into the country by tourists and, particularly, cross-border workers, the issuance of banknotes in 2020 was also marked by the COVID-19 pandemic and the resulting reduction in economic activities.

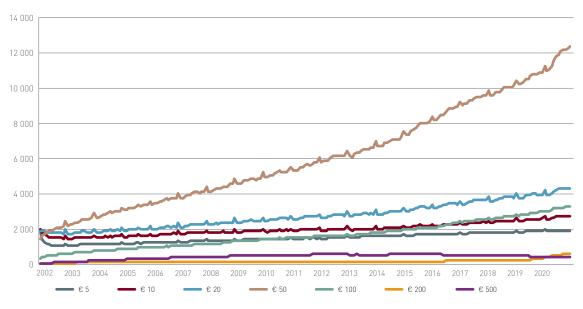
For the euro area as a whole, as in 2019, the circulation of the 500-euro banknote continued to decline in 2020 (-9%). This decrease follows the decision taken in May 2016 by the Governing Council to end the production and issuance of this denomination.

The year 2020 was marked by a greater demand for banknotes of 200 euros (+ 58.2%), 100 euros (+ 10.3%) and 50 euros (+ 13.5%) compared to 2019. In terms of volume, denomination of 50 euros represent the majority of banknotes in circulation.

As of 31 December 2020, banknotes put into circulation by the Eurosystem numbered 26.47 billion, an increase of 10.02% compared to the previous year.

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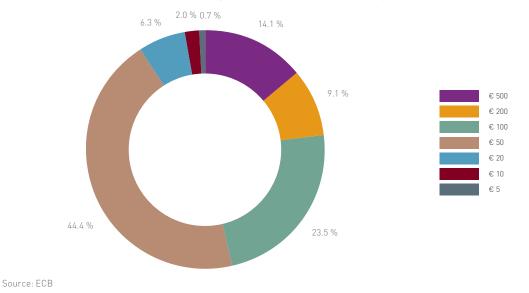
Chart 6: Evolution of the number of euro banknotes put into circulation by the Eurosystem since 2002 (in millions of banknotes)



Source: ECB

In value terms, net issuance of banknote in Luxembourg increased by \leqslant 0.36 billion, an increase of 0.4% compared to the previous year. At European level, the net issuance increased by \leqslant 141.8 billion, an increase of 11%. In the euro area, the total amount in circulation was \leqslant 1,434.5 billion at the end of 2020. The breakdown by denomination is shown in the graph below.

Chart 7: Breakdown of the value of euro banknotes put into circulation by the Eurosystem as at 31 December 2020



1.4.2.1.2 Coins

The volume of coins put into circulation in Luxembourg during the year 2020 increased by 18.66 million units, thus showing a growth of 2.1% compared to the previous year. For the euro area, the total number of euro coins in circulation increased by 2.2%, reaching 138.1 billion coins.

As for the value of euro coins in circulation in the euro area, it stood at 30.41 billion euros by the end of December 2020, thus showing an increase of 1.4% compared to the previous year. The value of coins put into circulation in Luxembourg increased by 1.8%.

Chart 8: Evolution of the number of euro coins put into circulation in the euro area since 2002 (in millions of coins)

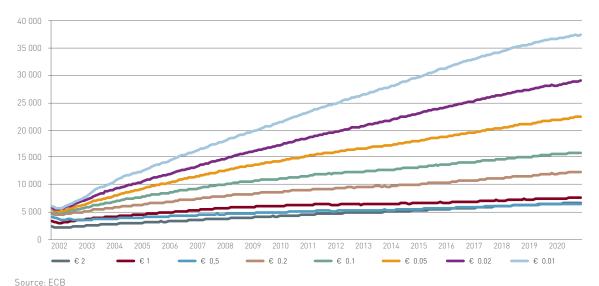
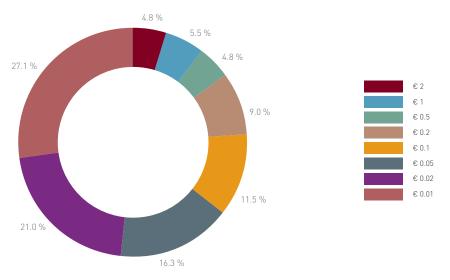


Chart 9: Breakdown by denomination of the number of coins in circulation in the euro area as at 31 December 2020



Source: ECB

1.4.2.2 Luxembourg franc banknotes

During the year under review, the overall value of Luxembourg franc banknotes issued by the Institut Monétaire Luxembourgeois and not yet presented for exchange, fell from LUF 200.2 million to LUF 199.9 million, i.e. a 0.12% decrease. Expressed in euros, this is equivalent to €4.96 million.

Table 5: Luxembourg franc (LUF) banknotes still in circulation at 31 December 2020

LUF	Number	Value in LUF	Value in euros
5 000	10 825	54 125 000	1 341 723.70
1 000	67 011	67 011 000	1 661 159.30
100	788 042	78 804 200	1 953 505.09
total	865 878	199 940 200	4 956 388.09

[1 EUR = 40.3399 LUF]

Source: BCL

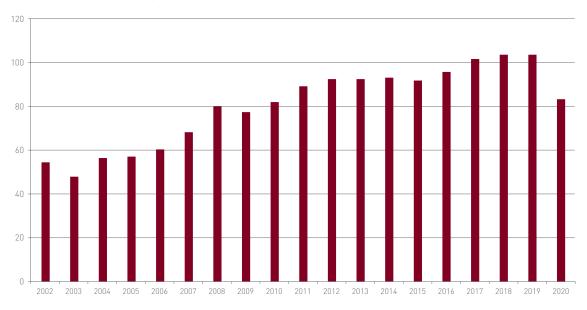
As of end-2004, Luxembourg franc coins are neither reimbursed nor exchanged.

1.4.3 Sorting of euro banknotes and coins

The volume of euro banknotes returned by financial institutions to the BCL fell sharply (-20.1%) in 2020 compared to the previous year, going from 103.2 million to 82.5 million banknotes. The COVID-19 pandemic and the reduction in economic activities have resulted in a decrease in the use of banknotes as a means of payment and, as a result, a decrease in the volume of banknotes returned to the BCL and in its banknote sorting activity.

The graph below describes the evolution of banknote returns at the BCL since 2002.

Chart 10: Returns of euro banknotes by financial institutions at the BCL (in millions of banknotes)



Source: BCL

The returned banknotes are processed using sorting machines, which check the authenticity and cleanliness of the banknotes. All denominations combined, 6.3 million banknotes were destroyed in 2020 because they were unfit for circulation, against 10.5 million in 2019, i.e. an average destruction rate of 6.3%, against 10.5% last year.

This rate varies significantly depending on denominations processed; while small denominations circulate more and thus wear out more quickly, the higher denominations must be replaced less often. In addition, all euro banknotes of the first series returned to the BCL are destroyed and replaced by notes of the "Europa" series.

1.4.4 National and international cooperation

In the fight against counterfeiting of euro banknotes and coins, the BCL closely cooperates with the ECB and the competent national authorities. For the analysis of counterfeits and mutilated euro banknotes and coins, the BCL has been cooperating with the Banque de France and the Deutsche Bundesbank since 2002.

The BCL also cooperates with ten Eurosystem central banks (Belgium, Estonia, Ireland, Cyprus, Latvia, Malta, the Netherlands, Austria, Portugal and Finland) in the management and maintenance of the CashSSP IT application. This application not only enables the management of banknote and coin stocks and the monitoring of the sorting activity of currency, but also the receipt of the return and withdrawal announcements of local commercial banks in a secure manner.

For several years, the BCL has been pooling its share of banknote production with seven Eurosystem central banks (Estonia, Cyprus, Malta, the Netherlands, Slovenia, Slovakia and Finland). In 2020, the Central Bank of Ireland joined this cooperation with its quota of banknotes to be produced, becoming the ninth member of this group. The objective of this pooling is to share the resources and experience needed to monitor banknote production.

1.4.5 Issuance of the new "Europa" series

The series of "Europe" banknotes, as the first series based on the theme of "European eras and architectural styles" and gradually put into circulation between May 2013 and May 2019, is now complete. The series incorporates new or improved security features to provide advanced protection against counterfeiting and allow the public to quickly distinguish a genuine banknote from a counterfeit.

The 500 euro note, whose issuance was stopped on 26 January 2019, retains its status as legal tender and can continue to be used as a means of payment and a store of value.

Euro banknotes of the first series retain their value and can be exchanged at the NCBs of the Eurosystem for an unlimited period. The date of the loss of legal tender status of the first series of banknotes will be communicated well in advance.

1.4.6 Numismatic issues

The BCL issues numismatic products on the theme of the Grand Duchy's history and culture. Through its numismatic premises, approximately 670 sales transactions were completed in 2020, despite the closing of the numismatic premises due to the coronavirus. More than 1 700 parcels were sent out, corresponding to sales made through traditional mail or via the Internet shop of the BCL (https://eshop.bcl.lu). Through its collector coins and numismatic products, the BCL strives to promote the richness of the national heritage across the globe.

In 2020, the BCL issued the following numismatic products:

- a € 2 commemorative coin dedicated to the 200th anniversary of the Prince Henri of Orange-Nassau;
- the 2020 BU set comprises Luxembourg's euro coins of the 2020 series (including the first € 2 commemorative coin);
- a second € 2 commemorative coin dedicated to the birth of Prince Charles;
- the 2020 Proof set is composed of ten coins;
- two gold coins and a silver coin dedicated to the birth of Prince Charles;
- a silver-nordic gold coin dedicated to the common bistort; it constitutes the twelfth part of the series devoted to the fauna and flora of Luxembourg;
- a nordic gold-silver coin dedicated to the Luxembourg Pavilion of the Universal Exhibition of Dubai; it constitutes the fifth part of the series devoted to the outstanding constructions in Luxembourg.

1.5 STATISTICS

The Banque centrale du Luxembourg (BCL) develops, collects, compiles and disseminates a wide range of statistics that enables it to fulfil its legal tasks within the European System of Central Banks (ESCB), the European Systemic Risk Board (ESRB) and at national level. This information is also used by other national institutions such as the National Institute of Statistics and Economic Studies (STATEC) and the Financial Sector Supervisory Commission (CSSF) as part of their respective missions.

Since 2012, the BCL has been collecting statistics on payment instruments and transactions. Some of this data is transmitted in aggregated form to the ECB. In particular, the data collected provides information on the use of the various payment instruments in force in Luxembourg and on the use of the various payment channels. Payments made in electronic money are also covered by the collection.

Within the framework of the cooperation agreement between the BCL and STATEC, the production of quarterly financial accounts statistics (with the exception of public sector data) has been carried out by the BCL since March 2013.

Within the framework of a tripartite cooperation agreement with the ECB and the European Stability Mechanism (ESM), the BCL undertook to compile macroeconomic aggregates on the basis of accounting data transmitted by the ESM. These statistical data are necessary for the ECB to compile euro area aggregates, as the ESM is considered a resident euro area financial corporation.

Within the framework of a tripartite cooperation agreement with the ECB and the European Investment Bank (EIB), the BCL collects statistical reports from the EIB. The data collected, which is in line with the statistical data collected from banks, is necessary for the ECB to compile macroeconomic aggregates.

In 2014, the People's Bank of China (PBOC) and the BCL signed a Memorandum of Understanding aimed at establishing a cooperation between the two institutions in terms of monitoring, information exchange and evaluation regarding the renminbi market. As part of this agreement, the BCL monitors developments in this market and regularly provides the PBOC with related information.

In 2019, the Commissariat aux assurances (CAA) and the BCL signed a cooperation agreement on the collection of information from pension funds in Luxembourg. The objective of this agreement, which regulates the modalities of information exchange in relation to pension funds between the two signatories, is to avoid double reporting in Luxembourg and, thus, to limit the administrative burden for pension funds.

Finally, on the basis of the cooperation agreement in the field of public finance statistics, STATEC and BCL work together to improve information flows between the two institutions.

Other statistical developments

The BCL publishes a large number of financial sector statistics on its website and provides STATEC with some of the data required under the International Monetary Fund's (IMF) Special Data Dissemination Standard (SDDS).

With regard to the AnaCredit reporting, the BCL organised two conferences during the course of 2020. The first conference took place in February 2020 at the BCL's premises and was attended by Luxembourg reporting agents and IT solution providers. The second conference, held in December 2020, was organised via videoconference with the Luxembourg reporting agents. The objective of these conferences was to review the current state of play of the AnaCredit reporting and to explain the new validation rules applied to the data (in particular the comparisons between AnaCredit data and data from S 1.1 and S 2.5 reporting). In parallel, the BCL has also introduced newsletters, dedicated to the AnaCredit reporting, that are published on the BCL's website on a quarterly basis. They include a news section and a section with frequently asked questions.

1.6 PAYMENTS AND SECURITY SETTLEMENT SYSTEMS

1.6.1 Vision 2020

During 2020, the Eurosystem continued working on the Vision 2020 programme. The three projects in the programme have significant impacts on all the Eurosystem counterparties and other market participants.

The first project, TIPS³, is a pan-European real-time gross settlement service in central bank money for instantaneous transfers, available 365 days a year, 24 hours a day. The service has been operational since November 2018.

In coordination with market participants, the launch date of the other projects has been extended by one year. The decision reflects the impact of the COVID-19 pandemic and the postponement of the SWIFT's ISO 20022 migration for cross-border payments.

TARGET Consolidation, the second part of this programme, will lead to the replacement of the TARGET2 platform in November 2022 by a new large-value payment module (RTGS⁴) with a new centralised CLM⁵ liquidity management tool. This tool will replace the BCL internal systems, as it will operate the current accounts and reserve accounts opened by the financial institutions with BCL. The new TARGET will thus become the essential and central tool for the implementation of the monetary policy.

The third project, ECMS⁶, will consist of a centralised system for managing the collateral provided by counterparties in order to collateralise their credit operations with the Eurosystem. Its deployment is scheduled for November 2023.

In order to facilitate communication with these new systems, the Eurosystem will set up a single portal, ESMIG⁷, based on the ISO 20022 standard, which will serve as a single entry point for all these services from 2021.

Being member of the Eurosystem, the Banque centrale du Luxembourg (BCL) is taking part in these three projects and will promote the use of these infrastructures in Luxembourg. BCL will support market players in their migration projects to the new infrastructures. To this end, in 2020, the BCL held an information session for Luxembourg banks on the migration to the future systems.

³ TIPS: TARGET Instant Payment Settlement.

⁴ RTGS: Real-Time Gross Settlement.

⁵ CLM: Central Liquidity Management.

⁶ ECMS: Eurosystem Collateral Management System.

⁷ ESMIG: Eurosystem Single Market Infrastructure Gateway.

1.6.2 TARGET2-LU

Since 19 November 2007, the real-time gross settlement system (RTGS) TARGET2 runs on the Single Shared Platform (SSP) operated in common by 25 central banks of the ESCB. Twenty of these central banks are from the Eurosystem.⁸

At the end of 2020, the Luxembourgish component TARGET2-LU counted 50 direct participants (two more than in 2019), 24 indirect participants (one less than in 2019) and two ancillary systems (unvaried to 2019).

Domestic payments

In 2020, participants in TARGET2-LU exchanged a monthly average of 20 751 payments (against 19 967 in 2019) for a value of \bigcirc 125.3 billion as compared to \bigcirc 135.8 billion in 2019. Of these payments, 13 027 or 63% were retail payments. Their value represented a monthly average of \bigcirc 7.1 billion or 5.6 % of the domestic value exchanged.

In TARGET2-LU, volumes stabilised in 2018 (-1.0%), 2019 (-1.3%) and 2020 (+3.9%).

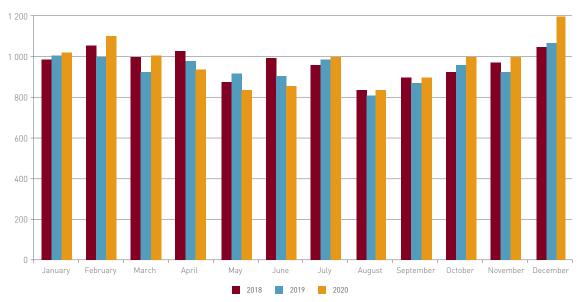
In parallel, the domestic value exchanged relived a readjustment by -7.7% in 2020 after a strong increase by 58 % in 2019. This diminution is due to an important decrease in interbank payments (-7.4 %) whereas retail payments increased by a mere 6.6 % in the meantime, which has barely no impact on the global reduction.

The average value of a domestic retail payment was $\le 542\,882$ whereas the average value of a domestic interbank payment was $\le 15\,570\,468$ in 2020.

The following two charts 11 and 12 illustrate the developments in average daily volumes and values in domestic payments.

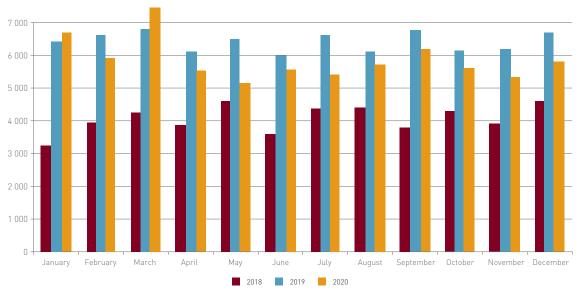
⁸ The 25 central banks include: the ECB and the 19 NCBs plus five central banks of EU countries which have not (yet) adopted the euro (Bulgaria, Croatia, Denmark, Poland and Romania).

Chart 11: Domestic payments: average daily volumes



Source: CRAKS1 / TARGET2

Chart 12: Domestic payments: average daily values (in euro millions)



Source: CRAKS1 / TARGET2

Cross border payments

In 2020, participants in TARGET2-LU sent a monthly average of 133 079 payments to other countries of the EU, an increase of 6.8%. The monthly average value of these payments increased by 7.1% to \bigcirc 1 162 billion.

The volume of retail payments decreased by 1.37% to reach 48 606 payments, representing 36.5% of total cross border volume. The relative part of retail payments has declined since 2016. In 2020, it fell by 3.04 percentage points. The volume of interbank payments increased by 12.2%, thus reaching a monthly average of 84 474 transactions in 2020.

In value terms, the average monthly retail payments decreased by 0.9% to an average of \leqslant 46.82 billion, representing 4% of the total value exchanged. The value of monthly interbank cross border payments increased by 7.5% to \leqslant 1 115.2 billion.

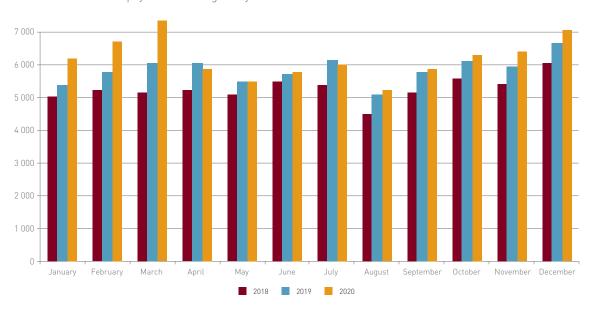
Globally, outward cross border payments $^{\circ}$ increased by 6.8% in volume terms in 2020 and in value they also increased by 7.1% over one year. The average value per transaction sent was \in 8.73 million (against \in 8.71 million in 2019).

The average value of a cross-border interbank payment was \in 13.20 million whereas the average value of a retail cross-border payment was \in 963 229 in 2020.

In 2020, participants in TARGET2-LU received 132 554 payments on average per month from abroad 10 which is an increase of 14.6% compared to 2019. Participants issued 153 856 payments on average per month in 2020 which is an increase of 6.1% compared to 2019. The average value of incoming payments was \mathfrak{C} 1 267.1 billion or 1.7% lower than the value sent.

Charts 13 and 14 display the development of average daily volumes and values in cross border payments sent by Luxembourgish participants.

Chart 13:
Outward cross border payments: average daily volumes

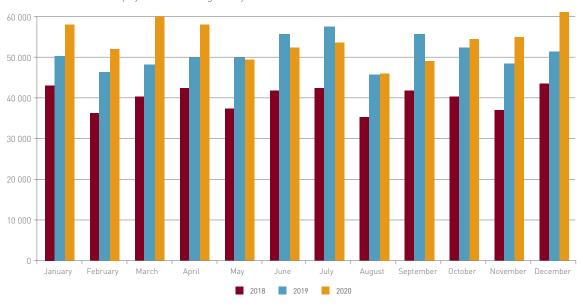


Source: CRAKS1 / TARGET2

⁹ From the Banque centrale du Luxembourg to the other 24 participating central banks.

^{10 &}quot;Abroad" refers to the other 24 participating central banks.

Chart 14: Outward cross border payments: average daily values (in € millions)



Source: CRAKS1 / TARGET2

Aggregated figures of domestic and cross border payments

The total number of outward payments issued by participants in TARGET2-LU in 2020 amounted to 1 845 963, meaning a yearly increase by 6.4%. Of these payments, 739 600 or 40.1% were retail payments.

Table 6 provides an overview of average daily volumes of payments over one year since 2016.

The average monthly value of all outward payments in 2020 was \leqslant 1 288.6 billion of which \leqslant 53.95 billion (4.2%) were retail payments. Similar to previous years, the value of 80.53% of these payments was below \leqslant 250 000.

On average, 68.4% of the retail payments and 86.1% of the interbank payments were settled each day before noon. They represented 49.9% and 81.2% of the respective values.

Table 6: Volumes of outward sent payments in daily averages

	Domestic		Cross border sent		Total sent	Cross border received	
	Volume	% volume sent	Volume	% volume sent	Volume	Volume	% volume sent and received
2016	973	17.1%	4 719	82.9%	5 692	2 968	34.3%
2017	965	17.0%	4 701	83.0%	5 666	3 653	39.2%
2018	955	15.3%	5 270	84.7%	6 224	4 047	39.4%
2019	940	13.8%	5 866	86.2%	6 806	4 389	39.2%
2020	968	13.5%	6 208	86.5%	7 176	5 209	42.1%
Variation 2019-2020	+ 2.95%		+ 5.83%		+ 5.43%	+ 18.67%	

Source: BCL

All national RTGS systems participating in TARGET2 transferred a monthly average of 7.39 million payments in 2020, approximately the same amount as in the previous year (\pm 0.076 million). Luxembourg's portion represented 2.15% of this volume (2.04% in 2019). The average monthly value exchanged amounted to \pm 38 823 billion (\pm 36 771 billion in 2019). Luxembourg's share of the exchanged value was 3.42% (3.43% in 2019)

In 2020, 60% of all payments in the national RTGS system which relied on TARGET2 were domestic transactions. The part of interbank payments increased again by 1 percentage point to attain 26%. In TARGET2-LU, domestic payments represented 13.49% and interbank payments 59.95% of the volume.

The average value of a TARGET2 payment amounted \odot 5.25 million in 2020. In TARGET2-LU, this value was \odot 8.37 million.

The maximum daily number of outward payments in TARGET2 was 501 979 (30 June 2020). For Luxembourg, the maximum daily amount was reached on 21 December 2020 with 10 497 payments.

Availability and performance of TARGET2

The availability of the TARGET2 platform, and hence of TARGET2-LU, was 99.67% in 2020 due to three major incidents as compared to 100% one year before. The SSP received a daily average of 350 575 payment instructions, meaning 0.14% more than in 2019. Of all the instructions during 2020, 99.57% were settled within five minutes after receipt, whereas 0.27% were settled within 15 minutes and 0.16% were settled after a quarter.

1.6.3 Retail payments in Luxembourg

Alongside notes and coins, the most widely used payment instruments in Luxembourg are payment cards (debit and credit cards), credit transfers and direct debits¹¹. In 2020, Luxemburg banks started to offer SEPA Instant Credit Transfers (SCT Inst)¹². Network-based electronic money, which is issued and operated by credit institutions or electronic money institutions, is mainly used for remote payments. Several banks in Luxembourg offer mobile applications enabling point-of-sale payments, internet payments, payment of invoices or P2P payments. The main payment card issuers and acquirers offer contactless payments¹³ and without the use of a personal identification code up to a € 50 payment. Several card issuers also offer the possibility to pay through a personal connected object (such as a watch).

¹¹ Cheques are no longer daily payment instruments; their usage is on the decrease.

¹² The scheme of the European Council has been operational since November 2007. SCT Inst enables - in the SEPA area - a beneficiary to receive funds a few seconds following the initiation of the payment by the payer.

¹³ Via NFC technology.

Table 7: Distribution of payment instruments (share in number of transactions, %)

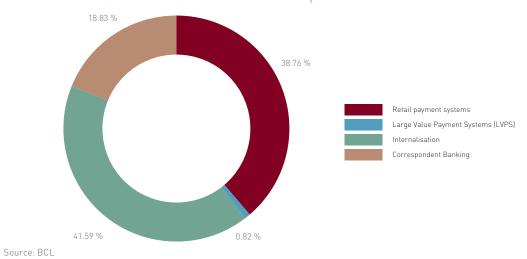
	201914	2020
Credit transfers and standing orders	24.81	23.16
Direct debits	6.81	6.98
Debit cards	37.30	39.38
Credit cards	31	30.45
Cheques	0.08	0.03
Total	100	100

Source: BCL

Customer credit transfers and standing orders

Credit transfers can be processed internally in banks, through a payment system or through correspondent banking agreements. Banks in Luxembourg process the majority of their non-internal credit transfer and standing order transactions (domestic¹⁵ and cross-border) in retail payment systems (please refer to the chart below).

Chart 15: Share in volume of customer transfers in 2020. Distribution per settlement channel



¹⁴ Revised data as compared to the annual report 2019.

¹⁵ A credit transfer or a direct debit is considered as domestic when both the payer and the payee have their payment account with a Luxembourg institution.

Table 8: Customer credit transfers and standing orders¹⁶

Credit transfers sent	2019	2020	Annual variation (%)
Total volume of customer transfers (in millions of transactions)	84.0717	80.12	-4.70
Volume of customer transfers processed for the account of non-MFI customers ¹⁸ (in millions of transactions)	78.5819	74.55	-5.13
Average value of customers' transfers ²⁰ (in euros)	3 718	4 013	7.93 ²¹

Source: BCL

In 2020, the total number of credit transfers issued in Luxembourg amounted to 80.12 million, of which 74.55 million were executed on behalf of customers that are not monetary financial institutions. Transactions settled in retail payment systems (e.g. Step2, Equens) provide a good indicator of the use of credit transfers by households and non-financial corporations. In 2020, the average value of these transfers amounted to &4,013.

Direct debits

SEPA²² direct debits in Luxemburg are mainly processed in retail payment systems.

Direct debits

	2019	2020	Annual variation (%)
Volume (in millions of transactions)	23.0623	24.16	4.77
Value (in euro million)	11 43224	10 582	-7.44 ²⁵

Source: BCL

Payment cards in Luxembourg

Banks and other categories of payment services providers in Luxembourg issue debit and credit cards in international schemes.

Payment card activity²⁶ in 2020 and its annual trend are detailed in the tables below.

¹⁶ Credit transfers resulting of standing orders are included.

¹⁷ Revised data as compared to the annual report 2019.

¹⁸ MFI stands for Monetary Financial Institution. The non-MFIs category includes corporates and households but also non-monetary investment funds and the government.

¹⁹ Revised data as compared to the annual report 2019.

 $^{20 \}quad \text{It refers to the average value of credit transfers processed in the retail systems Step 2 and Equens.} \\$

²¹ The increase of the average value is general and concerns both STEP2 and Equens.

²² Single Euro Payments Area.

²³ Revised data as compared to the annual report 2019.

²⁴ Revised data as compared to the annual report 2019.

²⁵ This decrease relates to the cessation of activity of an actor whose average value was significantly higher than the average.

²⁶ Payment transactions and ATM withdrawals.

Number of payment cards issued in Luxembourg

Volume (number of cards)	2019	2020	Annual variation (%)
Debit cards	1 605 24937	2 069 275	28.9138
Credit Cards	2 043 891	2 228 120	9.0139

Source: BCL

Transactions on cards issued in Luxembourg 30 (issuing activity)

Volume (in millions of transactions)	2019	2020	Annual variation (%)
Debit cards	126.36 ³¹	136.20	7.78
Credit cards	105.02	105.30	0.26

Value (in euro billion)	2019	2020	Annual variation (%)
Debit cards	7.86	7.98	1.52
Credit cards	8.69	7.99	-8.05

Source: BCL

Transactions in Luxembourg on cards issued in Luxembourg or abroad³² (acquiring activity)

Volume (in millions of transactions)	2019	2020	Annual variation (%)
Debit cards	66.50	61.57	-7.41 ³³
Credit cards	28.03	24.69	-11.9234
Value (in euro billion)	2019	2020	Annual variation (%)
Debit cards	4.95	4.36	-11.92 ³⁵

2 15

-16 7436

Credit cards

The Single Euro Payments Area SEPA and innovations

In view of ensuring a harmonised implementation of SEPA, the ECB established in 2013 the Euro Retail Payments Board (ERPB). This body also aims at contributing to and facilitating the further development of an integrated, innovative and competitive market for euro retail payments in the EU.³⁷ Currently, the ERPB focuses on the implementation of SEPA instant payments (SCT Inst), person-to-person mobile payments³⁸ and payment initiation services³⁹.

- 27 Revised data as compared to the annual report 2019.
- $28 \quad \text{This variation is due to the activity of one issuer in Luxembourg}.$
- 29 This variation is due to the activity of one issuer in Luxembourg.
- 30 Transactions in Luxembourg and abroad.
- 31 Revised data as compared to the annual report 2019.
- 32 Activity of Luxembourgish acquirers only. Data on the activity of foreign acquirers in Luxembourg is not available.
- 33 This decrease is due to the drop of activity in points of sales due to COVID-19.
- 34 This decrease is due to the drop of activity in points of sales due to COVID-19.
- 35 This decrease is due to the drop of activity in points of sales due to COVID-19.
- 36 This decrease is due to the drop of activity in points of sales due to COVID-19.
- 37 The ECB chairs the ERPB. Members represent the supply side (payment providers) and the demand side (users) of the market. National central banks participate in meetings on a rotational basis.
- 38 The payee (person or company) sends to a payer a message requesting a payment. The message includes all the information, i.e. reference, amount, payee's identifiers, to execute a payment, typically a credit transfer.
- 39 The user initiates a payment order with a payment service provider from an account held with another payment service provider. For the legal definition and additional insight, please refer to the second Payments Services Directive (Directive 2015/2366/EU of the European Parliament and of the Council of 25 November 2015 on payment services in the internal market, amending Directives 2002/65/EC, 2009/110/EC and 2013/36/EU and Regulation (EU) No 1093/2010, and repealing Directive 2007/64/EC).

In July 2020, the Governing Council of the ECB decided to implement two measures in TIPS to ensure the pan-European reachability of SCT Inst. Firstly, Payment Service Providers (PSPs) which are reachable in TARGET2 and which have adhered to the SEPA Instant Credit Transfer (SCT Inst) scheme should become reachable in TIPS by November 2021. Secondly, all Automated Clearing Houses (ACHs) offering instant payment services should migrate their technical accounts from TARGET2 to TIPS.

The Eurosystem revised its strategy on retail payments. The full deployment of instant payments and the development of a pan-European solution for payments at the points of interaction complement the pan-European acceptance in-shop and online, security and convenience, cost-efficiency as well as a European identity and governance structure.⁴⁰

Considering the technical developments and societal change on payment needs and habits, the Eurosystem started reflecting on the future of the euro and on its use. At the end of 2020, the Eurosystem published a report on the digital euro and opened a public consultation on this form of money, which is not aiming to replace cash.⁴¹ The digital euro could become an additional payment solution for households and businesses. There is no decision made yet on the possible issuance of the digital euro. The Eurosystem will decide mid-2021 whether to launch an investigation phase for this project.

1.6.4 Securities settlement systems

Selection of eligible depositories

For the mobilisation of securities by its counterparties, the Eurosystem has selected eligible securities settlement systems (SSS) operated by central securities depositories (CSDs). A securities settlement system or a link is eligible if it complies with two eligibility criteria specified by the Eurosystem in its General Documentation on Eurosystem monetary policy instruments and procedures. Eligibility criterion (a) requires that a SSS or a link comply with the requirements set out in Regulation (EU) No 909/2014 of the European Parliament and the Council on improving securities settlement in the European Union and on central securities depositories, and amending Directives 98/26/EC, 2014/65/ EU, and Regulation (EU) No 236/2012. Eligibility criterion (b) requires that a SSS or a link comply with the legal and operational requirements specified by the Eurosystem. The new eligibility framework also applies to SSSs and links that were approved under the past eligibility framework.

In Luxembourg, the systems operated by Clearstream Banking S.A. (CBL) and LuxCSD S.A. (LuxCSD) are eligible for the mobilisation of securities by the Eurosystem's counterparties.

A domestic mobilisation of securities is also possible via the triparty collateral management service operated by CBL. Information on this topic is available on the BCL's website. The framework for assessment of triparty agents in view of their eligibility for collateralisation of Eurosystem credit operations is published on the website of the ECB.

 $^{40 \}quad https://www.ecb.europa.eu/pub/pdf/other/ecb.eurosystemretailpaymentsstrategy \sim 5a74eb9ac1.en.pdf$

⁴¹ https://www.ecb.europa.eu/paym/digital_euro/html/index.en.html

Cross-border use of securities

Besides using eligible securities held at the national depository, counterparties can receive credit from their national central bank by providing collateral issued in a depository located in another country of the euro area. The Eurosystem foresees two methods of using securities on a cross-border basis:

- the Correspondent Central Banking Model, or
- links established between depositories' securities settlement systems.

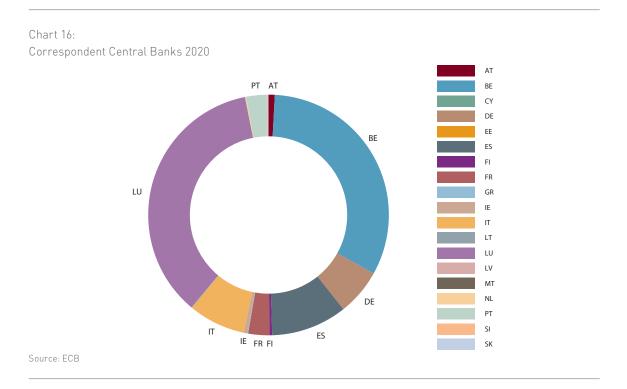
1) The Correspondent Central Banking Model

The Correspondent Central Banking Model (CCBM) enables all counterparties of the Eurosystem to use securities on a cross-border basis even if there is no eligible link between the national depository and the foreign depository in which the counterparty holds securities.

In the CCBM, each national central bank acts on behalf of the other central banks as a custodian for securities held at the national depository. This procedure involves a central bank called a correspondent central bank (CCB), which differs from the central bank granting the credit to the counterparty. The CCB holds the account at the CSD in which the deposited securities are registered. Moreover, the home central bank (HCB) grants the credit to its counterparty based on the confirmations it receives from the CCB.

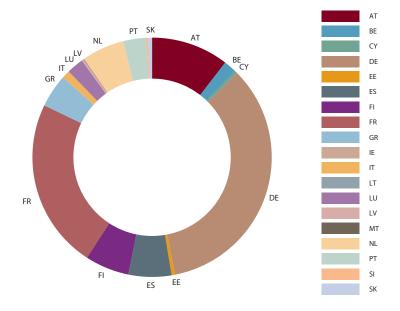
The CCBM is also used for the cross-border mobilisation of securities via the triparty collateral management services offered by CBL, Clearstream Banking AG, Frankfurt (CBF), Euroclear Bank and Euroclear France.

At Eurosystem level, the infrastructure CCBM accounted for about half of the cross-border mobilisation of securities used in Eurosystem credit operations in 2020. In terms of value, the most active correspondent central banks in 2020 were those of Luxembourg (35.8%), Belgium (32.6%), Spain (10.2%), Italy (7.7%) and Germany (6.2%).



The most active home central banks were those of Germany (34.3%), France (23%), Austria (10.5%), Finland (6%) and of Spain (5.8%).

Graphique 17: Home Central Banks 2020



Source: ECB

2) Links established between securities settlement systems of CSDs

Currently two types of links are eligible, direct links and relayed links:

- direct links allow a SSS established in one country to make securities issued in a system in another country available through securities accounts maintained between the two systems;
- relayed links enable the transfer of securities between two systems without bilateral relationship by using a third intermediary system.

In 2020, Luxembourg counterparties could use the direct links between CBL and CBF, Euroclear Bank, Euroclear Finland, KDD (Slovenia), VP SECURITIES (Denmark), LuxCSD, CDCP (Slovakia), as well as the relayed links of CBL via CBF between CBL and BOGS (Greece), Euroclear France, Euroclear Netherlands, Iberclear (Spain), MaltaClear, Monte Titoli (Italy), NBB-SSS (Belgium) and OeKB (Austria). The direct link between LuxCSD and CBF was considered eligible for Eurosystem credit operations as well as the relayed links of LuxCSD via CBF between LuxCSD and BOGS, Euroclear France, Euroclear Netherlands, Iberclear, MaltaClear, Monte Titoli, NBB-SSS and OeKB. Among these links of CBL and of LuxCSD, Luxembourg counterparties primarily used the links with CBF and Euroclear France.

It should be noted that Eurosystem counterparties use a large number of securities held in Luxembourg as collateral, either in the CCBM, through the use of links, or through a combination of the CCBM and links. In 2020, Luxembourg's share in the cross-border use of securities within the Eurosystem was 28%.

1.6.4.1 TARGET2-Securities

TARGET2-Securities (T2S) is a centralised platform delivering harmonised clearing and settlement services to the market. It provides a harmonised domestic and cross-border securities settlement service in euro or other currencies in central bank money.

The T2S platform encompasses both the securities accounts managed by the central securities depositories and the dedicated cash accounts (DCAs) hosted by the central banks. The DCAs are used to provide the liquidity necessary to settle the securities purchase transactions on T2S and to receive the cash proceeds resulting from the settlement of sales on T2S. The DCAs are funded by the RTGS account they are associated with. For euro payments, the RTGS account is a TARGET2 account.

The settlement efficiency is improved on T2S owing to several mechanisms, including the auto-collate-ralisation service. This is a credit operation automatically triggered when a participant fails to settle a securities purchase transaction because of a lack of cash on its DCA. In this case, T2S will automatically select eligible collateral, either by mobilising assets available on the participants' securities account (auto-collateralisation "on stock") or by using the securities that are being purchased (auto-collateralisation "on flow"). T2S will then pledge these securities in favour of the central bank; in exchange, the participant receives a central bank intraday credit.

The BCL has been offering DCAs to participants that requested them. The BCL has also prepared the activation of the auto-collateralisation service, which is available to participants of LuxCSD on request.

1.6.4.2 LuxCSD

LuxCSD – Luxembourg's central securities depository – was jointly created in 2010 by the BCL and Clear-stream International on the basis of an equal shareholding. It provides securities settlement services in central bank money.

LuxCSD provides the following main services:

- the settlement of securities transactions in central bank money;
- the settlement of free of payment transactions;
- direct settlement against counterparties in domestic markets;
- securities issuance services with settlement in central bank money or free of payment;
- securities custody services;
- the routing of orders in investment fund shares;
- issuance of the Legal Entity Identifier for Luxembourg legal entities;
- a national access point to T2S.

The securities issued and admitted to LuxCSD may be bonds, shares, or securities of UCITS, domiciled in Luxembourg or abroad.

Luxembourg counterparties can use LuxCSD and its links approved by the Eurosystem in order to collateralise Eurosystem credit operations.

Since 2018, LuxCSD has been reorganising its access to other securities settlement systems by using the German system CBF as main access point. This reorganisation has continued in 2020.

The governance of LuxCSD is performed by an audit committee and by a Board of Directors. The BCL is not active in the governance bodies of LuxCSD.

1.7 FINANCIAL STABILITY AND PRUDENTIAL SUPERVISION

1.7.1 Macro-prudential supervision

The financial stability mandate attributed to the BCL is based on the Treaty on the Functioning of the European Union (TFEU) – through the central bank's participation in the Eurosystem – and on national legislation.

At the European level, Article 127, paragraph 5, of the TFEU foresees that the European System of Central Banks (ESCB), in addition to its core central tasks, should contribute to 'the smooth conduct of policies pursued by the competent authorities relating to the prudential supervision of credit institutions and the stability of the financial system'.

The European Union has adopted prudential rules for the banking system in order to fix banks' regulatory capital requirements (CRD IV⁴² and CRR⁴³). The rules have been implemented in Luxembourg⁴⁴. In June 2019, CRD V⁴⁵ (2019/878/EU) and CRR II⁴⁶ (Reg (EU) 2019/876) were published in the Official Journal of the European Union, with numerous amendments both at the micro-prudential level (introduction of a leverage ratio, net stable funding ratio, new rules for credit risk and market risk, etc.) and at the macro-prudential level (adjustments concerning the buffer for Other Systemically Important Institutions (O-SIIs) and to the systemic risk buffer (SyRB)).⁴⁷ These changes apply as of June 2021.

At the national level, Article 2, paragraph 6, of the organic law of the BCL foresees that '[...] the Central Bank shall cooperate with the Government and with prudential supervision authorities at the national level, as well as with the other central banks at Community and international level, to contribute to ensuring financial stability, notably within committees set up for this purpose'. In line with the European Systemic Risk Board's (ESRB⁴⁸) Recommendation regarding the macro-prudential mandate of national authorities, the Luxembourgish legislator adopted the Law of 1 April 2015 establishing the national macro-prudential authority namely the Systemic Risk Committee.;⁴⁹, Within this Committee, the BCL has a leading role in macro-prudential supervision⁵⁰ and is in charge of the Secretariat, which falls under the hierarchical authority of the BCL Governor.⁵¹ In this context, the Secretariat is in charge of preparing the Committee's meetings, drafting Recommendations and Opinions as well as conducting macro-prudential analyses required for the decision-making process of the Committee. In addition to its financial stability mandate, due to the role of payment and securities settlement systems within the financial system, the national legislator has entrusted the BCL with the supervision of the payment and securities settlement systems settlement systems.

⁴² Directive 2013/36/EU (Capital Requirement Directive IV; CRD IV) of the European Parliament and of the Council of 26 June 2013 relating to the taking up and pursuit of the business of credit institutions and the prudential supervision of credit institutions and investment firms amending Directive 2002/87/EC and repealing Directives 2006/48/EC and 2006/49/EC (CRD IV).

⁴³ Regulation (EU) No. 575/2013 (Capital Requirement Regulation; CRR) of the European Parliament and of the Council of 26 June 2013 on prudential requirements for credit institutions and investment firms and amending Regulation (EU) No. 648/2012.

⁴⁴ Transposed by the Law of 23 July 2015 transposing Directive 2013/36/EU of the European Parliament and of the Council of 26 June 2013;
- transposing Articles 2 and 3 of Directive 2011/89/EU of the European Parliament and of the Council of 16 November 2011; - transposing Article 6(6) of Directive 2011/61/EU of the European Parliament and of the Council of 8 June 2011; - amendment of: 1. the amended law of 5 April 1993 on the financial sector; 2. the amended law of 23 December 1998 establishing a commission for the supervision of the financial sector:

⁴⁵ Directive (EU) 2019/878 of the European Parliament and of the Council of 20 May 2019 amending Directive 2013/36/EU as regards exempted entities, financial holding companies, mixed financial holding companies, remuneration, supervisory measures and powers and capital conservation measures.

⁴⁶ Regulation (EU) 2019/876 of the European Parliament and of the Council of May 20, 2019 amending Regulation (EU) No. 575/2013 as regards the leverage ratio, net stable funding ratio, capital requirements and eligible liabilities, counterparty credit risk, market risk, central counterparty exposures, collective investment scheme exposures, large exposures and reporting and disclosure requirements, and Regulation (EU) No. 648/2012

⁴⁷ See "A Review of Macroprudential Policy in the EU in 2018" - special feature C (CERS 2019).

⁴⁸ See Recommendation of the ESRB of 22 December 2011 (ESRB/2011/3). In French, Comité du risque systémique (CdRS).

⁴⁹ See Law of 1 April 2015 establishing a Systemic Risk Committee and amending the modified law of 23 December 1998 regarding the monetary status and the Central Bank of Luxembourg.

⁵⁰ See Sub-Recommendation B-3 of the Recommendation of the ESRB on the macro-prudential mandate of national authorities [ESRB/2011/3].

See section 1.7.1.3 on the Secretariat of the Systemic Risk Committee.

⁵² Article 2(5) of the organic law of the BCL.

1.7.1.1 Macro-prudential surveillance in Luxembourg

Since the inception of the Systemic Risk Committee (Comité du risque systémique, CdRS), the BCL has been involved in the monitoring of systemic risks, i.e. those risks likely to impair the stability of the national financial system as a whole. To this end, the BCL must be able to identify and measure the accumulation of risks over time as well as their distribution within the financial system. The monitoring of the temporal dimension of risks is based on the regular follow-up of a set of indicators such as the credit cycle, the prices of assets held by credit institutions and investment funds, the effect of leverage, the evolution of maturity and liquidity transformation, etc. The analyses conducted give prominence to the assessment of risks within banks and investment funds because of their importance in the domestic financial sector.

In 2020, the BCL's assessment and monitoring of systemic risks resulting from the impact of the COVID-19 pandemic on the investment fund and banking sectors was strengthened. The implementation of an adhoc data collection on a daily and weekly basis by the Systemic Risk Committee has been instrumental in facilitating the analysis and assessment of these risks and their evolution after the sudden and very severe shock of the pandemic.

The BCL placed particular emphasis on monitoring the risk of default by bank counterparties resulting from the economic downturn, as well as the potential effects associated with the implementation of moratoria and government guarantees. In addition, the collection of high frequency data allowed for daily monitoring of liquidity risks in the investment fund sector.

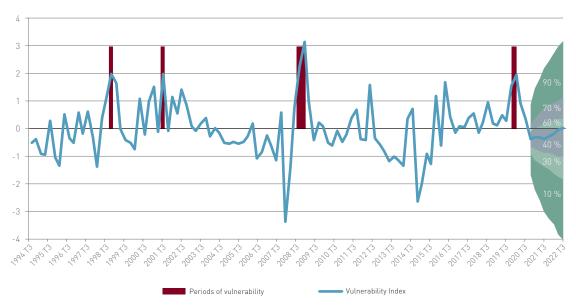
In view of the growing importance of the non-bank intermediation system and its linkages with credit institutions, the BCL has undertaken a number of analyses to assess the degree of interdependence between investment funds and the banking sector and to model the potential vulnerabilities that are likely to affect investment funds through estimates of default probability levels.

In the context of the Financial Stability Review, the BCL uses various indicators (a dashboard), including probabilities of default, z scores⁵³, a vulnerability index and stress tests to assess the financial stability of Luxembourg's financial sector. The chart below provides an example of the evolution of the vulnerability index for Luxembourg banks⁵⁴.

⁵³ The z score remains an approximation of the index reflecting the distance to the default threshold of a bank or a firm. The fundamental difference between the z score and the distance to default is statistical. This difference lies in the data used to assess the financial soundness of banks (balance sheet vs. market data).

⁵⁴ Rouabah, A. (2007) : Mesure de la vulnérabilité du secteur bancaire luxembourgeois. Banque centrale du Luxembourg. Cahier d'étude N° 24. Avril

Chart 18: Forecast of the evolution of the vulnerability index for Luxembourg banks: 2021Q1-2022Q4



Source: BCL; Period: 1994Q4-2020Q4. Forecast: 2021Q1-2022Q4

Measures of vulnerability for Undertakings for Collective Investment (UCITS) were also developed in order to assess potential systemic credit risk arising from the interconnections between the different categories of investment funds as well as their interactions with the macroeconomic environment. The intersectorial dimension of cyclical and structural systemic risk was analysed using several tools that allow for the assessment of the position of the economy in the financial cycle, the interconnectedness and the size of linkages between financial institutions.

In order to assess the domestic and cross-border interbank linkages, the BCL approach relies on network analysis techniques that focus on assessing the interconnections between the banking sector, notably custodian banks and investment funds. The construction of an indicator called the "alpha index"⁵⁵ allows tracking potential vulnerabilities arising from significant bank and investment fund linkages. The following graph depicts the approach used by the BCL to assess the importance of the underlying risks due to the potential strengthening of links between the different components of the Luxembourg financial system. Any significant increase in the alpha index is subject to a deeper analysis in order to identify the relevant entities and the underlying reasons for such an increase.

⁵⁵ For more details on the construction of the alpha index, see the BCL Financial Stability Review, Chapter 3, 2020.

⁵⁶ The alpha index is a measure of the ratio between the number of fundamental circuits observed in a network to the maximum number possible. Its value lies from 0 to 1.

Chart 19: Quarterly dynamics of the alpha index: 2014Q4-2020Q4



Source: BCL. Period: 2014Q4-2020Q4

The BCL conducts regular analysis in order to model the linkages between the financial sector and the real economy and continues to develop models for stress testing. The analysis of banks' liquidity in case of adverse shocks is also undertaken. In this context, it may be noted that a number of indicators developed by the BCL take a forward looking approach. In order to anticipate risks associated with rising vulnerabilities in the banking sector, the BCL monitors the evolution of its synthetic indicator of financial vulnerability and conducts macro-prudential stress tests.

The BCL continues to closely monitor the evolution of residential real estate prices and the potential vulne-rabilities for households and credit institutions, possibly arising from these dynamics. To this end, the BCL has developed an econometric model, integrating supply side and demand side constraints, which facilitates a quarterly risk assessment. These results have been included in a systemic risk dashboard developed by the BCL. The dashboard incorporates a set of both quantitative and qualitative indicators aimed at detecting potential systemic risks arising within one component of the financial sector and/or within an economic sector relevant for financial stability. Information provided by the dashboard could be used as a tool to assess whether the intermediate objectives of macro-prudential policy are being achieved. The dashboard also includes multiple indicators such as an estimation of Luxembourg's financial cycle and the degree of interconnectedness within the financial sector. This dashboard has been complemented by a number of specific studies aimed at identifying the emergence of new risks following changes in the regulatory, macroeconomic and financial environment.

The BCL uses the Basel Committee on Banking Supervision (BCBS) D SIB framework, as well as the guidelines developed by the European banking authority (EBA), in order to identify the domestic systemically important institutions in Luxembourg. This framework is based on a series of indicators including certain relevant parameters such as the size of the institution, its level of interconnectedness and the probability that other banks provide similar services in the event of default (i.e. its degree of substitutability). In 2017, as one of its contributions to the Luxembourg Systemic Risk Committee, the BCL extended the methodology used to identify systemically important institutions in Luxembourg. Drawing on network analysis methods, two new criteria have been included in the methodology in order to account for the interconnections between banks and investment funds. This new approach led to the identification of two new credit institutions as "Other Systemically Important Institutions" in 2018.

The BCL is a member of the Regional Consultative Group for Europe of the Financial Stability Board (FSB), the latter being the international body in charge of following and drafting recommendations for the global

financial system. Since 2017, the BCL has contributed to the work of the FSB on financial stability risks associated with activities conducted by non-bank financial intermediaries. The results of this analysis are published on an annual basis. 57

Moreover, with the implementation of the Single Supervisory Mechanism (SSM), the BCL participates in the SSM groups dedicated to crisis management and risk analysis. The BCL also takes an active role in the EBA's standing committee on 'regulation and policy' and in the EBA subgroup on crisis management.

With the entry into force of the SSM, the ECB has a role in the domain of macro-prudential policy. Although national authorities retain primary responsibility for the implementation of macro-prudential measures, the ECB can – in coordination with those authorities – take additional measures provided in the Council's regulation concerning policies relating to the prudential supervision of credit institutions.⁵⁸

Measures available to the ECB include the setting of the capital buffer rates as defined in CRD IV as well as the measures under article 458 of the CRR, such as the definition of risk weights targeting asset bubbles in the real estate sector, liquidity requirements, public disclosure requirements, or intra-financial sector exposures limits. Against this backdrop, the Financial Stability Committee (FSC) of the ECB was established in order to assist decision-making bodies fulfil their responsibilities in relation to prudential supervision and financial system stability.

The BCL, in performing its functions for macro-prudential surveillance, contributes to several committees and working groups of the European System of Central Banks (ESCB), such as the FSC and its substructures. These substructures include two subgroups dedicated to macro-prudential analysis and policy. The BCL also takes part in the working group on crisis management and resolution and in the expert groups dealing with legal acts and draft technical standards.

The macro-prudential policy framework at the European level continues to face challenges. In particular, further harmonization of the national macro-prudential toolkits would facilitate the implementation and coordination of macro-prudential policy within the EU. In addition, such a harmonization would facilitate the ECB's close cooperation with the ESRB, which is the body responsible for the macro-prudential oversight of the European financial system.

1.7.1.2 The European Systemic Risk Board

The European Systemic Risk Board (ESRB) is comprised of more than 70 institutions - including central banks, national and European financial supervisory authorities, the European Commission, etc. - and is composed of both a General Board and a Steering Committee. The technical work is shared between the Advisory Technical Committee (ATC), which consists of experts from the member institutions, and the Advisory Scientific Committee (ASC), which has academic experts amongst its membership.

Within this structure, central banks play a major role in European macro-prudential supervision given their expertise and existing responsibilities in preserving financial stability. The Governor of the BCL is a voting member of the ESRB General Board, which is the unique decision making body of the ESRB. Furthermore, the national micro prudential supervisory authorities also participate at the level of the ESRB General Board in order to share their expertise and specific information, although they do not hold voting rights. The BCL is also represented at the level of the General Board as a liquidity supervisor according to a rotation principle among the other national supervisory authorities. Finally, the BCL shares its macro-prudential, monetary and statistical expertise through the participation of its staff members in the analysis and technical work conducted by the ESRB.

The aim of the ESRB is to identify macro-prudential risks at the level of the European financial system as a whole and to issue clear warnings and recommendations to addressees. Adherence with these Recommendations is based on a "comply or explain" principle.

⁵⁷ FSB (2020). Global Monitoring Report on Non-Bank Financial Intermediation. January

⁵⁸ See Council Regulation (EU) No 1024/2013 of 15 October 2013 conferring specific tasks on the European Central Bank concerning policies relating to the prudential supervision of credit institutions.

Regular plenary meetings of the ESRB General Board take place at least four times a year. In 2020, taking into account the exceptional circumstances associated with the COVID-19 pandemic, the work of the ESRB included the following areas:

- the identification and assessment of general risks of a systemic nature, followed by discussions on the necessary macro-prudential actions, and the annual review of the ESRB risk dashboard.
- the publication of Recommendation ESRB/2020/4 on liquidity risks related to investment funds;⁵⁹
- the publication of Recommendation ESRB/2020/6 on liquidity risks arising from margin calls;⁶⁰
- the publication of Recommendations ESRB/2020/7 and ESRB/2020/15 amending the Recommendation on restrictions on distributions during the COVID-19 pandemic; and⁶¹
- the publication of Recommendation ESRB/2020/8 "on the monitoring of the financial stability implications of debt moratoria, as well as of public guarantee schemes and other measures of a fiscal nature adopted to protect the real economy in response to the COVID-19 pandemic"62

With the entry into force of CRD V and CRRII in June 2021, the ESRB will see its mandate and role extended:

- the ESRB will have the power to issue an opinion on the adequacy of the level of the risk weights and the loss given default with a view of the macro-prudential use of the instruments provided for in Articles 124 and 164 of CRR II;
- the ESRB will become a notification hub for disseminating notifications of Member States' usage of macro-prudential instruments in order to strengthen its role in coordinating macro-prudential policy in the EU. To facilitate administrative management, the notification procedures for the counter-cyclical capital buffer and the systemic risk buffer have been simplified.

The BCL contributes to the work carried out by the substructures of the ESRB, particularly through the Advisory Technical Committee and its substructures related to macro-prudential instruments, the identification of risks and macro-prudential analysis. The BCL also participates in the expert group on stress testing and for the development the ESRB risk dashboard and heat map.

Since September 2019, the BCL has participated in the second phase of the Expert Group on Macroprudential Stance in charge of proposing the conceptual framework to qualify the orientation of a macro-prudential policy stance (restrictive or accommodating) whose first report was published in 2019.⁶³ The aim of this second phase is to assess the tools needed to operationalise the conceptual framework for macro-prudential stance.

In view of the potential repercussions of the COVID-19 pandemic, the BCL joined the expert group dedicated to monitoring banks' responses to the pandemic-related crisis as soon as it was implemented by the ECB and the ESRB. This work included analysing the effectiveness of the adopted support measures. The group's initial work focused on the assessment, benefits and obstacles to the release of banks' accumulated capital buffers to support the smooth flow of credit to the economy.

Due to the persistent low interest rate environment, the members of the ESRB General Board decided to review the conclusions of the 2016 report entitled "Macroprudential policy issues arising from low interest rates and structural changes in the EU financial sector". The objective is to provide an updated assessment of the evolution of the financial stability and macro-prudential policy challenges associated with the low interest rate environment. To this end, the ESRB has set up a "task force" jointly chaired by representatives

⁵⁹ Recommendation of the ESRB of 6 May 2020 [ESRB/2020/4]

⁶⁰ Recommendation of the ESRB of 25 May 2020 (ESRB/2020/6)

⁶¹ Recommendation of the ESRB of 27 May 2020 [ESRB/2020/7] and Recommendation of the ESRB of 15 December 2020 [ESRB/2020/15]

⁶² Recommendation of the ESRB of 27 May 2020 (ESRB/2020/8)

⁶³ ESRB (2019). Features of a macroprudential stance: initial considerations. April.

of the ECB's Financial Stability Committee and the Scientific Advisory and Technical Advisory Committees. The report of this task force is expected to be finalised by the end of 2021.

1.7.1.3 The Secretariat of the Systemic Risk Committee

Following the Recommendation of the ESRB of 22 December 2011, the macro-prudential framework in Luxembourg was established by the adoption of the Law of 1 April 2015.⁶⁴ Thus, the Luxembourgish legislator opted for a board-based institutional structure for the macro-prudential authority and, therefore, created a Systemic Risk Committee (the Committee) composed of all national authorities carrying a role in financial stability. The Committee consists of four members, namely (i) the Government, (ii) the Central Bank of Luxembourg (BCL), (iii) the Financial Sector Supervisory Commission⁶⁵ (CSSF), and (iv) the Insurance Commission⁶⁶ (CAA). The member institutions of the Committee are represented, respectively, by (i) the member of the Government who is responsible for the financial centre, (ii) the Director General of the BCL, (iii) the Director General of Financial Sector Supervisory Commission (CSSF), and (iv) the Director of the Insurance Commission (CAA). Similarly, four alternate members from these institutions sit at this Committee and replace the members in case of absences. The Committee is chaired by the member of the Government and in his absence by the Director General of the BCL.

The collegiate form of the Committee reflects the aim of the Luxembourg law to cover all parts of the domestic financial sector in order to prevent the emergence or mitigate any sources of systemic risk and contagion from one sector to another. Such a holistic view to the financial system is also reflected in the composition of the Committee's Secretariat, which counts among its membership, a correspondent per authority represented within the Committee.

As a decision-making body, the Committee relies on its Secretariat, which plays an essential role in the preparation of meetings and the conduct macro-prudential analyses. Thus, given the expertise of central banks in macro-prudential policy, and in accordance with the role entrusted to it by the ESRB Recommendation⁶⁷, the Luxembourg legislator has attributed the Committee's Secretariat to the BCL, under the hierarchical authority of its Governor.

Thanks to its composition and the expertise of its various departments, the BCL benefits from the identification, evaluation and analytical capabilities with respect to systemic risks that are likely to emerge in the main components of the national financial system. Moreover, the Secretariat focuses on strengthening cooperation and the exchange of information between the Committee's members.

In 2020, the analyses undertaken by the CdRS focused on both the cyclical and the structural dimensions of systemic risk. The cyclical nature of systemic risk relates to its time dimension, i.e. the accumulation of vulnerabilities through time that can affect the stability of the national financial system. This dimension is captured via the extraction of the credit cycle based on data for credit to the non-financial sector (house-holds and non-financial companies) or residential real estate prices.

In Luxembourg, the structural dimension of risk is mainly associated with the sustainability of household mortgage debt, which reached 132.1% of disposable income in the fourth quarter of 2020 (Chart 20)⁶⁸.

⁶⁴ See law of 1st April 2015 establishing a Systemic Risk Committee and amending the modified law of 23 December 1998 regarding the monetary status and the Central Bank of Luxembourg

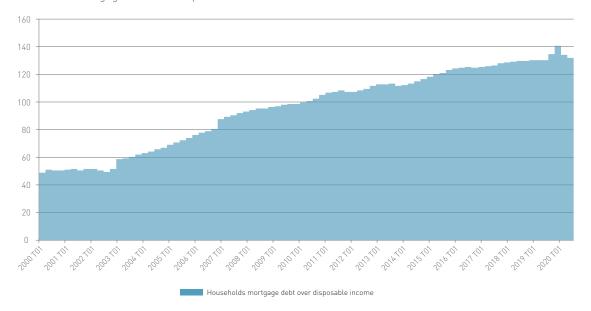
⁶⁵ In French, Commission de surveillance du secteur financier.

⁶⁶ In French, Commissariat aux assurances.

⁶⁷ See Sub-Recommendation B-3 of the Recommendation of the ESRB of 22 December 2011 concerning the macro-prudential mandate of national authorities to Member States (ESRB/2011/3).

⁶⁸ Official STATEC data at annual frequency are available until 2019. Quarterly data are obtained by interpolation. Data between 2019Q4 - 2020Q4 are projections.

Chart 20:
Households mortgage debt over disposable income ratio (in %)



Source: BCE, STATEC, BCL computations. Period: 2000Q1-2020Q4. Projection for household gross disposable income data between 2019Q4 and 2020Q4

These analyses revealed in 2018 the development of cyclical vulnerabilities in Luxembourg associated with bank credit growth to the non-financial sector and the sustained growth in residential real estate prices against a background of increasing household indebtedness in a low interest rate environment. Despite the health crisis, this trend continued in 2020. In order to ensure the resilience of the banking sector in case of a turn in the financial cycle, the CdRS addressed a recommendation to the designated authority to activate the CCyB with a buffer calibration of 0.25% for the first quarter of 2019.69 In face of the continued increase in cyclical risks in 2019, fuelled by the sustained growth in credit to the non-financial private sector as well as by the increase in house prices in a context of high household debt, the CdRS recommended in December 2019 to the designated authority to increase the counter-cyclical capital buffer rate to 0.5% for the first quarter of 2020. In accordance with the regulation in force at the EU level, the activation of this increase has been effective since 1 January 2021. The BCL has been extensively analysing structural systemic risks associated with household indebtedness in Luxembourg. Indeed, household indebtedness has been identified has a potential source of vulnerability for the stability of the domestic banking sector. 70 In 2019, the ESRB had addressed a Recommendation to the attention of the Systemic Risk Committee and the Luxembourg government highlighting the need to deal with vulnerabilities in the residential real estate market in Luxembourg.71 The ESRB recommended that Luxembourg finalise the legislative process for borrower-based macro-prudential instruments and to activate these instruments as soon as they become available in the national policy toolkit.

The government, on the proposal of the CdRS, had submitted a draft law on macro-prudential measures relating to residential real estate loans to the Chamber of Deputies on 11 December 2017.⁷² The text included the provision of new macro-prudential instruments, such as limits for loan-to-income and debt service-to-income ratios. The legislative process was completed with the adoption of the Law of 4 December 2019 by the Chamber of Deputies.⁷³ In addition, this new law extended the BCL's prerogatives with regard to access

⁶⁹ Recommendation of the Systemic Risk Committee of 10 December 2018 concerning the fixation of the countercyclical capital buffer rate for the first quarter of 2019.

⁷⁰ See for example BCL (2020). Financial Stability Review. Box 1.1, page 23 to 26.

⁷¹ Recommendation of the ESRB of 27 June 2019 (ESRB/2019/6)

⁷² Bill No. 7218 on macro-prudential measures relating to residential real estate loans and amending the law on the financial sector and the law establishing the Systemic Risk Committee.

⁷³ Law of 4 December 2019 amending: 1° the amended Law of 5 April 1993 on the financial sector; 2° the Law of 1 April 2015 creating a systemic risk committee and amending the amended Law of 23 December 1998 on monetary status and the Central Bank of Luxembourg; with a view to introducing macro-prudential measures relating to residential real estate loans.

to data available from public administrations in order to enable it to deepen its research and analysis on macro-prudential matters in relation to the missions of the Systemic Risk Committee⁷⁴.

In view of the activation of these new macro-prudential instruments in 2020, the BCL has carried out several studies to determine the most appropriate level of calibration for these macro-prudential instruments.

Given the continued increase in residential real estate prices, mortgage loans and household debt, the CdRS recommended to the designated authority (CRS/2020/005) that it set new lending conditions for loans intended to finance the acquisition of residential real estate located in Luxembourg. The Recommendation recommends that the designated authority activate an instrument, in this case a loan-to-value ratio differentiated by type of borrower, for new mortgage loans. The Committee's recommendation requires the reciprocation of the differentiated LTV measure by other European countries in order to avoid its circumvention.

In 2020, the Systemic Risk Committee adopted five recommendations and one opinion, allowing, on the one hand, to comply with legal requirements and, on the other hand, to strengthen the resilience of the national financial system:

- Recommendations (CRS/2020/001), (CRS/202/002), (CRS/2020/003) and (CRS/2020/006) regarding the setting of the countercyclical buffer rate for the second, third, and fourth quarters of 2020 and the first quarter of 2021, respectively;
- Recommendation (CRS/2020/005) of 9 November 2020 concerning loans for residential real estate located in Luxembourg;
- Opinion (CRS/2020/04) of 26 October 2020 on the annual designation and review of the calibration of the other systemically important institutions (0-SIIs) buffer.

1.7.2 Micro-prudential supervision

1.7.2.1 Liquidity supervision

The mission to supervise the liquidity of market operators was entrusted to BCL through an amendment to its Organic Law in October 2008. The main purpose of supervising market operators' liquidity is to assess the liquidity situation and liquidity risk management of credit institutions, being counterparties of the BCL in monetary policy operations. Since 2014, this supervision has been carried out in the context of the Single Supervisory Mechanism (SSM).

As shortcomings in the management of liquidity risk of certain operators were one of the main causes of the financial turmoil in 2008, liquidity management and liquidity risk management have been a subject of particular attention for supervisory authorities at the international level in recent years.

Liquidity regulation is also important for a central bank since it acts, on the one hand, as a provider of liquidity to the financial system and, on the other hand, it can detect and even prevent a chain of market failures, thereby limiting systemic risk.

⁷⁴ Article II of the Law of 4 December 2019

⁷⁵ Recommendation CRS/2020/005.

1.7.2.1.1 Liquidity risk supervision of credit institutions established in Luxembourg in the context of the Single Supervisory Mechanism

In the context of the implementation of the Banking Union and the establishment of the SSM, the ECB assumed responsibility for the supervision of all euro area banks on 4 November 2014.

This supervision is carried out directly by the ECB for those banks and banking groups considered "significant", including their subsidiaries and branches, while it is entrusted to the national competent authorities (NCAs) for the so-called "less significant" banks, under the ultimate oversight of the ECB.

The main criteria used in the SSM Regulation to define the significance of a bank apply at the highest level of consolidation and are as follows:

- its size (a total value of assets in excess of EUR 30 billion);
- its importance for the economy of the EU or a participating Member State (a total value of assets greater than 20% of the gross domestic product (GDP) of the participating Member State, unless the total value of assets is less than EUR 5 billion), and
- its importance with regard to cross-border activities.

The day-to-day supervision of "significant" credit institutions is carried out by the Joint Supervisory Teams (JSTs), comprised of staff from the ECB and competent authorities, including national central banks.

The BCL participates in the JST of significant banks established in Luxembourg, as well as in some JSTs of significant banks established in other euro area Member States with subsidiaries in Luxembourg, to supervise liquidity risk. In this context, the supervision of liquidity risk is carried out on the basis of common methodologies and standards developed jointly by the ECB, the competent authorities and the national central banks of the SSM. As less significant banks are subject to supervision by the authorities at the national level, the BCL continues to supervise liquidity risk of banks established in Luxembourg, in cooperation with the Commission de surveillance du secteur financier (CSSF).

Within the JST, as well as in the context of the supervision of less significant banks, the BCL conducts the annual assessments of banks' liquidity risk as part of the Supervisory Review and Evaluation Process (SREP) in order to determine the adequacy of their liquidity risk management and liquidity resources. In response to the COVID-19 pandemic, the ECB decided to take a pragmatic approach in 2020 for the SREP of significant banks. With regard to the liquidity related part of the SREP, the analysis focused on the ability of banks to address the challenges and risks to their liquidity posed by the pandemic. Thus, the JSTs have monitored on an on-going basis the liquidity situation of the banks through regular exchanges. In addition, the BCL has continued to carry out recurring tasks such as controlling the prudential liquidity reporting and monitoring the overall liquidity situation of banks.

In addition to the liquidity supervision tasks, the BCL is also represented, jointly with the CSSF, on the Supervisory Board, which plans and carries out the supervisory tasks of the SSM and proposes draft decisions for adoption by the Governing Council. In this context, a coordination unit has been set up at BCL to ensure the follow-up of files and draft decisions submitted to the Supervisory Board and the Governing Council of the ECB. In 2020, the coordination unit processed more than 1,400 written procedures submitted for decision and prepared the meetings of the Supervisory Board.

Within the framework of the SSM, the BCL also participates in the work of various groups and committees established at the ECB. These groups and committees assist the Supervisory Board in its decision-making.

1.7.2.1.2 Tools for liquidity supervision

In addition to the supervisory work carried out within the framework of the SSM, the BCL conducts ongoing monitoring of credit institutions at national level. This monitoring is based on the regular analysis of qualitative and quantitative information at the level of individual credit institutions and aggregate level. In order to monitor the liquidity situation of market participants on a daily basis, BCL has set up a daily reporting on the liquidity situation of credit institutions since 2010. This reporting is mainly required for large credit institutions and credit institutions that act as counterparties in monetary policy.

Based on a database containing the historical data included in the daily liquidity reporting, BCL has developed an analytical tool to assess the short-term liquidity situation of credit institutions and changes in the liquidity situation over time and on an individual basis. At the same time, BCL has developed an analytical tool to assess credit institutions' liquidity vulnerabilities on an individual level, but also to identify liquidity risks at the aggregate level.

In addition, information from the prudential and statistical reporting are summarised for each supervised entity in the form of single dashboards. Particular attention is paid to the liquidity standards, the Liquidity Coverage Ratio (LCR) and the Net Stable Funding Ratio (NSFR). These reports are mandatory for all credit institutions on an individual and consolidated basis. In accordance with the delegated act stipulating specifications for the LCR and details of its phasing-in period, the LCR became a binding standard on 1 October 2015. The minimum requirement to cover liquidity needs is 100% as from 1 January 2018. In accordance with the CRR II and CRD V legislation published in June 2019, the minimum NSFR requirement is set at 100% and is applicable since 28 June 2021. Since the beginning of 2015, credit institutions have been submitting quarterly prudential reporting on asset encumbrance. Since April 2016, a monthly prudential reporting on additional liquidity monitoring elements is also required. BCL carries out checks on these reports submitted by significant and less significant banks.

Following the introduction of the above-mentioned prudential liquidity reporting, automated tools for processing and analysing this data were put in place. The objective is to provide supervisors with analytical functionalities to facilitate an effective and efficient assessment of the banks liquidity situation in the supervisory process. Thus, these tools enable supervisors to detect potential liquidity problems at an institution that may arise from a negative trend in a reported item or from general trend in absolute terms.

Finally, a daily report mentioning certain financial market indicators has also been developed. All of these tools make it possible to carry out the necessary analyses as part of the BCL's supervisory role with regard to liquidity.

1.7.2.1.3 National and international cooperation

BCL participates in the working groups dedicated to liquidity at the level of the Basel Committee and the European Banking Authority (EBA). It is also represented on the Board of Supervisors of the EBA as well as on other committees and subgroups that are relevant in the context of its supervisory mission. As a general rule, BCL's involvement in these committees and working groups is carried out jointly with the CSSF.

In addition, the Director General of the BCL is a member of the Resolution Board, the Council for the Protection of Depositors and Investors, the Resolution Fund and the Luxembourg Deposit Guarantee Fund.

1.7.2.2 Oversight of payment and settlement infrastructures

The oversight of market infrastructures and the promotion of the smooth functioning of payment and securities settlement infrastructures are essential tasks of the ESCB because of the important role of these infrastructures in the implementation of monetary policy and in preserving financial stability and public confidence in the currency.

The TFEU and the Statutes of the ESCB contain a number of provisions relating to payment systems and assign oversight responsibilities to the Eurosystem. At national level, in line with the provisions of the Law of 23 December 1998 on the monetary status and the Banque centrale du Luxembourg, the BCL is responsible

for ensuring the safety and efficiency of payment and securities settlement systems and the security of payment instruments.

In this regard, BCL Regulation 2016/No 21 of 15 January 2016 sets out, inter alia, the general framework for oversight as well as the obligations of system operators, issuers of payment instruments and governance authorities, and specifies the modalities for carrying out the oversight activity. The Regulation also specifies that the BCL conducts its oversight activity on the basis of quantitative and qualitative information of variable nature, collected on a regular or ad hoc basis from the concerned entities. This information is supplemented by regular meetings and, where appropriate, on-site visits, as well as regular self-assessments by relevant actors of the degree of compliance of their infrastructure with the applicable recommendations, standards or principles, as defined by the Eurosystem and adopted by the Governing Council of the ECB. The information collected concerns in particular the development of the infrastructures' activities, their performance, their governance and the risk management. In this context, the BCL coordinates and closely cooperates with the CSSF.

In addition to the oversight of systems and infrastructures operating in Luxembourg and of payment instruments made available to the public in Luxembourg, the BCL also contributes to oversight activities carried out jointly at the Eurosystem level, targeting in particular infrastructures and payment instruments with a pan-European dimension and no clear domestic anchorage. Finally, the BCL also participates in Eurosystem activities aimed at strengthening the resilience of infrastructures to cyber threats.

Apart from some delays in service provision and a partially reduced settlement efficiency during the peak of the pandemic due to unusual processing volumes, the market infrastructures operated in a stable and resilient manner in 2020. No major operational incident related to the pandemic situation was recorded.

Payment systems

Through its participation in committees and working groups, the BCL contributed to the oversight activities of the TARGET2 payment system managed by the Eurosystem and of the EURO1 and STEP2 payment systems managed by EBA Clearing. The oversight activities relating to these systems are carried out jointly at the Eurosystem level, under the coordination of the ECB acting as the competent authority.

In 2020, the Eurosystem oversight of TARGET2 focused on the assessment of the ongoing performance of the system and the changes introduced, as well as on assessing the level of cyber resilience. In addition, the surveillance covered some operational incidents that affected the TARGET services (TARGET2 and T2S), in order to assess their consequences and the measures taken to prevent their recurrence. The monitoring of operational performance will remain a priority for the Eurosystem oversight in the coming year.

Furthermore, in addition to the joint oversight activities of TARGET2 at the Eurosystem level, the BCL conducted an oversight of certain decentralised aspects of the system in Luxembourg (TARGET2-LU), such as the local technical components enabling the BCL's connectivity to the single platform and the contractual framework between the BCL and the participants in Luxembourg.

Moreover, following the identification of Mastercard Clearing Management System as a systemically important payment system, the BCL joined the Eurosystem oversight group, led by the ECB and the National Bank of Belgium (NBB), in order to contribute to the joint oversight activities.

Securities settlement systems

In 2020, the BCL oversight of securities settlement systems covered the activities and functioning of the systems operated in Luxembourg by Clearstream Banking S.A. and LuxCSD S.A. In this respect, the BCL monitored the day-to-day functioning of these infrastructures as well as the development of their activities and the risks to which they have been exposed through the analysis of information obtained monthly from the operators and the participation in meetings and teleconferences. In addition, the BCL took an interest in the contingency measures put in place by the operators of these systems during the pandemic crisis and closely followed related developments.

In addition, during 2020, the main recommendations arising from the assessments of the system operated by Clearstream Banking S.A. against the CPMI-IOSC0 76 principles carried out by the BCL, in cooperation with the CSSF, and by the International Monetary Fund (IMF), were also closed.

Furthermore, pursuant to its responsibility for overseeing securities settlement systems in Luxembourg, the BCL continued, in close cooperation with the CSSF, its review of the authorisation file submitted by Clearstream Banking S.A. under European Regulation (EU) No 909/2014⁷⁷, with a view to its authorisation as a central securities depository. In this context, the BCL participated in thematic meetings organised by the CSSF, in its capacity as competent authority, with the respective operator and conveyed its observations on the compliance of the submitted files. In addition, following the declaration by the CSSF of the completeness of Clearstream Banking S.A.'s authorisation file on 12 October 2020 and the subsequent formal consultation of the BCL, as the representative of the Eurosystem in its capacity as central bank of issue for the euro and as the authority responsible for overseeing the system, the BCL has prepared three detailed opinions. These opinions related to the authorisation of Clearstream Banking S.A. for (i) the provision of core and non-banking type ancillary services, (ii) the provision of banking-type ancillary services and (iii) the interoperable link between Clearstream Banking S.A. and Euroclear Bank S.A./N.V. These opinions describe the Eurosystem's views on the features of the securities settlement system operated by Clearstream Banking S.A. and were transmitted to the CSSF at the end of 2020, following approval by the Governing Council.

Moreover, regarding the authorisation file of LuxCSD S.A., on 15 April 2020 the CSSF formally authorised LuxCSD S.A. to operate as a central securities depository pursuant to Article 16 of the European Regulation (EU) No 909/2014 and thereby to provide core and non-banking type ancillary services within the framework of the aforementioned Regulation. Following this authorisation, the BCL, in cooperation with the CSSF, monitored the progress made by LuxCSD S.A. to remedy the weaknesses identified in the opinion describing the views of the Eurosystem transmitted by the BCL to the CSSF in early 2020. In this respect, the BCL will prepare (in early 2021) an opinion for the annual review and evaluation of LuxCSD S.A., pursuant to Article 22 of the above-mentioned EU Regulation.

For the purpose of the oversight of securities settlement systems, the BCL also continued its cooperation with certain other central banks and supervisory authorities. In particular, it cooperated with the NBB, according to the Memorandum of Understanding signed in December 2017 between the BCL, the NBB and the CSSF, on aspects of common interest relating to the interoperable link between the securities settlement systems operated by Clearstream Banking S.A. and Euroclear Bank S.A./N.V. The BCL also continued its cooperation with the Czech National Bank under the Memorandum of Understanding signed between the two central banks in July 2009 regarding the oversight of the activities of Clearstream Operations Prague s.r.o., an entity to which operational processes of Clearstream Banking S.A. and Clearstream Services S.A. (Clearstream Banking S.A.'s technical agent) have been outsourced.

Regarding the Target2-Securities (T2S) settlement platform, which offers harmonised securities settlement services in central bank money in euro and other currencies, the BCL, in collaboration with the ECB and the other national central banks of the Eurosystem, monitored the progress made by the operator to address the weaknesses identified in the assessment carried out in 2019 of the platform's compliance with the CPMI-IOSCO principles applicable to market infrastructures. In addition, the BCL followed the outcome of the assessment by the ECB of the penalty mechanisms put in place by T2S to comply with the settlement discipline requirements. The settlement discipline measures will come into effect in February 2022.

Finally, the BCL contributed to the work on the T2S Cooperative Arrangement. This cooperative arrangement is composed of the ECB, the national central banks in charge of overseeing securities settlement systems participating in T2S, the central banks issuing currencies settled in T2S, the authorities responsible for the prudential supervision of central securities depositories participating in T2S and the European Securities and Markets Authority. It aims to enable these authorities to collect information, consult each other and coordinate their assessments and tasks in order to optimise and avoid inconsistencies in the oversight of central securities depositories that have migrated to T2S.

⁷⁶ CPMI: Committee on Payments and Market Infrastructures; IOSCO: International Organization of Securities Commissions.

⁷⁷ Regulation (EU) No 909/2014 of the European Parliament and of the Council of 23 July 2014 on improving securities settlement in the European Union and on central securities depositories, and amending Directives 98/26/EC and 2014/65/EU and Regulation (EU) No 236/2012.

Cyber resilience

Through its participation in various working groups, the BCL contributed to the implementation of the Eurosystem strategy for the cyber resilience of market infrastructures. This strategy aims to enhance the cybersecurity maturity of market infrastructures, so to increase the cyber resilience of the financial sector as a whole.

During the year 2020, the BCL continued its reflection, in cooperation with the CSSF, targeting the adoption of the TIBER-EU⁷⁸ testing framework in Luxembourg. Informal discussions were held with the CSSF with a view to a possible joint adoption of this framework by the BCL and the CSSF.

Furthermore, the BCL required a self-assessment of the securities settlement system operators Clearstream Banking S.A. and LuxCSD S.A. against the Eurosystem's expectations for cyber resilience oversight, known as CROE⁷⁹. These expectations were published by the ECB in December 2018 and are based on the CPMI-IOSCO guidelines for cyber resilience of market infrastructures. In this context, BCL conducted a detailed assessment of the level of cyber resilience maturity of both systems. Discussions will be held in early 2021 with the operators of these infrastructures in order to follow up on the recommendations in this regard.

As part of the Eurosystem's oversight activities, the BCL also took part in exercises to assess the TARGET2 system and the T2S platform against the CROE expectations. This work should be completed in the first quarter of 2021.

The oversight in the field of cyber resilience is also exercised through the participation of the BCL in the ECRB⁸⁰, along with six other Eurosystem central banks. In 2020, the CIISI-EU⁸¹, an initiative to set up a platform for the exchange and sharing of electronic information and intelligence, was formally launched. The BCL intends to continue its participation in this project.

Payment Instruments

Payment instruments include, among others, credit transfer, direct debit, payment card and electronic money schemes issued and/or used by the public in Luxembourg.

In 2020, the BCL followed the evolution of the issuers' activities as well as the payment solutions in Luxembourg and took an interest in the developments in this area, especially in the security aspects. BCL's oversight was based on the analysis of qualitative and quantitative information collected from the concerned entities. The BCL also carried out its oversight by means of specific information gathered during exchanges with certain entities.

The pandemic in 2020 resulted in an increase in card payments for e-commerce transactions as well as a greater use of contactless card payments due, among other things, to the increase of the contactless payment limit by Mastercard and VISA in Luxembourg to 50 euros. Notwithstanding the increase in payment volumes, the payment card schemes did not experience any major operational incident related to the pandemic in Luxembourg.

Furthermore, at Eurosystem level, the BCL contributed to the work of the joint evaluation group for the international card payment scheme VISA. The BCL also contributed to the drafting of a follow-up report on the degree of implementation of the recommendations resulting from the assessments of the SEPA⁸² direct debit, credit transfer and instant credit transfer schemes, which was coordinated within the Eurosystem. Finally, the BCL actively participated in the review of the Eurosystem framework for the oversight of electronic payment instruments, schemes and arrangements (PISA⁸³), which was submitted to a two-month public consultation in November and December 2020. The new oversight framework is expected to be finalised and published in 2021. The BCL also contributed to the sixth Eurosystem report on payment card fraud published in August 2020.

⁷⁸ Threat Intelligence-based Ethical Red Teaming.

⁷⁹ Cyber Resilience Oversight Expectations for financial market infrastructures.

⁸⁰ Euro Cyber-Resilience Board.

⁸¹ Cyber Information and Intelligence Sharing Initiative.

⁸² Single Euro Payments Area (SEPA).

⁸³ Payment Instruments, Schemes and Arrangements.

In addition, the BCL actively contributed to the work of the European Forum on Retail Payment Security (SecuRe Pay), co-chaired by the ECB and the EBA (European Banking Authority). The aim of this forum is to facilitate a common understanding between the central banks responsible for the oversight of payment instruments and the authorities in charge of the prudential supervision of the payment service providers, on topics relating to the security of retail payments in the EU. The BCL also continued its participation in the experts' network in the context of EBA's question-and-answer tool on the Payment Services Directive (PSD284) for the questions relating to the security of payment instruments. Finally, in 2020, the BCL collected statistics on fraud within the framework of PSD2, pursuant to an operational collaboration set up with the CSSF.

1.8 REGULATORY AND LEGISLATIVE DEVELOPMENTS

1.8.1 European legislation

The Banque centrale du Luxembourg (BCL) follows with particular interest the European and national legislation developments that are relevant for the Eurosystem and relate to the deepening of the Economic and Monetary Union (EMU), in particular those concerning the Banking Union, the Capital Markets Union⁸⁵ and economic governance.

1.8.1.1 Banking Union

The Banking Union is based on three pillars: the Single Supervisory Mechanism (SSM⁸⁶) since 4 November 2014, the Single Resolution Mechanism (SRM⁸⁷) since 1 January 2016 and the European Deposit Insurance Scheme (EDIS⁸⁸). This last pillar has not been completed yet.

The year 2020 was marked by the COVID-19 pandemic and the objective of European banking supervision was to ensure that banks could continue to provide financial support to households, small businesses and corporations.

1.8.1.1.1 Prudential supervision

SSM Scope

The geographical scope of the SSM covers the Members States whose currency is the euro, as well as Member States of the European Union (EU) outside of the euro area, which are subject to the banking supervision of the European Central Bank (ECB) on a voluntary basis, under a regime of close cooperation⁸⁹.

EU Member States whose currency is not the euro can participate in the SSM by requesting close cooperation between the ECB and their competent national authority (NCA).

In 2020, the ECB established close cooperation with the Bulgarian National Bank (Българска народна банка) and the Croatian National Bank (Hrvatska narodna banka).

The establishment of close cooperation with Bulgaria and Croatia increased the size of the SSM, bringing the total number of participating EU Member States to 21.

Representatives of the two NCAs have been appointed to the Supervisory Board, with the same rights and obligations as all other members. The direct supervision of the significant institutions of these two Member States started on 1 October 2020.

⁸⁴ Directive (EU) 2015/2366 of the European Parliament and of the Council of 25 November 2015 on payment services in the internal market, amending Directives 2002/65/EC, 2009/110/EC and 2013/36/EU and Regulation (EC) No 1093/2010, and repealing Directive 2007/64/EC.

⁸⁵ In French, l'Union des marchés de capitaux.

⁸⁶ In French, le Mécanisme de surveillance unique (MSU).

⁸⁷ In French, le Mécanisme de résolution unique (MRU).

⁸⁸ In French, le Système européen d'assurance des dépôts (SEAD).

⁸⁹ Article 7 of Council Regulation (EU) No 1024/2013 of 15 October 2013 conferring specific tasks on the European Central Bank concerning policies relating to the prudential supervision of credit institutions (the 'SSM Regulation').

SSM supervised entities

At euro area level, the number of institutions subject to the direct prudential supervision of the ECB has slightly decreased to 115 significant institutions as of 30 November 2020, compared to 117 in 2019.

The number of significant institutions having their registered office in Luxembourg remained constant in 2020. The five institutions under the direct supervision of the ECB are:

- Banque et Caisse d'Épargne de l'État, Luxembourg;
- Banque Internationale à Luxembourg S.A.;
- J.P. Morgan Bank Luxembourg S.A.;
- Precision Capital S.A.;
- RBC Investor Services Bank S.A.

SSM Governance

The Governing Council is the ultimate decision-making body of the ECB in the area of prudential supervision of credit institutions.

In addition, the SSM Regulation provides for the creation, within the ECB, of a Supervisory Board responsible for preparing draft decisions on banking supervisory matters. It is notably composed of one representative of each national competent authority and, where the national central bank (NCB) is not the national competent authority, by one representative of the NCB in addition to one from the supervisory authority. It is composed of 34 members, including one member from the BCL.

In October 2020, the Supervisory Board welcomed two new members following the establishment of close cooperation with Bulgaria and Croatia.

This internal body of the ECB held 24 meetings in 2020, mainly by videoconference.

During 2020, the Governing Council adopted the majority of its prudential decisions by written procedures, based on "complete draft decisions" proposed by the Supervisory Board and according to a non-objection procedure. Banking supervision decisions in the field of macro-prudential supervision are not taken according to the non-objection procedure and the Governing Council may amend the draft decisions proposed by the Supervisory Board. In addition, the non-objection procedure does not apply when it comes to determining the general framework governing practical arrangements for cooperation within the SSM, which falls within the remit of the decision-making bodies of the ECB, i.e. the Governing Council and the Executive Board.

Joint Supervisory Teams

Joint Supervisory Teams (JSTs⁹⁰) are the main operational structure responsible for conducting the SSM supervision. Pursuant to the SSM Framework Regulation⁹¹, the BCL participates in the JSTs of significant institutions having their registered office in Luxembourg, as well as in some JSTs of significant banks established in other SSM Member States, which have subsidiaries in Luxembourg.

⁹⁰ In French, équipes de surveillance prudentielle conjointes.

⁹¹ Regulation (EU) No 468/2014 of the European Central Bank of 16 April 2014 establishing the framework for cooperation within the Single Supervisory Mechanism between the ECB and national competent authorities and with national designated authorities.

1.8.1.1.2 The resolution of banks

The SRM⁹² is the second pillar of the Banking Union. It provides for a harmonised crisis management regime based on the Directive establishing a framework for the recovery and resolution of credit institutions and investment firms (BRRD)⁹³. It offers a centralised European institutional framework for the resolution of significant banks and cross-border groups in the Member States participating in the SSM⁹⁴.

The SRM area corresponds to the SSM area, including the euro area.

The SRM is based on a Single Resolution Board (SRB%) and a Single Resolution Fund (SRF%). As the European resolution authority for the Banking Union, the SRB is responsible for preparing and enforcing the resolution of banks that are failing or likely to fail%, in cooperation with the national resolution authorities of participating Member States. Moreover, the SRB signed a cooperation agreement with the ECB in 2015. The SRB has its seat in Brussels and is composed of six full-time members.

As regards the SRF, it is established under the control of the SRB to guarantee the availability of funding, in the medium-term, in case of restructuring of a credit institution. This fund is set up through bank contributions, which initially take place at national level.

An intergovernmental agreement on the transfer and mutualisation of the contributions to the SRF, signed on 21 May 2014, provides, in relation to banks covered by the SRM, for the progressive transfer of the existing national resolution funds to the SRF, during a transition period. The contributions of banks are allocated to different compartments corresponding to each participating Member State. According to the terms of the agreement, those compartments will be subject to a progressive mutualisation, so that they are merged at the end of the transition period.

In the context of a reform of the European Stability Mechanism (ESM), it has also been agreed to establish a common safety net for the SRF. Work on this reform continued in 2020⁹⁸. The ESM's new tasks include providing a backstop to the SRF, expected to enter into force at the beginning of 2022.

1.8.1.1.3 Deposit protection

Concerning the third pillar of the Banking Union, namely the European Deposit Insurance Scheme (EDIS⁹⁹), on 24 November 2015 the European Commission published a proposal¹⁰⁰ for a regulation aimed at establishing in three consecutive phases a fully-fledged EDIS by 2024.

This third pillar of the Banking Union has not progressed during 2020.

The EDIS would help increase depositors' confidence and ensure a level playing field for all banks in the Banking Union, hence contributing to greater financial stability in the euro area as a whole.

⁹² Regulation (EU) No 806/2014 of the European Parliament and the Council of 15 July 2014 establishing uniform rules and a uniform procedure for the resolution of credit institutions and certain investment firms in the framework of a Single Resolution Mechanism and a Single Resolution Fund and amending Regulation (EU) No 1093/2010 (the "SRM Regulation").

⁹³ Directive 2014/59/EU of the European Parliament and of the Council of 15 May 2014 establishing a framework for the recovery and resolution of credit institutions and investment firms and amending Council Directive 82/891/EEC, and Directives 2001/24/EC, 2002/47/ EC, 2004/25/EC, 2005/56/EC, 2007/36/EC and 2011/35/EC, 2012/30/EU and 2013/36/EU, and Regulations (EU) No 1093/2010 and (EU) No 648/2012 of the European Parliament and the Council.

⁹⁴ The legislative measures adopted by EU ambassadors in February 2019 on a revised set of rules to reduce risks in the EU banking sector also include amendments to the SRM Regulation and the BRRD.

⁹⁵ In French, Conseil de résolution unique (CRU)

⁹⁶ In French, Fonds de résolution unique (FRU).

⁹⁷ In French, défaillance prévisible ou avérée.

⁹⁸ On 27 January 2021, the ESM member countries signed the Agreement Amending the ESM Treaty, which provides a legal basis for a set of new tasks assigned to the ESM.

⁹⁹ In French, Système européen d'assurance des dépôts (SEAD).

¹⁰⁰ Proposal for a Regulation of the European Parliament and of the Council amending Regulation (EU) 806/2014 in order to establish a European Deposit Insurance Scheme, 24.11.2015, COM(2015) 586 final, 2015/0270 (COD).

To encourage progress in the ongoing negotiations at European Parliament and Council level, the Commission, in its Communication of 11 October 2017¹⁰¹ on completing the Banking Union, suggested some possible alternatives with regard to the phases and timeline of the EDIS¹⁰². However, the discussions of the Council and the European Parliament on the Commission's proposal are still pending.

This third pillar of the Banking Union is supported by the Eurosystem.

1.8.1.2 Economic governance

In 2020, discussions on deepening EMU continued, in particular on the completion of the Banking Union and the reform of the European Stability Mechanism (ESM). In February 2020, the European Commission launched a review of the economic governance framework and launched a public debate on its future. However, this process was interrupted due to the COVID-19 related health and economic crisis, which has created new challenges.

Support instruments during the COVID-19 pandemic

The health crisis has had a very significant economic impact, which was in particular reflected in an increase of public deficit and debt ratios not only for 2020, but also for subsequent years. This unprecedented and exceptional situation led the "Economic and Financial Affairs" Council of the Union ("Ecofin") to agree on 23 March 2020 to the Commission's proposal to activate the severe economic downturn clause ("general escape clause") of the Stability and Growth Pact for the year 2020¹⁰³. It remains activated for 2021.

Alongside the measures adopted in the euro area by the Eurosystem (such as the implementation of the pandemic emergency purchase programme (PEPP) and the third series of Targeted longer-term refinancing Operations (TLTRO III)¹⁰⁴) fiscal support has been provided by Member States to different sectors of their economy, including in Luxembourg (the economic stabilisation and recovery programme), complemented by stabilising and recovery measures decided at European level.

More specifically, in Luxembourg, a plan to stabilise the economy was presented on 25 March 2020, which was supplemented by additional measures as well as a recovery plan "Neistart Lëtzebuerg", presented on 20 May 2020, which focuses on a sustainable recovery of the Luxembourg economy. The stabilisation plan includes additional expenditure, payment deferrals and the granting of guarantees or loans to companies¹⁰⁵.

At European level, the main stabilisation and recovery measures adopted in 2020 are as follows:

- On 9 April 2020, the Eurogroup approved a report on a comprehensive economic response to the COVID-19 crisis, composed of a set of measures intended for sovereigns, companies and individuals up to EUR 540 billion. It was endorsed by the European Council on 23 April 2020 and comprises the following three safety nets:
 - (i) A "Pandemic Crisis Support" by the ESM, based on its "Enhanced Conditions Credit Line" and available to all Member States of the euro area.

Following its approval by the Governing Council of the ESM in May 2020, this support can be used until 31 December 2022, with an overall lending ceiling at the euro area level of EUR 240 billion.

¹⁰¹ Communication to the European Parliament, the Council, the European Central Bank, the European Economic and Social Committee and the Committee of the Regions of 11 October 2017 on completing the Banking Union (COM(2017) 592 final).

¹⁰² The Communication envisages a more gradual introduction of EDIS compared with the original proposal of November 2015. There would be only two phases: a more limited reinsurance phase and, subsequently, coinsurance. However, moving to this second phase would be conditional on achieving progress in reducing risks.

¹⁰³ The clause was introduced as part of the 'Six-Pack' reform of the Stability and Growth Pact in 2011 and allows under certain conditions a temporary deviation from its rules under its preventive and corrective part, as defined in Council Regulation (EC) No 1466/97 of 7 July 1997 on the strengthening of the surveillance of budgetary positions and the surveillance and coordination of economic policies and Council Regulation (EC) No 1467/97 of 7 July 1997 on speeding up and clarifying the implementation of the excessive deficit.

¹⁰⁴ See Chapter 1.1.2.2 for details.

¹⁰⁵ See for details on the national and European stabilisation measures, Bulletin BCL 2021-1, pp. 173 ss.

Member States of the euro area were declared eligible by the Commission, in collaboration with the ECB and the ESM, on 6 May 2020.

By way of derogation from the usual conditionality regime of the ESM, the borrowed funds are subject to the condition that they must be used for public expenditure directly or indirectly related to the health crisis.

(ii) A "Pan-European Guarantee Fund" (EGF) established by the European Investment Bank Group (EIB).

This Fund is not established as a separate legal entity but the governance structures of the EIB Group remain applicable to EGF operations. The EGF aims to enhance support for small and medium-sized enterprises and other actors in the real economy by mobilising up to EUR 200 billion.

Financing by the Member States of the Union takes the form of state guarantees of EUR 25 billion, in proportion to their share in the EIB's capital. The Government has been authorised to grant a State guarantee to the EIB for a maximum amount of EUR 45 million¹⁰⁶.

The EGF has been operational since October 2020.

(iii) An "European instrument for temporary support to mitigate unemployment risks in an emergency" (SURE).

The financial assistance shall take the form of a loan granted by the Union to the Member State concerned to address sudden increases in public expenditure for the preservation of employment (such as support of short-time work schemes and similar measures). To that end, the Commission has been empowered to borrow up to EUR 100 billion on capital markets. The contribution of the Member States takes the form of guarantees, with a maximum amount of $\[mathbb{C}25\]$ billion, for loans granted from the Union budget. Before calling on these guarantees, the Commission should take advantage of the margin in payment appropriations available under the own resources ceiling, as specified in the Regulation establishing the SURE instrument¹⁰⁷.

The Government has been authorised to grant a State guarantee for a maximum amount of EUR 105 million¹⁰⁸.

The ECB is responsible for the administration of the borrowing and lending operations of the EU under SURE. It delivered its Opinion on 8 May 2020¹⁰⁹.

The first issue under the SURE programme took place in October 2020 and is governed by Luxembourg law¹¹⁰. Luxembourg did not request support under this programme.

 On 21 July 2020, the European Council agreed on a European recovery plan, following a proposal by the Commission in May 2020. It is understood as a temporary recovery instrument within the EU Budget ("Next Generation EU") of EUR 750 billion, as well as targeted reinforcements to the Multiannual Financial Framework (MFF) for 2021-2027.

¹⁰⁶ Article 2 of the Law of 20 June 2020 relating to the granting of the State guarantee within the framework of the instruments put in place at European Union level to mitigate the socio-economic consequences of Covid-19.

¹⁰⁷ Council Regulation (EU) 2020/672 of 19 May 2020 on the establishment of a European instrument for temporary support to mitigate unemployment risks in an emergency (SURE) following the Covid-19 outbreak.

¹⁰⁸ Article 1 of the Law of 20 June 2020 relating to the granting of the State guarantee within the framework of the instruments put in place at European Union level to mitigate the socio-economic consequences of Covid-19.

¹⁰⁹ ECB Opinion of 8 May 2020 (CON/2020/14). All ECB Opinions are published on the ECB website: www.ecb.europa.eu.

¹¹⁰ In October 2020, the Commission announced that all bond issuances under the SURE would be issued as social bonds, under its "Social Bond Framework". The first EU social bond issuance of EUR 17 billion under the EU SURE programme is listed at the Luxembourg Stock Exchange and displayed on the Luxembourg Green Exchange.

Under the "Next Generation EU" programme the Commission shall be empowered, by a revision of the Own Resources Decision¹¹¹ with a need of ratification by Member States¹¹², to borrow funds on behalf of the Union on the capital markets up to an amount of EUR 750 billion. These funds will be transferred to Union programmes in accordance with the "Next Generation EU" programme to address the consequences of the Covid-19 crisis, among which the Recovery and Resilience Facility of EUR 672.5 billion composed of grants and loans.

This Facility aims to support Member States in reforms and investments, in line with the Union's political priorities, with the aim of mitigating the economic and social impact of the pandemic and make European economies and societies more sustainable, resilient and better prepared for the challenges and opportunities of the green and digital transitions.

Member States are expected to address country-specific recommendations specified annually under the European Semester. They need to prepare national recovery and resilience plans that shall include the objectives of the green and digital transitions and be integrated in the coordination process under the European Semester.

In December 2020, the European Parliament and the Council adopted the MFF and reached an agreement on the Recovery and Resilience Facility¹¹³.

The borrowings by the EU under SURE and the "Next Generation EU" programme are designed as temporary instruments.

European Stability Mechanism

During 2020, the reform of the ESM was ongoing.

It implies the further development of the ESM instruments, the strengthening of the role of the ESM in the context of financial assistance programmes as well as the establishment of a Common backstop¹¹⁴ for the Single Resolution Fund.

The Eurogroup of 30 November 2020 agreed to proceed with the reform, to sign the revised Treaty in January 2021 and launch the ratification process.

Capital Markets Union

Despite progress in finalising the implementation of the 2015 Action Plan, national capital markets remain fragmented.

The Eurosystem called for required efforts with the objective of advancing the Capital Markets Union, in particular with regard to the challenges the EU is facing, such as the crisis caused by the COVID-19 pandemic. They comprise the need for funding to sustain the economic recovery, addressing the withdrawal of the United Kingdom of Great Britain and Northern Ireland from the EU, the transition to a low-carbon economy and increasing the international role of the euro.

Benefiting from the work of the High-Level Forum on Capital Markets Union under the chairmanship of Mr Thomas Wieser, the Commission presented its Communication with a new action plan on 24 September 2020.

¹¹¹ Council Decision (EU, Euratom) 2020/2053 of 14 December 2020 on the system of own resources of the European Union and repealing Decision 2014/335/EU, Euratom. It provides for a temporary lifting of the own resources ceiling to 2.00% of EU Gross National Income.

¹¹² A bill (Parliamentary File 7770) was introduced on 19 February 2021.

¹¹³ The Regulation of the European Parliament and of the Council establishing the Recovery and Resilience Facility has been published in the Official Journal of the European Union (OJ L 57, 18 February 2021, p. 17) and entered into force on 19 February 2021.

¹¹⁴ In French: Filet de sécurité.

Moreover, targeted amendments to the EU rules governing capital markets were proposed by the Commission to support the economic recovery from the COVID-19 crisis, which were endorsed in December 2020 by the Council. Legislative changes include amendments to the markets in financial instruments directive, the prospectus regulation and the EU securitisation framework.

1.8.1.3 ECB Legal Acts

The ECB has adopted several legal acts, which have been published in the Official Journal of the European Union

Monetary policy

In the field of monetary policy, the ECB has, in particular, adopted the following legal acts:

- Guideline (EU) 2020/1690 of the European Central Bank of 25 September 2020 amending Guideline (EU) 2015/510 on the implementation of the Eurosystem monetary policy framework (ECB/2020/45)¹¹⁵;
- Guideline (EU) 2020/1692 European Central Bank of 25 September 2020 amending Guideline (EU) 2016/65 on the valuation haircuts applied in the implementation of the Eurosystem monetary policy framework (ECB/2020/46)¹¹⁶;
- Guideline (EU) 2020/1691 European Central Bank of 25 September 2020 amending Guideline (EU) 2014/31 on additional temporary measures relating to Eurosystem refinancing operations and eligibility of collateral (ECB/2020/47)¹¹⁷.

The ECB has, by adopting the three above-listed guidelines, amended the legal framework for the implementation of the Eurosystem monetary policy. Hence:

- secured marketable assets other than asset-backed securities and covered bonds will no longer be accepted as Eurosystem collateral;
- non-legislative covered bonds will be progressively phased-out from the Eurosystem collateral framework;
- the application process and acceptance criteria applicable to external credit assessment institutions in the context of the credit assessment framework has been clarified; and
- the Eurosystem monetary policy counterparty framework with respect to the treatment of breaches to the obligation to report information on capital ratios within the required deadlines, has been amended.

The following Legal Acts were all adopted in response to the COVID-19 pandemic:

- Decision (EU) 2020/1264 of the European Central Bank of 8 September 2020 amending Decision (EU) 2019/1743 of the European Central Bank on the remuneration of holdings of excess reserves and of certain deposits (ECB/2020/38)¹¹⁸;
- Decision (EU) 2020/1143 of the European Central Bank of 28 July 2020 amending Decision (EU) 2020/440 on a temporary pandemic emergency purchase programme (PEPP) (ECB/2020/36)¹¹⁹;

¹¹⁵ OJ L 379, 13.11.2020, p. 77-91.

¹¹⁶ OJ L 379, 13.11.2020, p. 94-95.

¹¹⁷ JOL 379, 13.11.2020, p. 92-93.

¹¹⁸ OJ L 297, 11.9.2020, p. 5-6.

¹¹⁹ OJ L 248, 31.7. 2020, p. 24-25.

- Guideline (EU) 2020/634 of the European Central Bank of 7 May 2020 amending Guideline ECB/2014/31 on additional temporary measures relating to Eurosystem refinancing operations and eligibility of collateral (ECB/2020/29)¹²⁰;
- Decision (EU) 2020/614 of the European Central Bank of 30 April 2020 amending Decision (EU) 2019/1311 on a third series of targeted longer-term refinancing operations (TLTRO III) (ECB/2020/25)¹²¹;
- Decision (EU) 2020/440 of the European Central Bank of 24 March 2020 on a temporary pandemic emergency purchase programme (PEPP) (ECB/2020/17)¹²²;
- Decision (EU) 2020/441 of the European Central Bank of 24 March 2020 amending Decision (EU) 2016/948 on the implementation of the corporate sector purchase programme (CSPP) [ECB/2020/18]¹²³;
- Decision (EU) 2020/407 of the European Central Bank of 16 March 2020 amending Decision (EU) 2019/1311 on a third series of targeted longer-term refinancing operations (TLTRO III) (ECB/2020/13)¹²⁴.

The main purposes of these amendments are to:

- exempt from negative interest rate the accounts maintained with the ECB under the instrument for temporary Support to mitigate Unemployment Risks in an Emergency (SURE);
- set out the technical parameters of the PEPP and expansion of the range of eligible assets under the CSPP to non-financial commercial papers;
- increase the size of the PEPP and extend the intended horizon of net purchases;
- implement the collateral easing measures decided by the Governing Council on 22 April 2020;
- change parameters of TLTRO III in order to support bank lending to those most affected by the spread of COVID-19 and introduce further technical changes in the TLTRO III parameters.

¹²⁰ OJ L 148, 11.5.2020, p. 10-15.

¹²¹ OJ L 141, 5.5.2020, p. 28-36.

¹²² OJ L 91, 25.3.2020, p. 1-4.

¹²³ OJ L 91, 25.3.2020, p. 5-6.

¹²⁴ OJ L 80, 17.3.2020, p. 23-24.

In the field of statistics, the ECB has, in particular, adopted the following legal acts:

• Regulation (EU) 2020/2011 of the European Central Bank of 1 December 2020 amending Regulation (EU) 1409/2013 on payment statistics (ECB/2013/43)¹²⁵.

These amendments address a need for additional payments statistics in order to ensure that the ECB effectively performs its oversight tasks.

Guideline (EU) 2020/1552 of the European Central Bank of 14 October 2020 amending Guideline ECB/2013/23 on government finance statistics (ECB/2020/50)¹²⁶, Guideline (EU) 2020/1553 of the European Central Bank of 14 October 2020 amending Guideline ECB/2013/24 on the statistical reporting requirements of the European Central Bank in the field of quarterly financial accounts (ECB/2020/51)¹²⁷ and Guideline (EU) 2020/1554 of the European Central Bank of 14 October 2020 amending Guideline ECB/2011/23 with regard to the frequency of reporting to the European central Bank on the quality of external statistics (ECB/2020/52)¹²⁸.

The main purpose of the amendments is to change the frequency of reporting on the quality of the data collected from annual to biennial, in order to achieve a better balance between the need for monitoring and reporting this information to the Governing Council and the burden on euro area NCBs and the ECB in the preparation of reports on data quality.

• Guideline (EU) 2020/497 of the European Central Bank of 20 March 2020 on the recording of certain data by national competent authorities in the Register of Institutions and Affiliates Data (ECB/2020/16)¹²⁹.

The Guideline defines the obligations of the national competent authorities' (NCAs) in terms of (i) recording, update and maintenance of the quality of reference data in the Register of Institutions and Affiliates Data (RIAD) for the accomplishment of supervisory tasks and (ii) liaising with the NCBs of their participating Member States for recording reference data and entities in RIAD.

• Guideline (EU) 2020/496 of the European Central Bank of 19 March 2020 amending Guideline (EU) 2019/1265 on the euro short-term rate (€STR) (ECB/2020/15)¹³⁰.

In the interest of the efficient allocation of resources, the amending Guideline provides that the ECB may carry out tasks regarding the determination process and post-production procedures on behalf of NCBs that have only one reporting agent resident in their Member State and do not operate a local collection platform. It also introduces the possibility of submitting complaints electronically.

• Guideline (EU) 2020/381 of the European Central Bank of 21 February 2020 amending Guideline (EU) 2017/2335 on the procedures for the collection of granular credit and credit risk data [ECB/2020/11]¹³¹.

The purpose of the amending Guideline is to establish a framework enabling national central banks to participate in arrangements for the sharing of sub-sets of AnaCredit data, in order to establish or enhance feedback loops to reporting agents, with the aim of exchanging harmonised and comparable data.

¹²⁵ JO L 418, 11.12.2020, p. 1-78.

¹²⁶ OJ L 354, 26.10.2020, p. 22-23

¹²⁷ OJ L 354, 26.10.2020, p. 24-25.

¹²⁸ OJ L 354, 26.10.2020, p. 26-33.

¹²⁹ OJ L 106, 6.4.2020, p. 3-11.

¹³⁰ OJ L 106, 6.4.2020, p. 1-2.

¹³¹ OJ L 69, 6.3.2020, p. 46-57.

ECB's Capital

In the context of the withdrawal of the United Kingdom from the EU, the ECB adopted several legal acts in January 2020 in view of the adjustment of the ECB capital key according to which the paid-up capital has been repaid to the Bank of England. The latter's shares have been redistributed among the remaining national central bank members of the European System of Central Banks

Banking supervision

In the field of banking supervision, the ECB has, in particular, adopted the following legal acts:

- Recommendation of the European Central Bank of 17 January 2020 on dividend distribution policies (ECB/2020/1)
- Recommendation of the European Central Bank of 27 March 2020 on dividend distributions during the COVID-19 pandemic and repealing Recommendation ECB/2020/1 (ECB/2020/19)
- Recommendation of the European Central Bank of 27 July 2020 on dividend distributions during the COVID-19 pandemic and repealing Recommendation ECB/2020/19 (ECB/2020/35)
- Recommendation of the European Central Bank of 15 December 2020 on dividend distributions during the COVID-19 pandemic and repealing Recommendation ECB/2020/35 (ECB/2020/62)

In the context of the coronavirus (COVID-19) pandemic, banks were temporarily recommended not to distribute dividends or buy back shares and to exercise extreme prudence regarding dividends, share buy-backs and variable remuneration.

- Decision (EU) 2020/1015 of the European Central Bank of 24 June 2020 on the establishment of close cooperation between the European Central Bank and Българска народна банка (Bulgarian National Bank) (ECB/2020/30)
- Decision (EU) 2020/1016 of the European Central Bank of 24 June 2020 on the establishment of close cooperation between the European Central Bank and the Croatian National Bank (Hrvatska Narodna Banka) (ECB/2020/31)

In 2020, the ECB established close cooperation with the Bulgarian National Bank (Българска народна банка) and the Croatian National Bank (Hrvatska Narodna Banka).

1.8.1.4 Litigation related to the European System of Central Banks and the Single Supervisory Mechanism

In 2019, the Court of Justice and the General Court of the European Union issued judgments and orders concerning the ECB and the ESCB, including judgments on the single supervisory and resolution mechanism¹³².

In the context of the ESCB, the judgment of the Court of Justice of the European Union (ECJ) of 26 February 2019¹³³ ruled for the first time on the basis of Article 14.2., second paragraph, of the Statute of the European System of Central Banks and of the European Central Bank (ESCB/ECB Statute) by annulling the decision of the *Korupcijas novēršanas un apkarošanas birojs* (Anti-Corruption Office, Latvia) of 19 February 2018 in so far as it prohibits Mr Ilmārs Rimšēviès from exercising his functions as Governor of the Latvian Central Bank (Latvijas Banka).

Various actions had been brought by Mr Rimšēviès (C-202/18) and the ECB (C-238/18) against that decision.

¹³² See Case T-281/18, ABLV Bank / ECB; Case C-450/17 P, Landeskreditbank Baden-Württemberg /ECB, and joined Cases C-152/18 P et C-153/18P, Crédit Mutuel Arkéa / ECB

¹³³ Joined Cases C-202/18 et C-238/18, Ilmārs Rimšēvičs (C-202/18), BCE (C-238/18) c/ République de Lettonie

Firstly, the ECJ held that a prohibition, even temporary as in the present case, of a NCB governor from exercising his functions constitutes relieving him of office, the legality of which must be reviewed by the ECJ.

Secondly, the ECJ held that the action referred to in the second paragraph of Article 14.2 of the ESCB/ECB Statute was aimed at annulling an act of national law based on the "particular institutional context" in which the ESCB operates, derogating from the general division of powers between the national court and the Union court as laid down in the Treaties. The ESCB represents a novel legal construct in Union law, which brings together national institutions, namely the NCBs, and a Union institution, namely the ECB, and causes them to cooperate closely, within which a different articulation and a less marked distinction between the Union legal order and the national legal orders prevails.

However, Article 14.2 of the ESCB/ECB Statute draws the consequences of this highly integrated system intended by the authors of the Treaties for the ESCB and, in particular, of the functional duplication of the Governor of an NCB, which is clearly a national authority, acting however within the framework of the ESCB and, when he is Governor of an NCB of a Member State whose currency is the euro, sits on the main governing body of the ECB.

It is because of this hybrid status and, as underlined by the ECJ, with a view to ensuring the functional independence of NCB Governors within the ESCB, that, by way of exception, a decision taken by a national authority which relieves one of them of its functions may be referred to the Court.

Thirdly, the ECJ concluded that Latvia had not established that removing Mr Rimšēviès from office was based on the existence of sufficient evidence of serious misconduct within the meaning of the second paragraph of Article 14.2 of the ESCB/ECB Statute.

1.8.2 National legislation

1.8.2.1 Enacted Law

Fight against money laundering and terrorist financing

The purpose of the Law of 25 March 2020 is to introduce the necessary modifications, amongst others, in the amended Law of 12 November 2004 on the fight against money laundering and terrorist financing (AML/CFT), as amended, in order to transpose certain provisions of the 5th Anti-Money Laundering Directive (AMLD5)¹³⁵ at national level.

The said law, which takes into account the broader recommendations of the Financial Action Task Force (FATF), aims to extend the scope of AML rules in order to include virtual asset service providers.

Furthermore, it introduces measures to strengthen and harmonise the treatment of countries identified as "high-risk countries" by the European Commission and enhances cross-border cooperation between supervisory authorities. In this latter regard, the exchange of information and cooperation are foreseen, amongst others, to the benefit of the ECB.

Professional payment guarantees

The Law of 10 July 2020¹³⁶ on professional payment guarantees introduces a special regime for personal guarantees granted in a professional context and creates professional payment guarantees as an optional regime.

¹³⁴ See point 69 of the judgment in the joined Cases C-202/18 and C-238/18.

¹³⁵ Directive (EU) 2018/843 of the European Parliament and of the Council of 30 May 2018 amending Directive (EU) 2015/849 on the prevention of the use of the financial system for the purpose of money laundering or terrorist financing and amending Directives 2009/138/EC and 2013/36/EU.

¹³⁶ Official Gazette of the Grand Duchy of Luxembourg, Memorial A - N° 582 of 13 July 2020 (parl. doc. 7567).

In order to avoid any doubt with regard to the parties' willingness, the said law may apply only if the parties (or the guarantor in case of a unilateral act) expressly agreed, in their instrument of guarantee, to submit the professional payment guarantee to the law.

This new instrument, when used by eligible guarantors and provided that the other eligibility criteria are fulfilled, may allow *in fine* the eligibility of the related debt instrument or credit claim in the context of the Eurosystem operations.

The other provisions provide certain possibilities (supplementary and non-exhaustive) offered to the parties to organise their guarantee.

The setting-up of this new instrument from part of the general framework on personal guarantees that the European Commission seeks to further promote through initiatives such as the Capital Markets Union.

1.8.2.2 BCL Regulations

EIn 2020, the BCL adopted Regulations 2020/N° 27 of 20 April 2020, 2020/N° 28 of 18 May 2020 and 2020/N° 29 of 31 December 2020. The purpose of these three Regulations is to amend the Regulation of the Banque centrale du Luxembourg 2014/N° 18 of 21 August 2014 implementing Guideline ECB/2014/31 on additional temporary measures relating to the refinancing operations of the Eurosystem and the eligibility of collateral.

While the first two Regulations implement the decisions taken by the ECB in response to the coronavirus pandemic, the purpose of the third regulation is to render non-eligible the asset-backed securities whose underlying assets include either mortgages or loans to small and medium-sized enterprises, or both, and which do not comply with certain requirements specified in Article 3(5) of Guideline ECB/2014/31 of the ECB, this category of assets having never been used. It also aims to amend the method for calculating financial penalties in respect of credit claims.

1.8.2.3 Legal interest rate

The legal interest rate for 2020 was set at $2.00\%^{137}$.

It should be noted that this rate does not correspond to a particular money market reference rate.

Late payment interest rates on overdue claims in commercial transactions are calculated, unless otherwise provided for by contract, on the basis of the ECB's reference rate plus a margin. The late payment interest rate is published every six months in the Memorial B (Official Gazette). For the first and the second half of 2020, the late payment interest rate was set at $8\%^{138}$.

The above-mentioned rate includes the margin provided for by the amended law of 18 April 2004 on payment deadlines and late payment interests. This margin increased from 7% to 8% starting from 15 April 2013 following the entry into force of the Law of 29 March 2013 on combating late payment in commercial transactions¹³⁹.

¹³⁷ Grand Ducal Regulation of 20 December 2019 on the determination of the legal interest rate for 2020 (Official Gazette of the Grand Duchy of Luxembourg, Memorial A – N° 879 of 23 December 2019).

¹³⁸ Official Gazette of the Grand Duchy of Luxembourg, Memorial B – N° 3005 of 21 August 2020.

¹³⁹ Law of 29 March 2013 on combating late payment in commercial transactions – implementing Directive 2011/7/EU of the European Parliament and Council of 16 February 2011 on combating late payment in commercial transaction, and – amending the Law of 18 April 2004 on payment deadlines and late payment interests.

1.8.2.4 Draft Laws

Use of Distributed Ledger Technology in the context of the issuance of dematerialised securities

Bill No. 7637140

This Bill, firstly, expressly acknowledges the possibility to use secured electronic recording system, including ledgers or databases relaying on distributed ledger technology (DLT) to record the issuance of dematerialised, listed and unlisted, securities.

Secondly, it expands the scope of application of the Law of 6 April 2013 on dematerialised securities, as amended, by allowing the credit institutions and investment firms as defined by the Law of 5 April 1993 on the financial sector to act as central account keepers with respect to non-listed debt securities only.

This Bill is an answer to the International and European initiatives in connection with the DLT/Blockchain¹⁴¹.

1.9 COMMUNICATION

1.9.1 Publications

The Banque centrale du Luxembourg (BCL), in accordance with its organic law, publishes an annual report on its activities. It is available in French and English.

In 2020, the BCL has also published one Bulletin, the Financial Stability Review and 12 Working Papers.

The BCL's Working Papers, which are available on the BCL website, report the results of research carried out by BCL staff. They are preceded by a non-technical summary.

1.9.2 External BCL training

1.9.2.1 Cooperation with secondary schools

In 2019-2020, the BCL organised in Luxembourg the Eurosystem's Generation €uro Students' Award for the seventh time. This competition, which has been organised in around ten euro-area countries since 2011, is aimed at secondary school students aged between 16 and 19, and more particularly at those studying economics. It seeks a better understanding of the role and functioning of the Eurosystem, in particular of monetary policymaking. Due to the sanitary measures taken to contain the COVID-19 pandemic, the competition final scheduled for March 2020 was cancelled. The BCL decided to select the three joint finalist teams for this seventh edition. Two of the teams came from the *Athénée de Luxembourg*, the third from the *Lycée Ermesinde* in Mersch.

The eighth edition of the competition was launched on 13 October 2020 during a videoconference with interested students and teachers. This new edition takes place entirely virtually in order to ensure that the rules of social distancing are respected.

Since the launch of the eighth edition, the Generation €uro Students' Award has a new website at www.generationeuro.eu.

1.9.2.2 Cooperation with schools

In 2020, due to the containment of the COVID-19 pandemic, the BCL was unable to host primary schools for the "Woch vun den Suen".

¹⁴⁰ Bill amending:

 $^{1^{\}circ}$ the Law of 5 April 1993 on the financial sector, as amended;

^{2°} the Law of 6 April 2013 on dematerialised securities, as amended.

¹⁴¹ In the meantime, the Bill has been voted and became the Law of 22 January 2021 (Official Gazette of the Grand Duchy of Luxembourg, Memorial A - N° 43 of 22 January 2021).

1.9.2.3 Presentations for groups of visitors

In 2020, the BCL continued to welcome visitors for presentations. Due to health restrictions related to the COVID-19 crisis, only one presentation could take place at the beginning of the year.

A programme enables groups of 15 to 25 people to sign up for a presentation on the history of the BCL and the Luxembourg currency as well as on the Bank's missions. This initiative meets the BCL's desire to make its European and national missions better known to the general public.

The BCL can welcome one group of visitors per month, either on Thursday evenings (18.00 – 19.30) or Friday afternoons (14.30 – 16.00), for a presentation in French, Luxembourgish or English, depending on visitors' wishes. Visits can be booked on request by email (info@bcl.lu) when group gatherings are possible again.



Group of visitors

1.9.3 The BCL website

The BCL has continued to modernise and improve its website.

In total, nearly 193,000 people visited the BCL site in 2020 (more than 27.6 million clicks and more than 7.4 million pages viewed).

In 2020, the most consulted document was the numismatic programme, which was downloaded nearly 22.700 times.

1.9.4 Video communication

In order to better present its missions and activities, in 2017, the BCL launched a series of short explanatory films which are available on its website (www.bcl.lu) and on its YouTube channel.

In 2020, the BCL completed this series by publishing subtitled versions of the video explaining how the BCL processes banknotes in the four available languages.

1.9.5 The BCL library

The BCL library, inaugurated in 2005, is part of the national network of Luxembourg libraries.

The library's publications are mainly related to economics and law. The collection includes publications from international organisations, but also from national central banks.

The library is accessible to the public by prior appointment by telephone (+352 4774 4275) or by e-mail (bibliotheque@bcl.lu).

1.9.6 Press relations

Throughout 2020, the BCL has been in regular contact with the national and international press. A total of 86 press releases were issued in 2020.

1.9.7 Conferences and events

The BCL has been involved in the organisation of the following conferences and events:

BCL's participation in "Orange Week"

Once again, the BCL participated in "Orange Week", a campaign launched by the UN Secretary General to raise awareness about violence against women and girls, and to put an end to sexual violence.

To mark this occasion, from 25 November to 10 December 2020, the BCL headquarters and other public buildings, monuments and tourist sites in the Grand Duchy of Luxembourg were illuminated in orange.



The facade of the historic building illuminated in orange.

Photo: BCI

Bridge Forum Dialogue Conferences

The Bridge Forum Dialogue a.s.b.l. was invited to take part in a video conference on Tuesday 6 October 2020 under the title "Economic and Monetary Union in stages - Anniversary of the Werner report and the European bailout funds".

The introduction was given by Mr Pierre Gramegna, Minister of Finance of the Grand Duchy of Luxembourg.

Under the chairmanship of Mr Werner Hoyer, President of the European Investment Bank, Ms Christine Lagarde, President of the European Central Bank, Mr Valdis Dombrovskis, Executive Vice-President of the European Commission, Mr Pascale de Vries, President of the European Commission, Mr Paschal Donohoe, President of the European Stability Mechanism, participated in a round table discussion.

The Rector of the University of Luxembourg, Professor Stéphane Pallage, also participated in the event. The analyses and historical documents related to the Werner report are available on a dedicated website: https://wernerreport50.uni.lu.

Consultations in the context of the Eurosystem's monetary strategy review

In 2020, the Governing Council of the European Central Bank (ECB) decided to initiate a review of the monetary policy strategy of the Eurosystem, composed of the ECB and the national central banks of the countries that have adopted the euro, including the Banque centrale du Luxembourg (BCL).

The scope of this review covers, inter alia, the quantitative definition of price stability, the various monetary policy instruments, economic and monetary analyses and communication. Other considerations relating to financial stability, sustainable development and employment are also taken into account in this exercise.

The completion of this assessment, which is carried out in strict compliance with the ECB's mandate to maintain price stability, was initially scheduled for the end of 2020. Due to the health crisis, it has been postponed to the second half of 2021.

In order to ensure that this process is participatory and inclusive, the Governing Council agreed on a consultation phase. A first consultation session with BCL staff was held via video conference in November 2020. The consultation sessions with stakeholders from Luxembourg society, initially planned for April 2020, will finally be organised in spring 2021.

1.10 EUROPEAN ACTIVITIES

1.10.1 Activities at the level of the European Central Bank

The Governor of the *Banque centrale du Luxembourg* (BCL) participates in the meetings of the Governing Council and the General Council of the European central bank. The members of the Governing Council act in their personal capacity and not as national representatives.

Meetings of the Governing Council are, as a rule, held in Frankfurt at the ECB's premises, twice a month. In 2020, due to the health crisis, these physical meetings were replaced as of March by video conferences. Physical meetings will be held again once the health situation allows it.

However, the President of the ECB may also convene additional meetings when deemed necessary or at the request of at least three members of the Governing Council. For instance, an ad hoc meeting was organised in March 2020 when, faced with a double negative shock, the Governing Council took exceptional measures, such as the implementation of the emergency asset purchase programme of private and public sector securities in response to the pandemic, commonly known as "PEPP" (*Pandemic Emergency Purchase Programme*).

Decisions on monetary policy are taken by the Governing Council, in general, every six weeks, with the other meetings being devoted to other topics on which the Governing Council is required to take a decision. In 2020, some 1,650 decisions were adopted by the Governing Council via written procedure, showing a slight increase compared to 2019 due to the health crisis. A majority of these written procedures fall exclusively or partially within the remit of the SSM. Written procedures are in fact the most widely used decision-making tool used by the Governing Council in this area. In fields related to central bank functions, the share of decisions taken during Governing Council meetings is relatively higher.

In January 2020, the ECB launched a review of its monetary policy strategy, the first since 2003. The review has involved experts from all Eurosystem central banks. However, the constraints caused by the health crisis forced the ECB to postpone the deadlines of the review. In particular, this had an impact on the organisation of the consultations of "listening events" by the ECB and the Eurosystem national central banks - including the BCL. Thus, a virtual internal consultation was held at the BCL in November 2020, and virtual external consultations were held in the first quarter of 2021. Whereas the conclusion of the review was originally scheduled for the end of 2020, it has been postponed to the second half of 2021 due to the health crisis.

The General Council, consisting of the President and the Vice-President of the ECB as well as the Governors of the ESCB usually meets quarterly, in Frankfurt. The other members of the Executive Board of the ECB participate in the meetings of the General Council, without however having "member" status.

Committees with specific mandates and areas of competence assist the decision-making bodies of the ECB in the fulfilment of their tasks. The Governing Council or the Executive Board of the ECB may call upon them to study specific topics.

The committees report to the Governing Council through the Executive Board of the ECB.

In 2020, 16 Eurosystem/ESCB committees and a "conference" were active in providing expertise in their respective fields of competence and in supporting the decision-making process in the Governing Council.

The committees are usually composed of members of staff of the Eurosystem central banks. However, the NCBs of the Member States that have not (yet) adopted the euro participate in committee meetings whenever they deal with issues falling within the field of competence of the General Council. Representatives of other relevant institutions and bodies may also be invited.

To support the work related to the SSM, some of these committees meet, when necessary, in SSM composition, i.e. including representatives of those competent national authorities that are not NCBs.

Under the aegis of the committees, working groups and task forces with specific objectives meet in accordance with the committees' respective mandates. The Governing Council may also set up High Level Groups or Task Forces to study specific issues.

In this respect, work on a digital euro started in 2020 in the framework of a high-level task force, set up by the Governing Council and dedicated to digital central bank money. The decision to issue a digital euro has not yet been taken. In order to prepare for a possible issue, a decision will be taken around mid-2021.

In addition, a high-level task force, also established by the Governing Council, is responsible for defining a common Eurosystem approach to the inclusion of sustainable and responsible principles in the euro-denominated non-monetary policy portfolios of each central bank. This common approach should enable each Eurosystem member to contribute to the transition to a low-carbon economy by, inter alia, publishing information on the inclusion of sustainable and responsible principles in such portfolios, on an annual basis and within two years.

The ECB/the Eurosystem also became a member of the BIS Innovation Hub on 30 June 2020, alongside the first three centres of this hub (Hong Kong, Singapore and Switzerland) and other centres, which joined the hub in 2020 (Canada, United Kingdom, Iceland, Norway, Denmark and Sweden). The Innovation Hub's main objective consists of monitoring major trends in technological innovation to identify the implications for central banks. The BCL has supported the Eurosystem's application and is positioning itself as a proactive player in this field.

In 2020, the health crisis also forced all these working groups to use video conferencing to continue their work.

1.10.2 The Economic and Financial Committee

The Economic and Financial Committee (EFC) was established by the Treaty on the Functioning of the European Union. It is composed of representatives of the Treasuries or Ministries of Finance and Central Banks of the European Union (EU) Member States, as well as of the European Commission and the ECB.

The EFC was established to promote the coordination of Member States' policies to the extent necessary for the proper functioning of the internal market. Its tasks include providing a framework for dialogue between the European Council and the ECB, monitoring the economic and financial situation of the Member States, contributing to the coordination of economic and budgetary policies, and providing information on issues relating to financial markets, exchange rate policies, and relations with third countries and international institutions.

The EFC meets in two configurations: plenary and restricted. In plenary configuration, the EFC meets with representatives of the administrations and NCBs of the EU member states, the Commission and the ECB. It thus plays an important role in the preparation of European positions at the G20, the International Monetary Fund (IMF) and the Financial Stability Board (FSB). It also addresses economic policy issues discussed at the informal meetings of the ECOFIN Council, to which the governors of the EU NCBs and the President of the ECB are invited.

NCB representatives do not participate in meetings held in restricted format. In this second configuration, the EFC also meets in the framework of the Eurogroup working group, which is limited to the euro area member countries, the Commission and the ECB, in order to prepare the work of the Eurogroup. The latter is an informal body in which the ministers of the euro area member states discuss issues specifically related to the euro, as well as broader issues with implications for the fiscal, monetary, and structural policies of the euro area countries.

In 2020, the EFC held sixteen meetings, fifteen of which were in plenary composition, and also met three times in a specific "Financial Stability Table" format. It then includes senior representatives of the European supervisory authorities and the European Systemic Risk Board (ESRB).

At its meetings in plenary composition, the EFC continued to follow closely the deepening of Economic and Monetary Union, particularly progress towards the Banking Union and Capital Markets Union, as well as developments in financial markets and risks to financial stability in the EU. In addition, the EFC discussed the economic impact of the COVID-19 pandemic as well as measures taken at EU level to strengthen the fight against money laundering and terrorist financing. As usual, the EFC also contributed to the preparation of the Ecofin meetings, notably by proposing draft conclusions.

The EFC has various sub-committees that cover, among other things, the activities of the IMF, the functioning of public debt markets in the EU, and the production and circulation of euro coins.

The BCL and the Ministry of Finance also represent Luxembourg in the SCIMF (Sub-Committee on IMF and related issues). The sub-committee examines issues related to the International Monetary Fund (IMF) and ensures that the positions of member states are harmonised within the IMF Executive Board. In 2020, the SCIMF discussed the IMF's response to the pandemic, including the management of member countries' requests for financing and the possibility of a general allocation of special drawing rights (SDRs). The

sub-committee followed up on the debt service suspension initiative (DSSI) proposed by the G20. It also considered the inclusion of climate change into the IMF's financial surveillance framework.

The Euro Coins Sub-committee covers issues related to the production and circulation of euro coins. It monitors the development of counterfeiting of euro coins. It proposes to the EFC the possible issue of commemorative 2-euro coins to celebrate European events. This sub-committee is assisted by a working group responsible for operational aspects of the coins, namely the coordination of coin production and the reduction of existing coin stocks through exchange operations or stock transfers between euro area Member States. This working group has been chaired since late 2019 by a BCL staff member. In 2018, the sub-committee had established a small working group to prepare a report on the steps to be taken in the event that the issuance of one or more new euro coins were to be decided. This working group was also chaired by a BCL staff member. At the end of 2019, the working group submitted its report to the sub-committee, which adopted it in 2020. The sub-committee requested that certain technical aspects of this report be studied in more detail.

1.10.3 Other European committees

On 24 April 2013, the European Statistical System (ESS) and the ESCB signed a Memorandum of Understanding on the cooperation between the two statistical systems. In order to improve this cooperation, both systems have established the European Statistical Forum in which National Central Banks, National Statistical Institutes, the European Commission and the ECB are represented. This forum establishes an annual work program with the major objective of improving cooperation between the two systems.

The Committee on Monetary, Financial and Balance of Payments Statistics (CMFB), for its part, continues to deal in depth with cases that fall within the common remit of the two statistical systems. The CMFB is also responsible for deciding on the development and coordination of the categories of statistics required under the policies applied by the European Council, the European Commission and the various committees that assist them. The CMFB represents National Central Banks, National Statistical Institutes, the European Commission and the ECB. Working groups with specific objectives operate under the aegis of this committee.

The European Committee of Central Balance Sheet Offices (ECCBSO), of which the BCL has been a member since 2014, is an advisory body created in 1987 by a group of European Central Banks in charge of the management of national Central Balance Sheet Offices. The Committee's initial objective was to improve the analysis of non-financial corporate data. The Committee's objectives have been extended by central banks in areas such as statistics, economic and financial research, financial stability, supervision and risk assessment to cover the use of data from non-financial corporations. It should be noted that the Institut national de la statistique et des études économiques (STATEC), which is responsible for the Central Balance Sheet Office in Luxembourg, is a member of this committee.

In 2020, the BCL actively contributed to the work carried out in these three forums. Progress has been achieved, notably in the areas of financial accounts, balance of payments, financial services, public finance and national accounts statistics.

1.11 NATIONAL AND EXTERNAL ACTIVITIES

1.11.1 National activities

1.11.1.1 Relations with the Parliament

On 30 November 2020, the BCL presented to the Financial and Budget Commission of the Luxembourg Parliament its opinion on the government's draft budgetary plan on revenues and expenditures for 2021 and the pluriannual programme for the years 2020-2024.

1.11.1.2 BCL Committee Activities

Advisory Commission on Banking and Monetary Statistics (Commission consultative Statistiques bancaires et monétaires)

The Commission consultative Statistiques bancaires et monétaires (CCSBM), set up by the BCL, aims to ensure efficient collection of banking and monetary statistics by the BCL and to establish a dialogue with the credit institutions subject to statistical reporting.

Operational Crisis Prevention Group

The BCL established in 2007 the Operational Crisis Prevention Group (OCPG) gathering the CSSF, systemically important financial institutions and market infrastructures, POST and The Luxembourg Bankers' Association (ABBL) to work towards the financial sector's preparation to face large-scale operational disruptions.

From the beginning of 2020, the group focused on the risks arising from the COVID-19 pandemic situation. During the year, the group monitored the ability of institution members to ensure the continuity of their operations in an environment characterised by higher levels of absenteeism, teleworking and increasing cyber-risks. As the situation did not evolve adversely, no additional coordination measures were required.

1.11.1.3 Activities of external committees in which the BCL participates

The Economic Committee (Comité de conjoncture)

The Economic Committee acts within the framework of the legislation authorising the government to take measures to prevent redundancies for cyclical and structural reasons and to stabilise employment. The Committee contributes to the analysis of the Luxembourg economy and the monitoring of topical economic policy issues.

The BCL's contribution to the Economic Committee is twofold: firstly, the BCL collects information on economic developments in Luxembourg and, secondly, the BCL provides insights into the latest developments in the financial sector and monetary areas.

The Consumer Price Index Commission (Commission de l'indice des prix à la consommation)

The BCL participates as an observer in the meetings of the Consumer Price Index Commission, which is in charge of advising and assisting STATEC in the compilation of consumer price indices. The Commission also issues technical opinions on the monthly compilation of the consumer price index and monitors the compliance with national and European regulations. The BCL presents its inflation projections for Luxembourg and provides explanations regarding the BCL's work in the area of consumer prices.

Committee comptabilité bancaire

The Committee Comptabilité Bancaire, set up by the Commission de surveillance du secteur financier (CSSF), aims at ensuring an exchange of views between the supervisory authority, the BCL and the stakeholders of the Luxembourg financial centre. The CSSF consults the committee when drafting circulars concerning bank accounting issues.

Higher Statistical Council (Conseil supérieur de la statistique)

The Conseil supérieur de la statistique (CSS) acts in an advisory capacity for STATEC and issues an opinion on its annual programme. To this end, STATEC submits to the High Council for Statistics, at the end of each year, a report on the work accomplished during the previous year and a programme of work to be carried out during the coming year. The report and the programme are the subject of an opinion of the High Council for Statistics.

The BCL regularly participates in the work of this Committee as an observer.

The BCL contributes to the work of the CSS, in particular by providing its opinion on the documents submitted to it. It also provides STATEC with data collected on the financial centre to enable it to carry out its work programme.

Committee on Public Statistics (Comité des statistiques publiques)

The Comité des statistiques publiques (CSP) has a coordinating role in the field of government statistics.

As such, it draws up an inventory of all surveys in the Luxembourg statistical system, analyses the possibilities of satisfying requests from existing sources and ensures the implementation of the statistical programme in compliance with the good practices of the Luxembourg statistical system and the relevant international standards.

The BCL regularly participates in the work of this Committee as an observer.

Accounting Standards Board (Commission des normes comptables)

Since October 2013, the BCL has been a member of the Accounting Standards Board (CNC).

The CNC is an economic interest grouping (groupement d'intérêt économique) whose role is to:

- advise the Government on accounting matters;
- contribute to the development of an accounting doctrine;
- participate in discussions on accounting matters within European and international bodies. Since 2014, the CNC has represented Luxembourg on the European Consultative Group on Financial Information (EFRAG);
- assume missions entrusted to it in accordance with the Law of 30 July 2013 reforming the CNC and modifying various provisions relating to accounting and annual accounts of companies, as well as to the consolidated accounts of certain forms of companies.

During 2020, the CNC has published two Q&A sessions, namely:

- Q&A CNC 20/020 Impact of the Covid 19 on the annual accounts of the Luxembourgish companies and groups;
- Q&A CNC 20/021 Optional principle of substance (Art. 29 (3) of the amended law of 19 December 2002).

Furthermore, doctrinal works have been carried out on the topics of the going concern and of the net assets value's accounting, on the corrections of accounting errors as well as on changes in accounting policy and in accounting estimates. These works should be completed by doctrinal publication during 2021.

2020 saw the first-time application of the new chart of accounts (PCN 2020) whose filings will take place during 2021 for the majority of the companies.

Moreover, and pursuant to Article 27 of the amended law of 19 December 2002, the CNC delivered its reasoned opinion on the derogation requests it received.

Finally, the CNC was involved in reflection and in public consultation procedure launched by the European Commission on the revision of Directive with regard to the publication of the rules on disclosure of non-financial and diversity information by large companies (Directive 2014/95/EU).

The foregoing points are a non-extensive overview of the main projects carried out by the CNC to which the BCL contributed.

1.11.2 International activities

Activities at the level of the International Monetary Fund

The primary objective of the International Monetary Fund (IMF) is to ensure the stability of the monetary system by addressing all macroeconomic and financial issues that affect global stability. Since the outbreak of the pandemic, the IMF has taken a number of steps to assist its most affected members, including expediting the approval of financial support programmes.

The Board of Governors is the IMF's highest decision-making body. It is composed of a Governor and an Alternate Governor for each member country. The Director General of the BCL is Luxembourg's Alternate Governor at the IMF. The Board of Governors has delegated most of its powers to the IMF Executive Board, where the 190 members of the IMF are represented by 24 Executive Directors.

Luxembourg holds the position of Senior Advisor in the constituency, which is headed on a rotating basis by a Belgian or Dutch Executive Director for a period of four years. The sixteen members of this constituency are, in descending order of quota, the Netherlands, Belgium, Ukraine, Israel, Romania, Luxembourg, Bulgaria, Croatia, Cyprus, Bosnia-Herzegovina, Georgia, Moldova, Northern Macedonia, Armenia, Andorra and Montenegro.

Member countries' quotas are an essential component of the IMF's financial resources. They broadly correspond to the relative position of each country in the world economy. Luxembourg's quota has been set at 1 321.80 million Special Drawing Rights (SDRs).

In order to supplement its resources on a temporary basis, the IMF can also borrow through multilateral agreements, such as the New Arrangements to Borrow (NAB) or bilateral credits from its members. After quotas, these NABs and bilateral loans are the IMF's second and third lines of defence in terms of financial resources.

On 16 January 2020, the IMF Executive Board approved the doubling of the NAB from SDR 182.4 billion to SDR 360.8 billion as of 1 January 2021. The new NAB period will run until 2025. As a result of this decision, Luxembourg's participation in the NAB increased from SDR 493.12 million to SDR 990 million. Concurrently, the bilateral credit line to the IMF that Luxembourg had signed in April 2014 was reduced from €2.1 billion to €887 million.

At the end of 2020, the NAB credits granted by Luxembourg amounted to SDR 21.09 million. To date, the IMF has not yet made use of its third line of defence, the bilateral credit lines.

The BCL handles Luxembourg's financial operations vis-à-vis the IMF. It holds Luxembourg's assets and liabilities with regard to the IMF under the General Resources Account and the SDR account. Luxembourg's quota is recorded in full on the BCL's balance sheet. At the end of 2020, the reserve position – i.e. the difference between Luxembourg's total quota with the IMF and the euro assets held by the IMF at the BCL - was SDR 273.53 million, or 20.69% of Luxembourg's quota. Also at the end of 2020, Luxembourg held 250.58 million SDRs, or 101.60% of its SDR allocation.

Activities at the level of the Bank for International Settlements

Established in 1930, the Bank for International Settlements (BIS) is the oldest of the international financial institutions. The BIS promotes international cooperation between monetary authorities and financial sector supervisory authorities through meetings that it organises at regular intervals. As part of the Basel Process, the BIS hosts the international groups working on global financial stability, including the Basel Committee on Banking Supervision and the Financial Stability Board. The BIS supports them, facilitates their meetings and helps to set international standards in banking. In addition, it conducts research on policy issues of relevance for central banks and financial sector supervisors. The BIS membership currently comprises 63 central banks and monetary authorities from both advanced and emerging economies.

The BCL is closely involved in the activities of various BIS committees and working groups. The BCL is represented by its Governor at the Global Economy Meeting and the All Governors' Meeting, which are both held every two months, usually at the BIS headquarters in Basel. At these meetings, the governors and other senior officials of BIS member central banks and monetary authorities discuss recent developments and the outlook for the world economy and financial markets. They also exchange views and experiences on topics of particular interest to central banks.

Economic discussions focus on macroeconomic and financial developments in major advanced and emerging economies. Among the issues discussed by the Global Economy Meeting over the past year were risk-taking in the financial sector and the real economy, inflation, the role of economic policies in managing the tail end of the expansion as well as the resilience of economic growth, vulnerabilities in the real economy and businesses; macro-financial risks in the Asia-Pacific region, capital flows and their spillovers, and the impact of COVID-19 on economic activity.

The All Governors' Meeting in 2020 addressed the following topics: macroeconomic implications of low bank profitability; digital financial infrastructure; and public policies on the use of personal data in finance.

Furthermore, the BCL participates in the Committee on the Global Financial System (CGFS) and the BIS Ordinary General Meeting. The CGFS monitors financial market developments for the Governors attending the Global Economy Meeting and analyses the implications for financial stability and central bank policy.

Activities within the Network of Central Banks and Supervisors for Greening the Financial System

The BCL has been a member of the Network of Central Banks and Supervisors for Greening the Financial System (NGFS) since September 2018. The NGFS was established at the first international climate summit (One Planet Summit) held in Paris in December 2017. It exchanges best practices and shares experiences to promote climate and environmental risk management in the financial sector and to facilitate the transition to a sustainable economy. It aims to contribute to achieving the objectives of the Paris Agreement, i.e. to limit global warming to "well below 2°C".

The work of the NGFS is organised around five specific Workstreams, namely micro-prudential/supervision, macro-financial, the promotion of green finance, bridging the data gaps and research. The BCL is represented in the NGFS Plenary Session and participates in the work on macro-financial issues, scaling up green finance and research.

In 2020, the NGFS published several documents, including a guide to integrating climate and environmental risks into prudential supervision, climate scenarios and a guide for prudential supervisors on the use of climate scenarios. The NGFS also produced a study on monetary policy and climate change and issued a report assessing progress on responsible investment in central bank portfolio management.

1.12 EUROSYSTEM PROCUREMENT COORDINATION OFFICE (EPCO)

In December 2007, the Governing Council of the European Central Bank (ECB) designated the Banque centrale du Luxembourg (BCL) to host the Eurosystem Procurement Coordination Office (EPCO), to coordinate the joint procurement of goods and services of the Central Banks of the European System of Central Banks (ESCB) in the context of their missions. Since 2019, EPCO has become a permanent function of the Eurosystem.

Since 2008, the BCL's mandate as the host central bank of EPCO has been renewed three times. The current mandate took effect on 1 January 2020 and is valid until 31 December 2024, with possibility of renewal.

According to the terms of the ECB Decision laying down the framework for joint Eurosystem Procurement¹⁴², EPCO's main task is the identification and coordination of cases of joint procurement that might provide benefits or where there is a need for the harmonisation of requirements for the Central Banks of the Eurosystem/ESCB, including the *in-house printing works*. In 2020, 24 Central Banks participated in EPCO's activities¹⁴³. In addition, other institutions outside the ESCB may participate in EPCO joint procurement, under certain conditions¹⁴⁴.

To achieve these objectives, EPCO continued to focus its activities on the identification and coordination of joint procurement procedures of interest for the participating Central Banks, as well as on the management and promotion of agreements concluded for the benefits of its members.

EPCO's procurement plan, as approved by the Governing Council, includes IT goods and services, market data services, consultancy and training services, air transport and hotel services and banknote related items.

In 2020, as part of its missions, EPCO coordinated 32 joint procurement procedures. For the implementation of each procedure, a "Lead Central Bank" was nominated, under the coordination of EPCO.

As part of the studies and exchanges of information carried out in collaboration with the networks of experts from the Central Banks participating in EPCO, new joint procurement opportunities (17) have also been identified to be launched from 2021 onwards. Other opportunities (28) were under analysis.

The framework agreements in place resulting from the joint procurement procedures (42) have generated considerable financial and administrative benefits for the Central Banks and EPCO's participating institutions.

Moreover, EPCO continued to facilitate the exchange and development of best practices, in collaboration with its experts' networks, thus promoting a reinforced cooperation in the area of public procurement within the ESCB. The execution of the EPCO budget in 2020 (part of a multi-annual financial envelope) has proven to be lower that the budget initially allocated.

¹⁴² Decision of the European Central Bank of 17 November 2008 laying down the framework for Joint Eurosystem procurement (ECB/2008/17) (2008/893/CE), as modified by Decision ECB/2015/51 and Decision ECB/2020/27.

¹⁴³ In 2020, EPCO gathered 24 Central Banks in total: 20 Central Banks of the Eurosystem participated in EPCO's activities, as well as four Central Banks that are not part of the euro area. The list of participating banks is available at www.epco.lu.

¹⁴⁴ Since 2016, certain institutions that are not part of the SEBC can take part in EPCO's procurements under the conditions defined by the Decision ECB/2008/17, as amended.



2 THE BCL AS AN ORGANISATION

2.1 CORPORATE GOVERNANCE

2.1.1 The Council

Article 6 of the Founding Law of 23 December 1998 defines the powers of the Council of the Bank. In 2019, the Council consisted of the following members:

President: Mr Gaston Reinesch Members: Mr Pierre Beck

Mr Pit Hentgen (until 31.7.2020)

Ms Nadia Manzari Ms Martine Reicherts

Mr Romain Schintgen (until 31.7.2020)

Mr Roland Weyland Mr Michel Wurth

Mr Claude Zimmer (until 31.7.2020)

During 2020, the Council held seventeen meetings. The Council approved the financial accounts as at 31 December 2020, the budgetary guidelines and subsequently the budget for the 2022 financial year.

Audit Committee

Since 2001, the Audit Committee, composed of members of the Council, has assisted the BCL Council in selecting the statutory auditor to be proposed to the Government, determining the scope of the specific controls to be performed by the statutory auditor and in the approval of the financial accounts by the Council. The Audit Committee is informed of the internal audit plan. It may invite the head of Internal Audit and the BCL's statutory auditor to contribute to its work.

At its meeting on 20 March 2020, the Council reappointed the members of the Audit Committee (Mr Pit Hentgen, Mr Romain Schintgen and Mr Claude Zimmer) for the 2020 financial year. The Audit Committee, which was chaired by Mr Claude Zimmer in 2020, met once during the year, as its members whose terms expired on 31 July 2020 have not been renewed, or replaced in 2020. The topics under the remit of the audit committee were addressed by the Council.

2.1.2 The Governor

His Royal Highness Grand Duke Henri of Luxembourg, based on a proposal by the Government in Cabinet, appointed Mr Gaston Reinesch as the Director General (Governor) of the Banque centrale du Luxembourg for a renewed six-year period as of 1 January 2019.

2.1.3 The Executive Board

The Executive Board is the highest executive authority of the BCL. It takes the decisions and draws up the measures necessary for the institution to carry out its tasks.

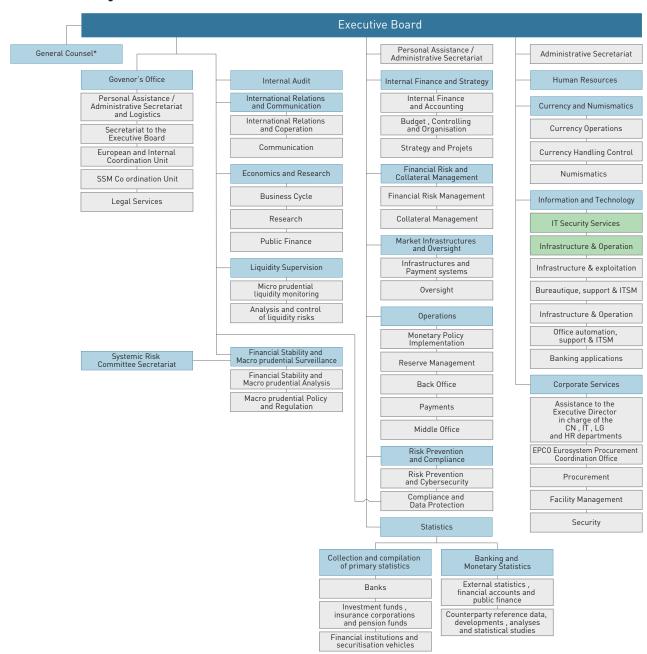
Without prejudice to the independence of the Director General from any instructions in his capacity as member of the Governing Council of the European Central Bank (ECB), the decisions of the Executive Board shall be taken collectively.

The Executive Board consists of a Director General and two Directors. It consists of the following members as at 31 December 2020:

- Director General: Mr Gaston Reinesch;
- Directors: Mr Pierre Beck and Mr Roland Weyland.

The members of the Executive Board receive a salary according to the wage scale in the public sector as well as different allowances. The remuneration components are subject to the current legal tax rates (i.e. the progressive tax rate) in Luxembourg.

2.1.4 Organisation chart as at 31 December 2020



^{*} M . Serge Kolb held the position of General Counsel from January 1 st 2017 until April 30 th 2017

2.1.5 Internal control and risk management

The BCL's internal control and risk management system is based on generally accepted principles in the financial sector and within the European System of Central Banks and the Single Supervisory Mechanism (ESCB/SSM), taking into consideration the specific central banking activities.

The Executive Board has defined the general framework and the principles of the internal control system, which is based on the three lines of defense model.

Responsibility for the effective operation of the internal control rests with the first line of defense, consisting of the management and its employees.

The second line of defense consists of the entities responsible for specific areas of expertise to ensure the segregation of duties appropriate to the BCL's activities. These units are the Financial Risk Management and Collateral Management sections, the Risk Prevention department as well as the Controlling function and Project Management Office (PMO):

- The Financial Risk Management section is responsible for the analysis of financial risks, the monitoring of the implementation of decisions taken by the committees and the Executive Board, the monitoring of the investment limits and reporting on these aspects;
- The Collateral Management section is responsible for the risk management in the field of collateral, and in particular for ABS (asset-backed securities);
- The Cybersecurity and Risk Prevention section, reports to the Risk Prevention and Compliance department, which was created in 1 August 2020, and ensures the management and monitoring of operational risks and risk related to information systems.

While operational departments are responsible for identifying the risks associated with their activities and for putting in place appropriate measures to mitigate those risks, the Cybersecurity and Risk Prevention section has the following responsibilities:

- establish a common methodology for risk analysis;
- provide assistance in the identification and evaluation of risks;
- ensure periodical reporting on the residual operational risks.

The Cybersecurity and Risk Prevention section is also in charge of coordinating the Business Continuity Plan and the related testing. Since the end of 2019, the Cybersecurity and Risk Prevention section has also undertaken the Chief Information Security Officer (CISO) role and is entrusted with the BCL's cyber resilience programme.

The Compliance and Privacy section, part of the Risk prevention department, is responsible for identifying, assessing and managing the risk of non-compliance for the BCL. Its areas of intervention are:

- Fight against money laundering and terrorism financing;
- Ethics and deontology;
- Market abuse;
- Conflicts of interests;
- Professional secrecy and confidentiality;
- Data privacy;
- Public procurement.
- The Controlling function provides assurance that available resources are used effectively and that any misuse is detected without delay. It ensures the proper functioning of the budgetary procedure and it supervises the execution of the budget. It reports on a regular basis on the follow-up thereof. The Project Management Office (PMO) is entrusted with the same responsibilities in the area of project management.

As the third line of defense, the Internal Audit department is in charge of the independent and objective evaluation of the internal control system and its functioning. The Internal Audit unit is independent from the other administrative units and reports directly to the President of the Council.

The Internal Audit department relies on internationally accepted professional standards, as applied by the ESCB/SSM. The annual internal audit plan includes audit commitments at national level, as well as audits that are coordinated by the Internal Auditors Committee, in compliance with the ESCB/SSM audit charter.

The Internal Audit Department may issue recommendations to be implemented by the relevant entities. The Internal Audit ensures their follow-up.

Finally, the Audit Committee is informed about the internal control and risk management framework and its functioning.

2.1.6 External control

In accordance with Article 15 of the Organic Law of the BCL, the statutory auditor, appointed by the Government for a period of five years, is responsible for verifying and certifying the accuracy and completeness of the BCL's accounts. Moreover, the external auditor is mandated by the BCL's Council to perform additional reviews and specific controls.

At European level, the BCL's statutory auditor's nomination is approved by the Council of Ministers of the EU, upon recommendation of the Governing Council of the ECB. In this context, the statutory auditor is also entrusted with the performance of specific duties at Eurosystem level.

The Government has nominated Ernst & Young S.A. as the BCL's external auditor for the financial years 2019 to 2023, following a ministerial decree dated 14 May 2019 and as the result of a designation and accreditation process laid down by the ECB and ESCB's statute (Article 27.1).

2.1.7 Code of conduct

A code of conduct defining internal and external rules of conduct applies to all BCL employees. Without prejudice to the provisions of Civil Service Law, labor legislation and pre-existing contractual commitments, this Code sets out the ethical standards, in particular with regard to non-discrimination, integrity, independence and professional secrecy, which must be strictly observed by all those to whom it is addressed.

The application of the Code of conduct, as far as the Director General is concerned, at the latter's request, is reinforced at his own expense. Furthermore, in order to avoid any suspicion of conflict of interests in connection with his function as a member of the ECB Governing Council, the Director General does not participate in the BCL investment committees in charge of managing the BCL's portfolios. Moreover, within the framework of the BCL Council, he does not participate in the deliberations on this matter. As Chairman of the Council, his responsibilities in this respect are limited to those of a director.

On 1 January 2019, the ECB's Single Code of Conduct came into force, replacing the specific Codes previously applicable to the Governing Council and the Supervisory Board. This new Code establishes a harmonized system of rules for members of the High Level ECB bodies.

2.2 HUMAN RESOURCES

2.2.1 Evolution of the workforce

In 2020, the workforce at the *Banque centrale du Luxembourg* (BCL) increased by 2.20% compared to 2019. As of 31 December 2020, the BCL employed 419 people, representing 405.5 full-time equivalents. This workforce was made up of 25 different nationalities, which reflects the diversity and a source of enrichment for the institution's human capital.

The BCL is experiencing a gradual renewal of its teams: in 2020, 25 new staff members were hired, 12 staff members left and 4 staff members retired.

2.2.2 Human Resources Management

2020 was affected by the Covid-19 pandemic. In order to protect the health and safety of its workforce, the BCL developed a range of measures aimed at protecting its staff members and guaranteeing the continuity of its missions. In this regard and during the peak periods of the pandemic, the BCL encouraged its staff member to carry out their missions remotely as much as possible.

The Human Resources department was actively mobilised to support BCL staff members during the pandemic. In this context, a guide of best practices and recommendations relating to remote working was published on BCL's intranet. In the same vein, the BCL also maintained regular communications with its staff members via its intranet as well as other alternative channels.

In addition, line managers organised regular virtual meetings with their staff members in order to maintain contact with their teams. In this regard, the BCL offered line managers the opportunity to participate in a dedicated coaching focusing on remote team management during the health crisis. Likewise, virtual coffee breaks were also organised, inviting those who wished to meet virtually once a week in a non-formal context.

Furthermore, the BCL ensured that staff members were aware of the existence of an internal unit providing psychological support if needed as well as external psychological and mental health support organisations, which staff members could call upon, if necessary.

In terms of learning and development, a huge transformation has taken place due to the considerable increase in the provision of virtual training courses and seminars. In this regard, BCL experimented with e-learning courses for staff (on a voluntary and selected basis) to allow them to take part in courses according to their needs. In the same vein, most of the existing courses are now available in virtual mode. Training needs have also evolved and now cover topics relating to digital tools and the gradual impact of digitalization of skills. In 2021, the BCL intends to continue on the path of digitizing its training offering, through among other measures, the adaptation of the ESCB Learning & Development strategy at BCL.

Finally, recruitment activities have also evolved and become more flexible in 2020. In addition to the recruitment interviews carried out mainly remotely during the year, the BCL also participated in virtual recruitment fairs.

2.2.3 BCL pension fund

Owing to the special status reserved by the legislator to the BCL in 2001, the institution launched a pension fund in order to finance the statutory pension liabilities (first pillar) of its staff members. The BCL affiliates staff members of different statuses to the fund, according to the provisions of its Organic Law.

The pension fund is set up within the Bank and is managed autonomously. In order to ensure exemplary transparency with regard to its financial situation, the pension fund has its own separate accounts with an identification of its assets and its liabilities in the balance sheet of the BCL.

In order to ensure good governance, the pension fund is supervised by a decision-making body (the Steering Committee) which appoints the stakeholders and validates the strategic axis and the general principles governing the investment and treasury policy of the pension fund. These strategic axes are proposed to the Steering Committee by an advisory Committee, the ALCO Committee.

Since the State does not intervene in the financing of the statutory pensions (first pillar) of BCL staff members, the pension fund is exclusively financed, on the one hand, by pension deductions made on the salaries of the staff members in compliance with the rules of the pension scheme applicable to them according to their status and, on the other hand, by the regular and ad hoc payments made by the Bank itself.

2.3 INTERNAL FINANCE AND STRATEGY

2.3.1 Accounting and reporting

The BCL regularly updates its accounting system and its procedures in order to meet the quality standards of the Eurosystem. As in previous years, the BCL has participated in the Working Groups on ESCB's financial framework and has transposed the accounting revisions accordingly.

The Eurosystem provides for specific harmonised rules on the daily reporting of balance sheet data by each central bank.

The control systems are adapted to changes in the operations carried out during the period under review.

The BCL regularly checks the development of balance sheet items, off-balance-sheet items and the profit and loss accounts. Investments, revenues and expenses are monitored particularly closely with special attention to the correct execution of the signing authority.

The monthly balance sheet of the BCL is published on its website.

The management information system, in the form of dashboard reports, meets the continuous need to follow the Bank's activities. These tables include all of the Bank's activities. The BCL strictly monitors the development of the interest margin and compares the profitability of its investments to set benchmarks.

The BCL's decision-making bodies are regularly informed of the results of these activities in order to determine future targets and actions.

2.3.2 Budget

The preparation of the budget, in accordance with the BCL's Organic Law, is part of the multi-year results planning framework, the primary aim of which is to ensure long-term financial equilibrium. The budget also determines the upper threshold of operational and investment expenditure that the BCL may incur during a financial year.

The BCL's 2020 budget has been drawn up in accordance with the budget procedure and the guidelines set out by the BCL Council on 5 July 2019. It was approved by the Council of the BCL on 20 December 2019.

In particular, the 2020 BCL budget incorporates the following key elements:

- following the decisions taken by the Governing Council, the extension of the Eurosystem's unconventional monetary policy measures was foreseen in the 2020 budget, impacting, inter alia, the BCL's business volume;
- in line with the budgetary assumptions, the Eurosystem's key interest rates remain at a historically low level, which continued to have a negative impact on the BCL's net income;
- at Eurosystem level, cooperation continues with the ongoing consolidation of systems in production, a significant number of joint projects and joint procurement procedures between national central banks are carried out under the aegis of the Eurosystem Procurement Coordination Office;
- at national level, the specialisation of tasks to be performed also continues, particularly in the areas
 of macro-prudential supervision, the oversight of payment systems and securities settlement systems
 and statistical collection. The activities of the Systemic Risk Board, for which the BCL provides the
 secretariat, generate an additional burden for the BCL;
- in view of a significant number of vacant positions and retirements, recruitment remains paramount. The continued development of the Bank's activities requires additional staffing;
- the digitisation of operations continues, with a significant number of internal projects underway, and IT security is being strengthened through the implementation of the Cyber Resilience Programme, which has been approved by the BCL Board;
- apart from the notional contribution to the BCL pension fund, the budget includes additional contributions resulting from the projected benefit obligation (PBO) calculations;
- all these elements make it increasingly difficult to cover operating expenses with recurrent income.
 Therefore, the budget included a reversal of provisions in order to close the year with a positive result.

The Internal Finance and Strategy Department oversees budget execution and prepares quarterly reports for the attention of the Executive Board. At the end of each financial year, a detailed analysis of the variances between budgeted and actual expenditure is established. This analysis is submitted to the Executive Board and the Council of the BCL for information and approval. The conclusions that can be drawn from it are taken into account for the establishment of future budgets.

As at 31 December 2020, the actual operating and investment expenses remained below the limits set by the budget. Unbudgeted operating expenses caused by the COVID-19 pandemic, such as the implementation of teleworking for all BCL staff, additional cleaning of buildings, acquisition of protective masks and disinfectants, remained inferior to the savings caused by the COVID-19 pandemic, especially in travel expenses, training expenses and expenses related to the organisation of meetings. The COVID-19 pandemic also caused delays in some activities, such as the implementation of projects, some building work and recruitment

2.3.3 Strategic Planning and Management Control

The purpose of Management Control is to strengthen efficiency and accountability within the BCL, thereby allowing the Executive Board to focus more on strategic decisions. To this end, Management Accounting assists the Executive Board by providing quantitative and qualitative analyses useful for decision-making.

In addition, the BCL has also participated in several project controlling activities at the Eurosystem and ESCB level, in connection with the preparation and monitoring of joint projects and the underlying methodology.

Cost accounting, as an integral part of the controlling function, identifies, analyses and monitors the costs associated with each activity. In addition, it is used to establish financial data for the invoicing of services provided. The methodology used is compliant with the harmonised rules determined at Eurosystem level. It consists of allocating the BCL's operating expenses according to their purpose (i.e. to the entities concerned) and determining the expenses inherent to each of BCL's activities.

To facilitate the planning and monitoring of the use of the necessary resources, the BCL has an analytical tool for measuring and evaluating the allocation of human resources and material for the various missions of a central bank. Combined with the cost accounting system, it enables the Executive Board to better monitor the Bank's operational and organisational performance. In addition, reports containing both financial and operational indicators establish the correspondence between tasks and activities on the one hand and the defined strategic axes and objectives on the other.

The Strategy and Projects Section, through its Project Management Office (PMO) function, is responsible for the coordination and prioritisation of projects and the management of the BCL's project portfolio. The PMO assists the BCL Internal Steering Committee (BISC) and the Management in the preparation of project decisions. In 2019, a new project methodology was finalised and approved.

The BISC, whose secretariat is provided by the PMO, monitors the progress of all ongoing projects and the launch of new projects. The Overall Project Monitoring Report (OPMR), drawn up by the PMO on the basis of the individual project progress reports, enables the BISC to better monitor the progress of the various projects and to ensure communication with the Management on projects.

As the BCL continues to develop its activities, further medium- and long-term planning remains a necessity. In 2020, the BCL continued to develop a scorecard to identify areas of activity that need to be strengthened. Strategic planning efforts are being stepped up in order to ensure the optimal alignment of the BCL with the current economic, financial and institutional environment.

2.4 FINANCIAL STATEMENTS

Preamble

Only the French version of the present financial statements has been reviewed by the Independent Auditor. Consequently, the present financial statements only refer to the French version of the financial statements; other versions result from a conscientious translation made under the responsibility of the Executive Board. In case of differences between the French version and this translation, only the French version is legally binding.

2.4.1 Key figures as of year-end (in euro)

	2020	2019	Change in % 2020/2019
Total assets	286 490 751 971	207 256 558 436	38%
Liabilities to credit institutions	178 299 739 280	100 531 528 383	77%
Lending to credit institutions	15 617 970 000	4 724 610 000	231%
Own funds (¹), revaluation accounts, administrative provisions and specific banking risks provisions	1 240 062 662	1 295 474 562	-4%
Net result from banking activities [2]	528 098 058	514 288 141	3%
Net result from banking activities adjusted by net monetary income allocation	57 272 807	71 105 371	-19%
Total net income	109 802 247	86 481 525	27%
Administrative and operational expenses	108 131 161	84 491 422	28%
Net profit	1 671 086	1 990 103	-16%
Staff	416	407	2%
BCL's weighting in the capital of the ESCB	0.2679%	0.2270%	
BCL's weighting in lending to credit institutions related to monetary policy operations	0.871%	0.757%	

⁽¹) Capital, reserves, provisions for general banking risks and net profit to be allocated to the reserves (²) Net ajusted interest income, net result from fees and commissions, net result on financial operations

2.4.2 Report of the Réviseur d'Entreprises agréé

Opinion

We have audited the financial accounts of Banque centrale du Luxembourg, which comprise the balance sheet as at 31 December 2020, and the profit and loss account for the year then ended, and the notes to the financial accounts, including a summary of significant accounting policies.

In our opinion, the accompanying financial accounts give a true and fair view of the financial position of the Banque centrale du Luxembourg as at 31 December 2020, and of the results of its operations for the year then ended in accordance with accounting principles generally accepted in Luxembourg and those defined by the European System of Central Banks.

Basis for Opinion

We conducted our audit in accordance with the Law of 23 July 2016 on the audit profession (the Law of 23 July 2016) and with International Standards on Auditing (ISAs) as adopted for Luxembourg by the "Commission de Surveillance du Secteur Financier" (CSSF). Our responsibilities under those Law and standards are further described in the "responsibilities of the "Réviseur d'entreprises agréé" for the audit of the financial accounts" section of our report. We are also independent of the Banque centrale du Luxembourg in accordance with the International Code of Ethics for Professional Accountants, including International Independence Standards, issued by the International Ethics Standards Board for Accountants (IESBA Code) as adopted for Luxembourg by the CSSF together with the ethical requirements that are relevant to our audit of the financial accounts, and have fulfilled our other ethical responsibilities under those ethical requirements. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

Responsibilities of the Management for the financial accounts

The financial accounts are prepared by the Management and approved by the Council. The Management is responsible for the preparation and fair presentation of these financial accounts in accordance with accounting principles generally accepted in Luxembourg and those defined by the European System of Central Banks, and for such internal control as the Management determines is necessary to enable the preparation of financial accounts that are free from material misstatement, whether due to fraud or error.

In preparing the financial accounts, the Management is responsible for using the going concern basis of accounting.

Responsibilities of the "Réviseur d'entreprises agréé" for the audit of the financial accounts

Our objectives are to obtain reasonable assurance about whether the financial accounts as a whole are free from material misstatement, whether due to fraud or error, and to issue a report of the "Réviseur d'entreprises agréé" that includes our opinion. Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with the Law of 23 July 2016 and with ISAs as adopted for Luxembourg by the CSSF will always detect a material misstatement when it exists. Misstatements can arise from fraud or error and are considered material if, individually or in the aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of these financial accounts.

As part of an audit in accordance with the Law of 23 July 2016 and with ISAs as adopted for Luxembourg by the CSSF, we exercise professional judgment and maintain professional skepticism throughout the audit. We also:

- Identify and assess the risks of material misstatement of the financial accounts, whether due to fraud or error, design and perform audit procedures responsive to those risks, and obtain audit evidence that is sufficient and appropriate to provide a basis for our opinion. The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations, or the override of internal control;
- Obtain an understanding of internal control relevant to the audit in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Banque centrale du Luxembourg's internal control;
- Evaluate the appropriateness of accounting policies used and the reasonableness of accounting estimates and related disclosures made by the Management;
- Conclude on the appropriateness of Management's use of the going concern basis of accounting and, based on the audit evidence obtained, whether a material uncertainty exists related to events or conditions that may cast significant doubt on the Banque centrale du Luxembourg's ability to continue as a going concern. If we concluded that a material uncertainty exists, we would be required to draw attention in our report of the "Réviseur d'entreprises agréé" to the related disclosures in the financial accounts or, if such disclosures are inadequate, to modify our opinion. Our conclusions are based on the audit evidence obtained up to the date of our report of the "Réviseur d'entreprises agréé";
- Evaluate the overall presentation, structure and content of the financial accounts, including the
 disclosures, and whether the financial accounts represent the underlying transactions and events in a
 manner that achieves fair presentation.

We communicate with those charged with governance regarding, among other matters, the planned scope and timing of the audit and significant audit findings, including any significant deficiencies in internal control that we identify during our audit.

Ernst & Young Société anonyme Cabinet de révision agréé

Sylvie Testa

Luxembourg, 5 March 2021

2.4.3 Balance sheet as at 31 December 2020

ASSETS	Notes	2020 EUR	2019 EUR
Gold and gold receivables	3	111 999 675	97 890 020
Claims on non-euro area residents denominated in foreign currency	4	801 610 693	839 875 979
- Receivables from the IMF	4.1.	642 567 543	627 715 115
- Balances with banks, security investments, external loans and other external assets	4.2.	159 043 150	212 160 864
Claims on euro area residents denominated in foreign currency	5	464 019 193	392 908 218
Claims on non-euro area residents denominated in euro	6	203 672 858	346 403 995
- Balances with banks, security investments and loans		203 672 858	346 403 995
Lending to euro area credit institutions related to monetary policy operations denominated in euro	7	15 617 970 000	4 724 610 000
- Main refinancing operations	7.1.	20 000 000	-
- Longer-term refinancing operations	7.2.	15 597 970 000	4 724 610 000
Other claims on euro area credit institutions denominated in euro	8	114 501	598 656 935
Securities of euro area residents denominated in euro	9	9 555 431 456	7 406 458 328
- Securities held for monetary policy purposes	9.1.	9 326 730 173	7 062 893 372
- Other securities	9.2.	228 701 283	343 564 956
Intra-Eurosystem claims	10	259 023 103 318	192 150 082 767
- Participating interest in the ECB	10.1.	52 981 556	51 256 492
- Claims equivalent to the transfer of foreign reserves to the ECB	10.2.	132 894 723	131 548 868
- Other claims within the Eurosystem	10.3.	258 837 227 039	191 967 277 407
Other assets	11	712 830 277	699 672 194
- Tangible and intangible assets	11.1.	108 273 194	110 438 231
- Other financial assets	11.2.	511 616 180	504 192 311
- Accruals and prepaid expenses	11.3.	74 293 132	78 711 285
- Sundry	11.4.	18 647 771	6 330 367
Total assets		286 490 751 971	207 256 558 436

The accompanying notes form an integral part of the financial statements.

LIABILITIES	Notes	2020 EUR	2019 EUR
Banknotes in circulation	12	4 346 571 360	3 878 226 000
Liabilities to euro area credit institutions related to monetary policy operations denominated in euro	13	178 299 739 267	100 531 528 383
- Current accounts (covering the minimum reserve system)	13.1.	102 693 604 385	81 314 028 383
- Deposit facility	13.2.	75 606 134 882	19 217 500 000
Other liabilities on euro area credit institutions denominated in euro		14	-
Liabilities to other euro area residents denominated in euro	14	2 549 910 662	2 850 181 041
- General government		1 797 957 585	2 183 296 436
- Other liabilities		751 953 077	666 884 605
Liabilities to non-euro area residents denominated in euro	15	3 958 749 893	2 071 037 576
Liabilities to non-euro area residents denominated in foreign currency	16	2 952 171	524 545 623
Counterpart of special drawing rights allocated by the IMF	17	290 669 230	304 307 452
Intra-Eurosystem liabilities	18	95 186 127 215	95 291 292 570
- Net liabilities related to the allocation of euro banknotes within the Eurosystem	12, 18.1.	95 186 127 215	95 291 292 570
Items in course of settlement		35	20
Other liabilities	19	149 874 404	75 726 610
- Accruals and income collected in advance		141 019 218	68 667 567
- Sundry		8 855 186	7 059 043
Provisions	20	1 379 223 401	1 384 006 812
- Provision for banking risks	20.1.	912 955 342	949 820 296
- Provision for pensions	20.2.	466 095 059	433 980 816
- Other provisions		173 000	205 700
Revaluation accounts	21	125 621 275	146 064 392
Capital and reserves	22	199 641 958	197 651 854
- Capital	22.1.	175 000 000	175 000 000
- Reserves	22.2.	24 641 958	22 651 854
Profit for the year	40	1 671 086	1 990 103
Total liabilities		286 490 751 971	207 256 558 436

The accompanying notes form an integral part of the financial statements.

2.4.4 Off-balance sheet as at 31 December 2020

	Notes	2020 EUR	2019 EUR
Securities received as collateral	23	180 740 089 163	130 031 953 392
Foreign currency reserve assets managed on behalf of the ECB	24	401 917 985	430 850 043
Futures - Purchases	25	3 100 000	-
Futures - Sales	25	4 200 000	-

The accompanying notes form an integral part of the financial statements.

2.4.5 Profit and loss account for the year ending 31 December 2020

	Notes	2020 EUR	2019 EUR
Interest income	26	596 624 744	562 139 521
Interest expense	26	(77 728 762)	[47 837 615]
Net interest income	26	518 895 982	514 301 906
Realised gains/(losses) arising from financial operations	27	10 984 698	1 152 838
Write-downs on financial assets and positions	28	[1 207 438]	[429 403]
Transfer (to)/from provisions for risks	29	36 639 870	[1 703 343]
Net result of financial operations, write-downs and risk provisions		46 417 130	(979 908)
Fees and commissions income	30	12 435 961	10 115 925
Fees and commissions expense	30	(13 011 145)	[10 853 124]
Net result from fees and commissions	30	(575 184)	(737 199)
Income from participating interests	31	5 444 178	8 694 108
Net result of pooling of monetary income	32	(470 825 252)	[443 182 770]
Other income	33	10 445 393	8 385 390
Total net income		109 802 247	86 481 527
Staff costs	34	(50 384 203)	[47 160 539]
-Gross salaries		(48 101 623)	[44 980 322]
-Other staff costs		(2 282 580)	(2 180 217)
BCL's contribution to the legal pension scheme	35	(28 527 129)	(9 887 056)
Other administrative expenses	36	[20 470 344]	[19 506 233]
Depreciation of tangible and intangible assets	11.1., 37	(5 489 003)	(4 634 564)
Banknote production services	38	[1 371 420]	[882 899]
Other expenses	39	(1 889 062)	(2 420 133)
Result of the year	40	1 671 086	1 990 103

The accompanying notes form an integral part of the financial statements.

2.4.6 Notes to the financial statements as at 31 December 2020

NOTE 1 - GENERAL INFORMATION

The Banque centrale du Luxembourg ("the BCL" or "the Bank") was founded in accordance with the law of 22 April 1998. The Founding Law of 23 December 1998 as modified, stipulates that the main task of the BCL shall be to contribute to the exercise of the tasks of the European System of Central Banks (ESCB) so as to achieve the objectives of the ESCB. The BCL is also responsible for the oversight of the general market liquidity situation and the evaluation of the market participants in this respect. The BCL is authorised to take and sell participations as well as, in exceptional circumstances, to make short-term lending to counterparties with appropriate guarantees. In addition, establishing the single supervisory mechanism, the macroprudential authority, the single resolution mechanism, and the deposit guarantee scheme have resulted and continue to entail new missions and responsibilities for the BCL.

NOTE 2 - SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

The principal accounting policies applied in the preparation of the financial statements are set out below:

2.1 Layout of the financial statements

The financial statements of the BCL have been prepared and drawn up in accordance with the generally accepted accounting principles and those defined by the ESCB.

2.2 Accounting principles

The following accounting principles have been applied:

- economic reality and transparency;
- prudence;
- recognition of post-balance sheet events;
- continuity of methods and comparability;
- relative significance;
- going concern concept;
- recognition of charges and income in the accounting period they relate to.

2.3 Basis of preparation

The financial statements have been prepared under the historical cost convention, modified to include the valuation at market prices of securities (other than those classified as held-to-maturity and those held for monetary policy purposes), gold and of all other on-balance-sheet and off-balance-sheet assets and liabilities denominated in foreign currency.

Transactions in financial assets and liabilities are reflected in the accounts of the BCL on the basis of their settlement date.

2.4 Gold and foreign currency assets and liabilities

Assets and liabilities denominated in foreign currencies (including gold) are converted into euro at the exchange rate prevailing on the balance sheet closing date. Income and expenses are converted at the exchange rate prevailing on the dates of the transactions.

When necessary, assets and liabilities denominated in foreign currencies are revalued on a currency by currency basis including on-balance sheet and off-balance sheet items.

Revaluation to the market price for assets and liabilities denominated in foreign currency is treated separately from the exchange rate revaluation.

Gold is revalued on the basis of the euro price per fine ounce as derived from the quotation in US dollars established at the time of the London fixing on the last working day of the year.

2.5 Rules applicable to the portfolios held by the BCL

Securities currently held for monetary policy purposes are accounted for at amortised cost (purchase or transfer price adjusted by pro rata of premiums and discounts) (subject to impairment).

Marketable securities other than securities held for monetary policy purposes and those classified as held-to-maturity are valued at the market price prevailing on the balance sheet date. Marketable securities classified as held-to-maturity are valued at amortised cost subject to impairment.

The revaluation of securities takes place item-by-item on the basis of their ISIN code.

Off-balance-sheet instruments are revalued on an item-by-item basis. Daily changes in the variation margin of open interest rate futures contracts are recorded in the Profit and Loss Account.

The Agreement on Net Financial Assets (ANFA) is an agreement between the National Central Banks (NCBs) of the euro area and the European Central Bank (ECB), which together form the Eurosystem. The objective of this agreement is for the Governing Council of the ECB to ensure a full control of the consolidated balance sheet of the Eurosystem. The agreement sets rules and limits for holdings of financial assets which are related to national tasks of the NCBs other than the monetary policy. As part of this agreement, the principle of a dynamic exemption is foreseen in relation to the maximum amount of net financial assets (NFA). This dynamic exemption, which applies to the BCL, adjusts the historical waiver (ensuring that the NCBs do not have to reduce their NFA below a level which is linked to their historical starting position) over time in proportion to the growth or decline of Eurosystem maximum NFA.

2.6 Recognition of gains and losses

Income and expenses are recognised in the period in which they are earned or incurred.

Realised gains and losses on foreign exchange transactions, securities and financial instruments linked to interest rates and market prices are taken to the profit and loss account.

At the end of the year, unrealised revaluation gains on foreign currencies, securities and financial instruments are not considered in the profit and loss account, but transferred to a revaluation account on the liabilities side of the balance sheet.

Unrealised losses are recognised in the profit and loss account when they exceed previous revaluation gains registered in the corresponding revaluation account. They may not be reversed against new unrealised gains in subsequent years. Unrealised losses regarding a specific security, financial instrument, currency or in gold holdings are not netted with unrealised gains in other securities, financial instruments, currencies or gold holdings.

In order to calculate the acquisition cost of securities or currencies that are sold, the average cost method is used on a daily basis. If any negative revaluation differences are taken to the profit and loss account, the average cost of the asset in question is adjusted downwards to the level of the current exchange rate or market price thereof.

For fixed-income securities, the premiums or discounts arising from the difference between the average acquisition cost and the redemption price are calculated and presented on a prorata basis as part of the interest positions and amortised over the remaining life of the securities.

2.7 Presentation of interest income and expense

With a view to harmonizing at Eurosystem level, the interest income and expense arising from monetary policy operations are presented on a net basis on a balance sheet (sub-) item level under either "Interest income" or "Interest expenses", depending on whether the net amount is positive or negative.

2.8 Events after the reporting period

Assets and liabilities are adjusted to take account of events occurring between the balance sheet date and the date on which the BCL's Council approves the annual accounts if such events have a material effect on the assets and liabilities on the balance sheet date.

2.9 Banknotes in circulation

The ECB and the euro area NCBs, which together comprise the Eurosystem, issue euro banknotes. The total value of euro banknotes in circulation is allocated to the Eurosystem central banks on the last working day of each month in accordance with the banknote allocation key.

The ECB has been allocated a share of 8% of the total value of euro banknotes in circulation, whereas the remaining 92% has been allocated to NCBs according to their weightings in the capital key of the ECB. The share of banknotes allocated to each NCB is disclosed in the balance sheet under liability item "Banknotes in circulation"

The difference between the value of the euro banknotes allocated to each NCB in accordance with the banknote allocation key and the value of the euro banknotes that it actually puts into circulation also gives rise to intra-Eurosystem balances. These claims or liabilities are disclosed under the sub-item "Intra-Eurosystem: Net claims/liabilities related to the allocation of euro banknotes within the Eurosystem".

The interest income and expense on these balances is cleared through the accounts of the ECB and is disclosed under "Net interest income" in the profit and loss account.

2.10 Intra-Eurosystem claims and liabilities

Intra-Eurosystem balances result primarily from cross-border payments in the European Union (EU) that are settled in central bank money in euro. They are settled in TARGET2 (Trans-European Automated Real-time Gross settlement Express Transfer system) and give rise to bilateral balances in the TARGET2 accounts of EU central banks. These bilateral balances are netted out and then assigned to the ECB on a daily basis, leaving each NCB with a single net bilateral position vis-à-vis the ECB only. Intra-Eurosystem balances of the BCL vis-à-vis the ECB arising from TARGET2, as well as other intra-Eurosystem balances denominated in euro are presented on the balance sheet of the BCL as a single net asset position and disclosed under "Other claims within the Eurosystem (net)".

Intra-Eurosystem claims and liabilities arising from TARGET2 balances and counterparties accounts are shown as a single net position on the balance sheet of the BCL.

There are other claims or liabilities of the BCL vis-à-vis the Eurosystem due to its participation in the capital of the ECB (see the sub-item "Participating interest in the ECB"), the transfer of a part of foreign reserves (see the sub-item "Claims equivalent to the transfer of foreign reserves"), the interim profit distributions and accrued liabilities from the ECB resulting from the distribution of the monetary income results and the allocation of euro banknotes between the NCBs and the ECB.

The "Participating interest in the ECB" sub-item includes:

- the NCBs' paid-up share in the ECB's subscribed capital, and
- any net amount paid by the NCBs due to the increase in their shares in the ECB's equity value resulting from all previous ECB's capital key adjustments.

Intra-Eurosystem balances arising from the allocation of euro banknotes within the Eurosystem are included as a single net position under "Net liabilities related to the allocation of euro banknotes within the Eurosystem".

2.11 Treatment of tangible and intangible assets

The tangible and intangible assets, except for land and works of art, are stated at their acquisition cost less depreciation. Depreciation is calculated on a straight-line basis over the estimated useful life of the fixed asset:

	Years
Buildings	50
Renovation of buildings	10
Furniture and equipment	3-5
Computer hardware and software	4

The buildings are owned by the BCL in the perspective of a durable and very long-term use. The estimated useful life of the buildings was reviewed in 2019 and align to this principle. Therefore, the economic benefits expected from the buildings is now fixed over a period of 50 years, instead of 25 years previously, this is in line with the practices recommended at the Eurosystem level according to the methodology established by the committee in charge of cost controlling (COMCO).

2.12 Pension fund

Since 1 January 1999, after the entry into force of the Founding Law of 23 December 1998, as modified, the legal pension claims (1st pillar) of the BCL's staff are fully borne by the BCL. The pension fund was set up in 2000.

The actuarial method determines the pension fund's liability related to old age, disability or survival for each member of staff. The actuarial model is based, among other things, on each member of staff's personal and past and foreseeable career data, on the forecast of the cost and standard of living as well as on an average rate of return generated by the fund's assets.

The BCL's liabilities related to pensions are shown in the account "Provisions for pensions". The provision increases as a result of regular transfers from the wage share and from the notional employer's share and decrease by pension payments to retirees. At the year-end, the provision is adjusted in the light of the new actuarial calculation. In addition, if necessary, periodic transfers from the account "Booking reserve of the pension fund", equivalent to the gains generated by the fund's assets, to adjust the account "Provision for pensions".

In cases where regular transfers and the results of the pension fund would be insufficient to cover the BCL's pension liabilities, the difference between the existing provision and the accrued liabilities valued by the actuary is covered in the same trend by an additional contribution from the BCL. The BCL applies the method of projected unit credit in line with international standards.

2.13 <u>Provision for banking risks</u>

In accordance with the prudence principle, the BCL's provision policy intends to cover specific and general risks resulting from the Bank's activities.

2.14 Changes in accounts classification

The BCL accepts deposits of an European institution, which, in the 2019 financial accounts, were presented in note 14.2 under the heading "Liabilities to other euro area residents denominated in euro - Other liabilities".

With effect from 1 July 2020, Eurostat revised the statistical classification of these institutions to the "Liabilities to other euro area residents denominated in euro - general government sector".

The comparative amounts as at 31 December 2019 have been adjusted as follows:

	Published in 2019 EUR	Adjustment due to reclassification EUR	Restated amount 2019 EUR
Liabilities to other euro area residents denominated in EUR	2 850 181 041	-	2 850 181 041
General government	795 220 864	1 388 075 572	2 183 296 436
Other liabilities	2 054 960 177	(1 388 075 572)	666 884 605

NOTE 3 - GOLD AND GOLD RECEIVABLES

As at 31 December 2020, the BCL holds 72 544.10 ounces of fine gold amounting to 112.0 million euro (72 291.36 ounces of fine gold amounting to 97.9 million euro on 31 December 2019).

On the balance sheet date, gold is valued on the basis of the euro price per fine ounce derived from the quotation in US dollars established at the London fixing on 31 December 2020.

NOTE 4 - CLAIMS ON NON-EURO AREA RESIDENTS DENOMINATED IN FOREIGN CURRENCY

	2020 EUR	2019 EUR
Receivables from the IMF	642 567 543	627 715 115
Balances with banks, security investments, external loans and other external assets	159 043 150	212 160 864
	801 610 693	839 875 979

Under this item are recorded the BCL's foreign exchange reserve holdings with counterparties situated outside the euro area (including international and supranational institutions and non-Eurosystem central banks).

4.1 Receivables from the IMF

This sub-item contains receivables from the International Monetary Fund (IMF) made up of reserve tranche position, Special Drawing Rights (SDR) holdings and new arrangements to borrow. SDR are reserve assets created by the IMF and allocated by it to its members. A member's SDR holdings initially amount to the SDR allocated. Afterwards, SDR holdings are subject to fluctuations as a result of encashments and transactions. The reserve tranche position corresponds to the net amount of the quota and the IMF's currency holding and takes into account the re-evaluation of the general account. The new arrangements to borrow are credit agreements between the IMF and the Government of Luxembourg.

4.2 Balances with banks, security investments, external loans and other external assets

This sub-item contains balances held on accounts with banks outside the euro area as well as securities, loans and other foreign currency assets issued by non-residents of the euro area. It includes in particular the US dollar securities portfolio which could be used, if needed, for monetary policy operations and the foreign currency investment security portfolio.

The US dollar portfolio, which amounts to 119.0 million euro as at 31 December 2020 (161.3 million euro as at 31 December 2019), mainly consists of government bonds and bonds issued by international and supranational institutions denominated in US dollars. Securities are valued at market price. As at 31 December 2020, their value at market price included a positive net revaluation adjustment amounting to 0.7 million euro (positive net revaluation adjustment amounting to 2.0 million euro on 31 December 2019).

The foreign currency investment securities portfolio amounts to 6.6 million euro at 31 December 2020 (10.2 million euro in 2019). As at 31 December 2020, their market value includes a negative net valuation adjustment of 0.02 million euro (negative net valuation adjustment of 0.1 million euro in 2019).

Balances with banks amounted to 33.4 million euro as at 31 December 2020 (40.7 million euro on 31 December 2019).

NOTE 5 - CLAIMS ON EURO AREA RESIDENTS DENOMINATED IN FOREIGN CURRENCY

This item contains balances in foreign currency held by the BCL on accounts with euro area counterparties which amounts to 464 million euro as at 31 December 2020 (393 million euro on 31 December 2019).

NOTE 6 - CLAIMS ON NON-EURO AREA RESIDENTS DENOMINATED IN EURO

	2020 EUR	2019 EUR
Balances with banks	604	1 514
Available-for-sale securities portfolio	203 672 254	346 402 481
	203 672 858	346 403 995

This item contains balances held on accounts with banks outside the euro area as well as securities, deposits, loans and other euro-denominated assets issued by non-residents of the euro area.

The available-for-sale securities portfolio contains government bonds and bonds issued by companies outside the euro area denominated in euro. Securities are valued at market value. As at 31 December 2020, the market value of the latter comprised a negative net revaluation adjustment amounting to 3.1 million euro including the premium and discount amortisation (negative net revaluation adjustment amounting to 10.6 million euro on 31 December 2019).

NOTE 7 - LENDING TO EURO AREA CREDIT INSTITUTIONS RELATED TO MONETARY POLICY OPERATIONS DENOMINATED IN EURO

This balance sheet item represents the liquidity-providing transactions executed by the BCL with Luxembourg credit institutions.

The item is divided into various sub-items depending on the type of instrument used to provide liquidity to the financial sector:

	2020 EUR	2019 EUR
Main refinancing operations	20 000 000	-
Longer-term refinancing operations	15 597 970 000	4 724 610 000
Fine-tuning reverse operations	-	-
Structural reverse operations	-	-
Marginal lending facility	-	-
Credits related to margin calls	-	-
	15 617 970 000	4 724 610 000

As at 31 December 2020, the total Eurosystem holding of monetary policy assets amounts to 1 793 194 million euro (624 233 million euro as at 31 December 2019) of which the BCL holds 15 618 million euro (4 725 million euro as at 31 December 2019).

In accordance with Article 32.4 of the Statute of the ESCB, any risks from monetary policy operations, if they were to materialise, may be shared, by decision of the Governing Council, in full by the Eurosystem NCBs, in proportion to the prevailing ECB capital key shares (see note 20 "Provisions").

Losses can only materialise if both the counterparty fails and the recovery of funds received from the resolution of the collateral provided by the counterparty is not sufficient.

It should be noted that for specific collateral which can be accepted by NCBs at their own discretion, risk sharing has been excluded by the Governing Council of the ECB.

7.1 Main refinancing operations

Main refinancing operations are executed through liquidity providing reverse transactions with a weekly frequency and a maturity of normally one week, on the basis of standard tenders.

Since October 2008, these operations were conducted as fixed rate tender procedures. These operations play a key role in achieving the aims of steering interest rate, managing market liquidity and signalling the monetary policy stance.

7.2 Longer-term refinancing operations

These operations aim to provide counterparties with additional longer-term refinancing. In 2020 operations were conducted with maturities equal to the reserve maintenance period and with maturities between 3 and 48 months. These operations were conducted at fixed rate with allotment of the total amount bid.

In 2016, the Governing Council introduced a series of four targeted longer-term refinancing operations (TLTRO-II). These operations have a four-year maturity, with a possibility of repayment after two years. According to the decisions taken by the Governing Council, the final interest rate applicable to each TLTRO-II operation depended on the lending behaviour of the counterparties for the period between 1 February 2016 and 31 January 2018 and would be between the MRO rate and the deposit facility rate at the time of the allotment.

Additionally, in 2019, the Governing Council introduced a new series of seven quarterly targeted longer-term refinancing operations (TLTRO-III). These operations have a three-year maturity, with a possibility of repayment after two years and from September 2021 repayment is possible one year after the settlement of each operation. On 10 December 2020 the Governing Council added three further operations to this series, which will be conducted between June and December 2021. According to the initial decisions taken by the Governing Council, the final interest rate applicable to each TLTRO-III operation could be as low as the average interest rate on the deposit facility prevailing over the life of the operation.

Furthermore, in response to the COVID-19 shock, in 2020, the Governing Council decided that for the period between 24 June 2020 and 23 June 2022 – referred to as the *special interest rate period* – the interest rate applicable can be as low as 50 basis points below the average interest rate on the deposit facility prevailing over the same period, but in any case may not become higher than -1%. Given that the actual interest rate will only be known at the maturity of each operation and that a reliable estimate is not possible until that time, the deposit facility rate minus 50 basis points, with a ceiling of -1% is used for calculating the TLTRO-III interest over the special interest period, and, the deposit facility rate is used for calculating the TLTRO-III interest over the rest of the life of an operation, as this was deemed a prudent approach.

Additionally, on 30 April 2020 the Governing Council decided to conduct a new series of seven additional longer-term refinancing operations which mature in the third quarter of 2021, called pandemic emergency longer-term refinancing operations (PELTROs). These operations provide liquidity support to the euro area financial system and contribute to preserving the smooth functioning of money markets by providing an effective backstop after the expiry of the bridge longer-term refinancing operations (LTROs) that have been conducted since March 2020. The PELTROs are conducted as fixed rate tender procedures with full allotment. The interest rate is 25 basis points below the average rate applied in the Eurosystem's main refinancing operations over the life of the respective PELTRO.

In December 2020, the Governing Council decided to offer four additional PELTROs on a quarterly basis during 2021.

7.3 Fine-tuning reverse operations

This sub-item includes open market operations carried out on a non-regular basis, intended primarily to meet unexpected fluctuations in market liquidity.

7.4 Structural reverse operations

These are open market operations carried out with the primary intention of bringing about a lasting change in the structural liquidity position of the financial sector vis-à-vis the Eurosystem.

7.5 Marginal lending facility

This sub-item includes a standing facility enabling counterparties to obtain overnight credit from the BCL at a pre-specified interest rate against eligible collateral.

7.6 Credits related to margin calls

This sub-item includes additional credit extended to credit institutions and resulting from the increase in the value of the securities pledged as collateral for other credits extended to these same institutions.

NOTE 8 - OTHER CLAIMS ON EURO AREA CREDIT INSTITUTIONS DENOMINATED IN EURO

This item includes the BCL's current accounts and fixed-term deposits not related to monetary policy operation with credit institutions inside the euro area.

NOTE 9 - SECURITIES OF EURO AREA RESIDENTS DENOMINATED IN EURO

	2020 EUR	2019 EUR
Securities held for monetary policy purposes	9 326 730 173	7 062 893 372
Other securities	228 701 283	343 564 956
- available-for-sale securities portfolio	183 544 914	298 262 467
- held-to-maturity securities portfolio	45 156 369	45 302 489
	9 555 431 456	7 406 458 328

9.1 Securities held for monetary policy purposes

This item contains securities acquired by the BCL within the scope of the third purchase programme for covered bonds (CBPP3), the securities markets programme (SMP), the public sector purchase programme (PSPP) and the pandemic emergency purchase programme (PEPP).

	Start Date	End Date	Decision	Universe of eligible securities
Completed / Terminated programmes				
Securities Markets Programme (SMP)	May 2010	Septem- ber 2012	ECB/2010/5	Private and public debt securities issued in the euro area
Asset Purchase programme (APP)				
Third covered bond purchase programme (CBPP3)	October 2014	active	ECB/2020/8 (recast)	Covered bonds of euro area residents
Public sector purchase programme (PSPP)	March 2015	active	ECB/2020/9 (recast)	Bonds issued by euro-area central, regional or local government or recognised agencies as well as issued by international organisations and multilateral development banks located in the euro area
Pandemic emergency purchase programme (PEPP)				
Pandemic emergency purchase programme (PEPP)	March 2020	active	ECB/2020/17	All asset categories eligible under the APP

In 2020, the Eurosystem continued its net purchases under the asset purchase programme (APP) at a monthly pace of 20 billion euro on average. In March 2020, a temporary envelope of additional net assets purchases of 120 billion euro was added until the end of the year. The Governing Council expects net purchases to run for as long as necessary to reinforce the accommodative impact of its policy rates, and to end shortly before it starts raising the key ECB interest rates. The Governing Council also intends to continue the reinvestments for an extended period of time past the date when the Governing Council starts raising the key ECB interest rates, and in any case for as long as necessary to maintain favourable liquidity conditions and an ample degree of monetary accommodation.

Additionally, in March 2020 the Eurosystem launched a temporary pandemic emergency purchase programme (PEPP) with an envelope of 750 billion euro, to ease the overall monetary policy stance and to counter the severe risks to the monetary policy transmission mechanism and the outlook for the euro area posed by the coronavirus pandemic. Purchases include all the asset categories eligible under the APP and were initially foreseen until the end of 2020. In June 2020, the Governing Council increased the envelope for the PEPP by 600 billion euro and in December 2020 by an additional 500 billion euro, bringing it to a total of 1 850 billion euro. The horizon for net purchases was also extended to at least the end of March 2022 and

in any case, until the Governing Council judges that the coronavirus crisis phase is over. Furthermore, the Governing Council intends to reinvest the principal payments from maturing securities purchased under the PEPP until at least the end of 2023. The future roll-off of the PEPP portfolio will be managed to avoid interference with the appropriate monetary policy stance.

The securities purchased under all of these programmes are valued on an amortised cost basis subject to impairment. The amortised cost of the securities held by BCL, as well as their market value (which is provided for comparison purposes only), are as follows:

Securities held for mon- etary policy purposes	2020	EUR	2019	EUR	CHANG	E EUR
	Amortised cost	Market value	Amortised cost	Market value	Amortised cost	Market value
Completed / Terminated programmes						
Securities Markets Programme (SMP)	45 584 682	48 595 800	55 675 328	61 002 850	(10 090 646)	(12 407 050)
Sub-total	45 584 682	48 595 800	55 675 328	61 002 850	(10 090 646)	(12 407 050)
Asset Purchase programme (APP)						
Third covered bond purchase programme (CBPP3)	3 179 872 376	3 321 058 343	2 119 233 536	2 196 278 890	1 060 638 840	1 124 779 453
Public sector purchase programme (PSPP)	4 984 316 066	5 165 717 505	4 887 984 508	5 000 986 644	96 331 558	164 730 861
Sub-total	8 164 188 442	8 486 775 848	7 007 218 044	7 197 265 534	1 156 970 398	1 289 510 314
Pandemic emergency purchase programme (PEPP)						
PEPP - covered bonds	90 788 546	93 642 524	-	-	90 788 546	93 642 524
PEPP - public sector securities	1 026 168 503	1 035 756 505	-	-	1 026 168 503	1 035 756 505
Sub-total	1 116 957 049	1 129 399 029	-	-	1 116 957 049	1 129 399 029
Total	9 326 730 173	9 664 770 677	7 062 893 372	7 258 268 384	2 263 836 801	2 406 502 293

Market values are indicative and were derived on the basis of market quotes. When market quotes were not available, the amortised cost was used for the evaluation of the securities portfolio.

The Governing Council assesses on a regular basis the financial risks associated with the securities held under these programmes. Impairment tests are conducted on an annual basis, using data as at the year-end and are approved by the Governing Council. In these tests, impairment indicators are assessed separately for each programme.

The total Eurosystem NCB's holding of securities held in the context of asset purchase which risks are shared in full by the Eurosystem NCBs (SMP, CBPP3, corporate sector purchase programme – CSPP, securities issued by international or supranational institutions held in the PSPP and PEPP, and PEPP – covered bonds) amounts to 883.4 billion euro as at 31 December 2020 (695.8 billion euro as at 31 December 2019), of which the BCL holds 6 255.3 million euro (5 137.0 million euro as at 31 December 2019).

As a result of an impairment test conducted as at 31 December 2020 on securities purchased under the programmes SMP, CBPP3, PSPP and PEPP, the Governing Council decided that all future cash flows on these securities are expected to be received. No impairment loss was recorded at the end of the 2020 financial year in the SMP, CBPP3, PSPP and PEPP portfolios.

9.2 Other securities

The securities recorded under this item include:

- the available-for-sale securities portfolio in euro issued by residents of the euro area amount to 183.5 million euro as at 31 December 2020 (298.3 million euro on 31 December 2019). This portfolio contains government bonds in euro issued by Member States of the euro area and bonds issued by companies of the euro area. Securities are valued at market value. As at 31 December 2020, the market value of the latter comprised a negative net revaluation adjustment amounting to 11.6 million euro including premium and discount amortisation (negative net revaluation adjustment amounting to 10.0 million euro on 31 December 2019). In this portfolio, the BCL does not hold any security issued by the State of the Grand Duchy of Luxembourg;
- the held-to-maturity securities portfolio which securities are intended to be held until maturity. This portfolio is valued at amortised cost, purchase or transfer price adjusted by premiums, discounts and impairments. As at 31 December 2020, these securities amount to 45.2 million euro (45.3 million euro on 31 December 2019). In this portfolio, the BCL does not hold any security issued by the State of the Grand Duchy of Luxembourg.

NOTE 10 - INTRA-EUROSYSTEM CLAIMS

10.1 Participating interest in ECB

Pursuant to Article 28 of the ESCB Statute, the ESCB national central banks are the sole subscribers to the capital of the ECB. Subscriptions depend on shares which are fixed in accordance with Article 29.3 of the ESCB Statute and are subject to adjustment every five years.

Based on Council Decision of 15 July 2003 on the statistical data to be used for the adjustment of the key for subscription of the capital of the ECB, the NCBs' capital key shares were adjusted on 1 January 2019, by means of transfers among the NCBs as a result of the guinquenal revision.

As a result of the departure of the United Kingdom from the European Union on 31 January 2020 and consequent withdrawal of the Bank of England from the ESCB, the weightings assigned to the remaining NCBs in the key for subscription to the ECB's capital were adjusted as per the table below with effect from 1 February 2020. As a result the BCL's share in the key for subscription to the ECB's capital was increased from 0.2270% to 0.2679%.

The subscribed capital of the ECB is 10 825 million euro. The ECB kept its subscribed capital unchanged after Bank of England's withdrawal from the ESCB. The share of the Bank of England in the ECB's subscribed capital, which stood at 14.3374%, was reallocated among both the euro area NCBs and the remaining non-euro area NCBs.

The ECB's paid-up capital also remained unchanged at 7 659 million euro in 2020, as the remaining NCBs were required to cover the withdrawn Bank of England's paid-up capital of 58 million euro. As a result, the BCL's paid 0.4 million euro to the ECB on 1 February 2020.

Euro area NCBs will then be required to pay up in full their increased subscriptions to the ECB capital following Bank of England's withdrawal from the ESCB in two annual instalments. As a result, the BCL's will be required to pay up 2 million euro in 2021 and 2 million euro in 2022.

The NCBs capital key shares are as follows (in percentage):

	BCL's weighting in the cap	ital of the ESCB (in %)
	until 31st January 2020	from 1 st February 2020
Nationale Bank van België / Banque Nationale de Belgique	2.5280	2.9630
Deutsche Bundesbank	18.3670	21.4394
Eesti Pank	0.1968	0.2291
Central Bank of Ireland	1.1754	1.3772
Bank of Greece	1.7292	2.0117
Banco de España	8.3391	9.6981
Banque de France	14.2061	16.6108
Banca d'Italia	11.8023	13.8165
Central Bank of Cyprus	0.1503	0.1750
Latvijas Banka	0.2731	0.3169
Lietuvos bankas	0.4059	0.4707
Banque centrale du Luxembourg	0.2270	0.2679
Central Bank of Malta	0.0732	0.0853
De Nederlandsche Bank	4.0677	4.7662
Oesterreichische Nationalbank	2.0325	2.3804
Banco de Portugal	1.6367	1.9035
Banka Slovenije	0.3361	0.3916
Národná banka Slovenska	0.8004	0.9314
Suomen Pankki – Finlands Bank	1.2708	1.4939
Sub-total for euro area NCB	69.6176	81.3286
Българска народна банка (Bulgarian National Bank)	0.8511	0.9832
Česká národní banka	1.6172	1.8794
Danmarks Nationalbank	1.4986	1.7591
Hrvatska narodna banka	0.5673	0.6595
Magyar Nemzeti Bank	1.3348	1.5488
Narodowy Bank Polski	5.2068	6.0335
Banca Națională a României	2.4470	2.8289
Sveriges Riksbank	2.5222	2.9790
Bank of England	14.3374	0.0000
Sub-total for non-euro area NCB	30.3824	18.6714
Total	100.0000	100.0000

Totals may not add up due to rounding.

The subscribed and paid-up capital of the NCBs in the ECB are shown in the following table (in euro):

	Subscribed capital	Paid-up capital	Subscribed capital	Paid-up capital
	until 31st January 2020 EUR	until 31st January 2020 EUR	from 1 st February 2020 EUR	from 1 st February 2020 EUR
Nationale Bank van België/ Banque Nationale de Belgique	273 656 179	273 656 179	320 744 959	276 290 917
Deutsche Bundesbank	1 988 229 048	1 988 229 048	2 320 816 566	1 999 160 135
Eesti Pank	21 303 614	21 303 614	24 800 091	21 362 892
Central Bank of Ireland	127 237 133	127 237 133	149 081 997	128 419 794
Bank of Greece	187 186 022	187 186 022	217 766 667	187 585 028
Banco de España	902 708 165	902 708 165	1 049 820 011	904 318 913
Banque de France	1 537 811 329	1 537 811 329	1 798 120 274	1 548 907 580
Banca d'Italia	1 277 599 809	1 277 599 809	1 495 637 102	1 288 347 435
Central Bank of Cyprus	16 269 986	16 269 986	18 943 762	16 318 228
Latvijas Banka	29 563 094	29 563 094	34 304 447	29 549 980
Lietuvos bankas	43 938 704	43 938 704	50 953 308	43 891 372
Banque centrale du Luxembourg	24 572 766	24 572 766	29 000 194	24 980 876
Central Bank of Malta	7 923 905	7 923 905	9 233 731	7 953 971
De Nederlandsche Bank	440 328 813	440 328 813	515 941 487	444 433 941
Oesterreichische Nationalbank	220 018 269	220 018 269	257 678 468	221 965 204
Banco de Portugal	177 172 891	177 172 891	206 054 010	177 495 700
Banka Slovenije	36 382 849	36 382 849	42 390 728	36 515 533
Národná banka Slovenska	86 643 357	86 643 357	100 824 116	86 850 273
Suomen Pankki – Finlands Bank	137 564 190	137 564 190	161 714 781	139 301 721
Sub-total for euro area NCB	7 536 110 122	7 536 110 122	8 803 826 699	7 583 649 493
Българска народна банка (Bulgarian National Bank)	92 131 635	3 454 936	106 431 470	3 991 180
Česká národní banka	175 062 014	6 564 826	203 445 183	7 629 194
Danmarks Nationalbank	162 223 556	6 083 383	190 422 699	7 140 851
Hrvatska narodna banka	61 410 265	2 302 885	71 390 922	2 677 160
Magyar Nemzeti Bank	144 492 194	5 418 457	167 657 709	6 287 164
Narodowy Bank Polski	563 636 468	21 136 368	653 126 802	24 492 255
Banca Națională a României	264 887 923	9 933 297	306 228 625	11 483 573
Sveriges Riksbank	273 028 328	10 238 562	322 476 961	12 092 886
Bank of England	1 552 024 564	58 200 921	-	-
Sub-total for non-euro area NCB	3 288 896 948	123 333 636	2 021 180 371	75 794 264
Total	10 825 007 070	7 659 443 757	10 825 007 070	7 659 443 757

Totals may not add up due to rounding.

10.2 Claims equivalent to the transfer of foreign reserves to the ECB

This sub-item represents the euro-denominated claims on the ECB with respect to the transfer of part of the BCL's foreign reserves. The claims are denominated in euro at a value fixed at the time of their transfer.

Pursuant to Article 30.2 of the Statute of the ESCB, these contributions are fixed in proportion to NCBs' share in the subscribed capital of the ECB.

They are remunerated at the latest available marginal interest rate used by the Eurosystem in its tender for main refinancing operations, adjusted to reflect a zero return on the gold component.

Following (a) the increase in the weighting of the euro area NCBs (which have transferred foreign reserve assets to the ECB) in the ECB's subscribed capital resulting from Bank of England's withdrawal from the ESCB and (b) a decision of the Governing Council to reduce the proportion of the euro area NCBs' contributions, so that the total amount of foreign reserve assets already transferred by the euro area NCBs will remain at the current level, the claim equivalent to this transfer was marginally adjusted. This resulted in a minor increase in the BCL's claim of 1.3 million euro, which was paid to the ECB on 1 February 2020.

As at 31 December 2020, the claims equivalent to the transfer of foreign reserves to the ECB amounts to 132.9 million euro (131.5 million euro on 31 December 2019).

10.3 Other claims within the Eurosystem

This sub-item represents the BCL's net claims towards the Eurosystem, mostly from transactions resulting from cross-border payments initiated for monetary or financial operations, made via the TARGET2 system, between the BCL and the other NCBs as well as the ECB. This claim amounts to 258.8 billion euro as at 31 December 2020 (192.0 billion euro on 31 December 2019). This increase results from the rise of the current accounts and of the deposit facilities related to the supply of liquidities by the Eurosystem.

The net position vis-à-vis the ECB bears interest at the marginal interest rate applying to the main refinancing operations.

NOTE 11 - OTHER ASSETS

11.1 Tangible and intangible assets

Tangible and intangible assets are as follows:

	Lands and Buildings EUR	Furniture and equipment EUR	Software EUR	Other EUR	Total EUR
Cost as at 1 January 2020	176 008 454	20 759 200	15 951 068	1 785 867	214 504 589
Disposals/Transfers	-	-	130 792	[41 209]	89 583
Acquisitions	635 630	713 712	443 250	1 441 791	3 234 383
Cost as at 31 December 2020	176 644 084	21 472 912	16 525 110	3 186 449	217 828 555
Accumulated depreciation as at 1 January 2020	72 992 352	19 023 203	12 050 803	-	104 066 358
Disposals/Transfers	-	-	-	-	-
Depreciation	2 985 182	832 571	1 671 250	-	5 489 003
Accumulated depreciation as at 31 December 2020	75 977 534	19 855 774	13 722 053	-	109 555 361
Net book value as at 31 December 2020	100 666 550	1 617 138	2 803 057	3 186 449	108 273 194

The sub-item "Lands and Buildings" comprises:

- the acquisition cost of the two premises located on 2, Boulevard Royal;
- the renovations made to the main building ("Siège Royal");
- the costs incurred in relation to the reconstruction and transformation of the "Pierre Werner" building;
- the costs incurred in relation to the reconstruction and transformation of the "Monterey" building;
- the acquisition cost of the building "7, Boulevard Royal";
- the renovations made to the building "7, Boulevard Royal";
- the acquisition cost of the building "1, Boulevard Royal".

11.2 Other financial assets

The components of this item are as follows:

	2020 EUR	2019 EUR
Other participating interests	84 542 888	88 552 887
Pension fund	427 073 292	415 639 424
	511 616 180	504 192 311

The other participating interests comprise the BCL's investments held in 2020 in SWIFT, LuxCSD SA., Islamic Liquidity Management Corporation and Bank for International Settlements.

The assets of the pension fund are recorded in the accounts under "Pension fund" and are valued at the net asset value.

11.3 Accruals and prepaid expenses

Most of this item consists of the accrued interests on monetary policy operations, securities and receivables from the IMF. Also included under this item are the commission receivables and the prepaid expenses, including salaries paid for January 2021.

11.4 Sundry

	2020 EUR	2019 EUR
Others	18 647 771	6 330 367
	18 647 771	6 330 367

As at 31 December 2020, this sub-item mainly comprises the counterpart of the unrealised loss on SDR recorded in the financial statements of the BCL amounting to 15.4 million euro, which is guaranteed by the Government of Luxembourg according to the agreement signed in May 1999 establishing the financial relationship between the Government of Luxembourg and the BCL (unrealised loss on SDR of 1.1 million euro as at 31 December 2019).

NOTE 12 - BANKNOTES IN CIRCULATION

This item consists of the BCL's share of the total euro banknotes in circulation.

During 2020, the total value of banknotes in circulation within the Eurosystem increased by 10.98%. According to the allocation key, the BCL had euro banknotes in circulation worth 4 346.6 million euro at the end of 2020 compared with 3 878.2 million euro at the end of 2019.

The value of the euro banknotes actually issued by the BCL in 2020 increased by 0.4% and worth 99.5 billion euro as at 31 December 2020 [99.2 billion euro as at 31 December 2019]. As this was more than the allocated amount, the difference of 95.2 billion euro (95.3 billion euro as at 31 December 2019) is shown under liability sub-item "Net liabilities related to the allocation of euro banknotes within the Eurosystem".

NOTE 13 – LIABILITIES TO EURO AREA CREDIT INSTITUTIONS RELATED TO MONETARY POLICY OPERATIONS DENOMINATED IN EURO

	2020 EUR	2019 EUR
Current accounts (including the minimum reserves)	102 693 604 385	81 314 028 383
Deposit facility	75 606 134 882	19 217 500 000
Fixed-term deposits	-	-
Fine-tuning reverse operations	-	-
Deposits related to margin calls	-	-
	178 299 739 267	100 531 528 383

13.1 Current accounts (covering the minimum reserve system)

Current accounts contain the credit balances on the transaction accounts of credit institutions that are required to hold minimum reserves. Banks' minimum reserve balances have been remunerated since January 1, 1999 at the latest available marginal interest rate used by the Eurosystem in its tenders for main refinancing operations. Since June 2014 the reserve holdings exceeding the required minimum reserves are remunerated at zero per cent or the deposit facility rate, whichever is lower. Starting on 30 October 2019, the Governing Council introduced a two-tier system for reserve remuneration, which exempts part of credit institutions' excess liquidity holdings (i.e. reserve holdings in excess of minimum reserve requirements) from negative remuneration at the rate applicable on the deposit facility. The volume of reserve holdings in excess of minimum reserve requirements that

was exempt at year-end from the deposit facility rate – the exempt tier – was determined as a multiple of six on an institution's minimum reserve requirements. The non-exempt tier of excess liquidity holdings continues to be remunerated at the lower of either zero percent or the deposit facility rate. This new reserve remuneration system has a significant downward impact on Eurosystem monetary income and, therefore, on BCL income.

13.2 Deposit facility

This sub-item comprises the standing facility allowing credit institutions to make overnight deposits with the BCL at a pre-specified interest rate.

13.3 Fixed-term deposits

This sub-item comprises deposits made at the BCL for the purpose of absorbing market liquidity in connection with fine-tuning operations in the Eurosystem.

13.4 Fine-tuning reverse operations

This sub-item comprises other monetary policy operations aimed at tightening liquidity.

13.5 Deposits related to margin calls

This sub-item comprises deposits made by credit institutions to compensate for the decrease in the value of securities pledged as collateral, below an established trigger point, for other credits granted to these same institutions.

NOTE 14 – LIABILITIES TO OTHER EURO AREA RESIDENTS DENOMINATED IN EURO

This item records the amounts as follows:

	2020 EUR	2019 EUR
Liabilities to general government	1 797 957 585	2 183 296 436
Current accounts	-	1
Account related to euro in coins issued by the Treasury	315 581 290	309 758 446
Specific account of the State	341 094 064	353 334 064
Fixed-term deposit of the State	128 666 774	132 128 353
Other liabilities to general government	1 012 615 457	1 388 075 572
Other liabibilities	751 953 077	666 884 605
	2 549 910 662	2 850 181 041

As at 31 December 2020, this position amounted to 2 549.9 million euro (2019: 2 850.2 million euro).

In accordance with the amendment of 10 April 2003 to the agreement between the Government of Luxembourg and the BCL establishing their financial relationship, the "Account related to euro coins issued by the Treasury" corresponds to the amount of coins issued by the BCL in the name and for the account of the Treasury.

The specific account was opened for the State of Luxembourg in 2011 in order to realise operations with the IMF

The State of Luxembourg 's fixed-term deposit relates to the above-mentioned agreement.

The other liabilities to general government mainly include a current account of an European institution (see note 2.14 "Changes in accounts classification").

NOTE 15 - LIABILITIES TO NON-EURO AREA RESIDENTS DENOMINATED IN EURO

This item includes current accounts and deposits held by central banks, banks, international and supranational institutions and other account holders outside the euro area.

NOTE 16 - LIABILITIES TO NON-EURO AREA RESIDENTS DENOMINATED IN FOREIGN CURRENCY

This item includes current accounts and deposits in foreign currency held by central banks outside the euro area.

NOTE 17 - COUNTERPART OF SPECIAL DRAWING RIGHTS ALLOCATED BY THE IMF

The amount shown under this item represents the countervalue of SDR, converted to euro at the same rate as applied to the SDR assets, which should be returned to the IMF in the event of the SDR being cancelled, the SDR Department established by the IMF being closed or if Luxembourg decides to withdraw from it. This liability, of unlimited duration, amounts to SDR 246.6 million, or 290.7 million euro as at 31 December 2020 (SDR 246.6 million, or 304.3 million euro on 31 December 2019).

NOTE 18 - INTRA-EUROSYSTEM LIABILITIES

18.1 Net liabilities related to the allocation of euro banknotes within the Eurosystem

This item consists of the liabilities of the BCL vis-à-vis the Eurosystem relating to the allocation of euro banknotes within the Eurosystem as explained in Note 12. The net position bears interest at the marginal interest rate applying to the main refinancing operations.

NOTE 19 - OTHER LIABILITIES

This item comprises mainly the accrued interest, miscellaneous expenses payable, including suppliers, and the Luxembourg francs banknotes not yet returned.

The Luxembourg franc banknotes still circulating as at 31 December 2020 amount to 5.0 million euro (5.0 million euro on 31 December 2019).

NOTE 20 - PROVISIONS

Provisions are as follows:

	2020 EUR	2019 EUR
Provision for banking risks	912 955 342	949 820 296
Provision for pensions	466 095 059	433 980 816
Other provisions	173 000	205 700
	1 379 223 401	1 384 006 812

20.1 <u>Provision for banking risks</u>

Provision for banking risks includes the following items:

Provisions for specific banking risks	2020 EUR	2019 EUR
Provision for market and credit risk	166 030 000	587 001 204
Provision for monetary policy operations	-	257 784
Provision covering operational risk	9 940 000	11 360 000
Provision covering liquidity risk	24 244 973	23 585 939
	200 214 973	622 204 927
Provisions for general banking risks	2020 EUR	2019 EUR
Other provision for general banking risks	712 740 369	327 615 369
	712 740 369	327 615 369

The total financial base of the BCL composed of provision for banking risks and the BCL equity (capital and reserves) amounts to 1 114.3 million (31 December 2019: 1 149.5 million euro), which represents only 0.39% of the total assets (31 December 2019: 0.55% of the total assets).

Yet this situation goes against the ECB recommendations on 7 September 2012 in relation to the capital increase of the BCL (CON/2012/69) in which it is noted that: "The principle of financial independence requires a national central bank (NCB) within the European System of Central Banks (ESCB) to have sufficient means not only to perform its ESCB or Eurosystem-related tasks, but also its national tasks, e.g. financing its administration and own operations. [...] Financial independence primarily implies that an NCB should always be sufficiently capitalised. [...] In particular, the ECB is of the view that the higher the level of capital, reserves and provisions against financial risks is, the higher the safeguards against future losses are."

20.1.1 Provision for market and credit risk

In 2020, the BCL decided to change its methodology for the calibration of the provision for the market and credit risk, from a flat rate method to a new one based on the calculation of the "Values at Risk" of the invested assets, to better align the provision to the considered assets risks.

Taking into account the new methodology, the provision for the market and credit risk amounts to 166 million euro as at 31 December 2020 (587 million euros as at 31 December 2019).

20.1.2 Provision for monetary policy operations

In accordance with Article 32.4 of the ESCB Statute, this provision is allocated between the NCB of participating Member States in proportion to their subscribed capital key shares in the ECB prevailing in the year when the initial impairment occurred.

As at 31 December 2020, following the result of the annual impairment test, the Governing Council concluded that no impairment losses occurred for the monetary policy portfolios.

With respect to the provisions established in 2018 and adjusted in 2019 by all the national central banks of participating Member States with regard to credit risks in monetary policy operations, an amount of 64 million euro was used to cover the loss realised after the sale in 2020 of impaired securities held by one of the Eurosystem NCBs under the CSPP. Out of this amount, 183 424 euro were covered by the provision established in 2019 by the BCL.

The residual amount of the provisions established by the national central banks of participating Member States after the coverage of the realised loss resulted in a cumulative unused balance of 26 million euro which is reflected in the profit and loss accounts of the national central banks of participating Member States (NCBs) in proportion to their subscribed capital key shares in the ECB prevailing in 2018 (the year when the initial impairment occurred). For the BCL, this amount was 74 360 euro.

As at 31 December 2020, the provision for monetary policy operations is nil (2019: 257 784 euro).

20.1.3 Provision covering operational risk

This provision is intended to cover the risk of losses resulting from the inadequacy or fault attributable to procedures, to the human factor or to the BCL's systems or to external causes. Because of a lack of relevant statistics on the dimension of risk, the transfer to the provision is based on the Basic Indicator Approach described in the consultative working paper of the Basel Committee as being 15% of the average for the last three years of the net banking product (including payments allocated on monetary income).

In 2020, the average has been based on previous years in accordance with these rules.

20.1.4 Other provision for general banking risks

This provision is intended to cover non-specific risks of losses resulting from central bank's activities. Due to the uncertainties of the financial markets, those risks cannot be quantified in advance.

The BCL decided to allocate as at 31 December 2020 an amount of 385.1 million euro to the Other provision for general banking risks, which increased from 327.6 million euro as at 31 December 2019 to 712.7 million euro as at 31 December 2020.

20.2 <u>Provision for pensions</u>

Provision for pensions include the following items:

	2020 EUR	2019 EUR
Provision for pensions	466 095 059	433 980 816
	466 095 059	433 980 816

In accordance with its Organic Law, the statutory pensions (first pillar) of its staff members are fully borne by the BCL.

The financing of pension obligations is provided on the one hand through deductions from wages and salaries in accordance with the rules governing the pension regime at the BCL and the other hand by payments made by the BCL.

In line with the obligation of its Organic Law to support the entirety of legal pension costs (first pillar) of its staff members, the BCL bodies decided for 2020 to increase the provision for pensions by an additional contribution of 20.7 million euro.

The pension liabilities of the employer vis-à-vis all its staff members amounted to 466.1 million euro at 31 December 2020 compared with 434.0 million euro at 31 December 2019.

The increase of 32.1 million euro in pension liabilities in 2020 includes mainly:

- salary and wage deductions (employees' share) accounting for 3.8 million euro;
- a transfer from the Pension fund reserve account (adjustment of the actuarial value of pension fund assets) to the provision for pensions account for 3.5 million euro;
- notional employer's share calculated on gross salary and wage for 7.8 million euro;
- an additional contribution from the BCL of 20.7 million euro resulting from the pension liabilities' revaluation;
- pension payments for retired staff members of 3.7 million euro.

The demographic, economic and financial assumptions applied as part of the assessment of pension liabilities at 31 December 2020 are as follows:

Discount rate	3.70%
Wage growth rate (incl. index)	3.30%
Expected return on plan assets	4.00%
Pension growth rate (incl. index)	2.35%
Mortality table	German DAV 2004R tables
Disability rate	0.50%
Staff turnover	0.00%

For all practical purposes, it should be noted with the application of the measurement features from IAS 19 accounting standard, which do not apply to the BCL to determine the pension liabilities, these would be increased to reach an amount of 1 038.6 million euro.

This standard requires both the use of actuarial method of projected unit credit, as applied by the BCL, and the use of a discount rate corresponding to the Eurozone "corporate" bond rate with an AA rating and a duration - at value date - reflecting those of the liabilities. For the fiscal year 2020, this rate was estimated at 0.90%.

NOTE 21 - REVALUATION ACCOUNTS

	2020 EUR	2019 EUR
Gold	95 215 025	81 989 894
Foreign Currency	19 410 343	47 212 518
Securities and other instruments	10 995 907	16 861 980
	125 621 275	146 064 392

This item includes positive revaluation differences related to the spread between the exchange rate as at year-end and the average exchange rate of the BCL's currency and gold positions, as well as positive revaluation differences related to the spread between the market value as at year-end and the amortised cost for securities positions.

NOTE 22 - CAPITAL AND RESERVES

22.1 Capital

The State of Luxembourg is the sole shareholder of the BCL's capital for an amount of 175 million euro (unchanged since June 2009).

22.2 Reserves

The reserves amount to 24.6 million euro (22.7 million euro on 31 December 2019). This amount was increased by 1.99 million euro following the allocation of profit for 2019 according to the decision of the BCL's Council in application of its Founding Law (Article 31).

NOTE 23 - SECURITIES RECEIVED AS COLLATERAL

This item includes the securities received as collateral from Luxembourg credit institutions to cover their liabilities related to refinancing operations, marginal lending facilities and intra-day credits.

This item also includes the securities received as collateral in Luxembourg and used as a guarantee by commercial banks incorporated in other member states according to the "Correspondent Central Banking Model" (CCBM). This agreement allows commercial banks to obtain funding from their country of residence's central bank by using the securities held in another Member State as a guarantee.

As at 31 December 2020, the market value of these securities amounts to 180.7 billion euro (130.0 billion euro on 31 December 2019).

NOTE 24 - FOREIGN RESERVE ASSETS MANAGED ON BEHALF OF THE ECB

This item includes the foreign currency reserves at market value managed by the BCL on behalf of the ECB.

NOTE 25 - FUTURES

These items contained as at 31 December 2020 the purchases and sales of interest rate futures presented at notional amount. These transactions are conducted in the context of the management of the BCL's own investments.

NOTE 26 - NET INTEREST INCOME

This item includes interest income and expense.

For harmonised presentational purposes in the Eurosystem, interest income and interest expense on monetary policy operations are netted on a balance sheet sub-item level either as "interest income" or as "interest expense", according on the positive or negative net amount.

Interest income and expense are as follows:

	Amounts in foreign currency	Amounts in euro	Total
Composition of interest income	EUR 2020	EUR 2020	EUR 2020
IMF	1 283 891	-	1 283 891
Lending to euro area credit institutions related to monetary policy operations	-	3 509	3 509
Current accounts (including minimum reserves) and deposits related to monetary policy operations	-	536 418 458	536 418 458
Securities held for monetary policy purposes	-	19 739 416	19 739 416
Other securities	3 105 631	6 501 991	9 607 622
Other	4 901 070	24 670 778	29 571 848
Total	9 290 592	587 334 152	596 624 744
Composition of interest expense	Amounts in foreign currency	Amounts in euro	Total
Composition of interest expense	EUR 2020	EUR 2020	EUR 2020
IMF	(624 856)	-	(624 856)
Lending to euro area credit institutions related to monetary policy operations	-	(69 550 470)	[69 550 470]
Interest on swap operation	-	[1 224 824]	(1 224 824)
Other liabilities	(3 070 231)	(3 258 381)	[6 328 612]
Total	(3 695 087)	(74 033 675)	(77 728 762)

Commonsister of interest in common	Amounts in foreign currency	Amounts in euro	Total
Composition of interest income	EUR 2019	EUR 2019	EUR 2019
IMF	6 050 692	-	6 050 692
Lending to euro area credit institutions related to monetary policy operations	-	2 861	2 861
Current accounts (including minimum reserves) and deposits related to monetary policy operations	-	482 087 166	482 087 166
Securities held for monetary policy purposes	-	22 962 462	22 962 462
Interest on swap operation	-	2 628 084	2 628 084
Other securities	4 040 961	7 454 482	11 495 443
Other	13 675 840	23 236 973	36 912 813
Total	23 767 493	538 372 028	562 139 521
Communities of interest community	Amounts in foreign currency	Amounts in euro	Total
Composition of interest expense	EUR 2019	EUR 2019	EUR 2019
IMF	(3 041 433)	-	(3 041 433)
Lending to euro area credit institutions related to monetary policy operations	-	(20 161 040)	(20 161 040)
Other liabilities	(14 138 341)	(10 496 801)	(24 635 142)
Total	(17 179 774)	(30 657 841)	(47 837 615)

NOTE 27 - REALISED GAINS / (LOSSES) ARISING FROM FINANCIAL OPERATIONS

This item includes the results from transactions in foreign currencies, from securities and from financial instruments linked to interest rates and market prices, i.e. realised gains minus realised losses on these transactions. In 2020, they amount to 12.9 million euro (4.5 million euro on 31 December 2019) and to 1.9 million euro (3.4 million euro on 31 December 2019) respectively, giving a net rounded gain of 11.0 million euro (a net rounded gain of 1.2 million euro on 31 December 2019).

NOTE 28 - WRITE-DOWNS ON FINANCIAL ASSETS AND FOREIGN CURRENCY POSITIONS

This item includes revaluation losses on securities for 0.5 million euro (revaluation losses on securities for 0.1 million euro in 2019) and revaluation losses on foreign currency positions for 0.7 million euro (0.3 million euro in 2019).

NOTE 29 - TRANSFER (TO)/FROM PROVISIONS FOR RISKS

This item includes the transfers to and from provisions for banking risks and other provisions.

NOTE 30 - NET RESULT FROM FEES AND COMMISSIONS

Fees and commissions income and expense are as follows:

	Fees and commissions income		Fees and commissions expense	
	EUR 2020	EUR 2019	EUR 2020	EUR 2019
Securities	10 786 219	8 665 039	[11 871 248]	[9 575 436]
Others	1 649 742	1 450 886	[1 139 897]	[1 277 688]
Total	12 435 961	10 115 925	(13 011 145)	(10 853 124)

NOTE 31 - INCOME FROM PARTICIPATING INTERESTS

The ECB's seigniorage income, which arises from the 8% share of euro banknotes allocated to the ECB, as well as the income arising from the securities held under (a) SMP, (b) CBPP3, (c) ABSPP, (d) PSPP and (e) PEPP is distributed in January of the following year by means of an interim profit distribution, unless otherwise decided by the Governing Council. It is distributed in full unless it is higher than the ECB's net profit for the year, and subject to any decisions by the Governing Council to make transfers to the provision for foreign exchange rate, interest rate, credit and gold price risks. The Governing Council may also decide to reduce the amount of the income on euro banknotes in circulation, to be distributed in January, by the amount of the costs incurred by the ECB in connection with the issue and handling of euro banknotes.

In 2020, the BCL received 5.5 million euro from the ECB (7.8 million euro in 2019).

In 2020, the BCL did not receive dividend from its participating interest held in the Bank for International Settlements (BIS) (0.7 million SDR i.e.0.9 million euro in 2019).

In total, this item amounts to 5.4 million euro as at 31 December 2020 (8.7 million euro as at 31 December 2019).

NOTE 32 - NET RESULT OF POOLING OF MONETARY INCOME

Net result of monetary income pooling	2020 EUR	2019 EUR
Net monetary income pooled by the BCL in the Eurosystem	(485 120 742)	(480 192 031)
Net monetary income allocated to the BCL by the Eurosystem	14 215 180	36 848 619
Monetary income reallocation for the year	(470 905 562)	[443 343 412]
Corrections to monetary income reallocation of previous years	[177 474]	(46 093)
Share of provision related to monetary policy operations	257 784	206 735
	[470 825 252]	[443 182 770]

This item contains the monetary income reallocation for 2020, amounting to an expense of 470 905 562 euro (2019: expenses of 443 343 412 euro). In addition there are corrections to monetary income reallocation of previous years amounting to an expense of 177 474 euro (2019: expenses of 46 093 euro), together with the BCL's share of the realised loss in relation to the sale in 2020 of the securities held by an NCB of the Eurosystem in its CSPP portfolio as well as the release of the provision established in 2019 against losses in monetary policy operations portfolio and amounting to 257 784 euro (see note 20.1.2, "Provision for monetary policy operations"), release of 206 735 euro in 2019.

The net expense shown in the net result of monetary income pooling amounted to 470 825 252 euro in comparison to a net expense of 443 182 770 euro in 2019.

The monetary income of each Eurosystem NCB is determined by measuring the actual annual income that derives from the earmarkable assets held against its liability base. The liability base consists mainly of the following items:

- banknotes in circulation;
- liabilities to credit institutions related to monetary policy operations denominated in euro;
- net intra-Eurosystem liabilities resulting from TARGET2 transactions;
- net intra-Eurosystem liabilities related to the allocation of euro banknotes within the Eurosystem;
- accrued interest recorded at quarter-end by each NCB on monetary policy liabilities the maturity of which is one year or longer.

Any interest paid on liabilities included within the liability base is to be deducted from the monetary income to be pooled.

The earmarkable assets consist of the following items:

- lending to euro area credit institutions related to monetary policy operations denominated in euro;
- securities held for monetary policy purposes;
- intra-Eurosystem claims equivalent to the transfer of foreign reserve assets to the ECB;
- net intra-Eurosystem claims resulting from TARGET2 transactions;
- net intra-Eurosystem claims related to the allocation of euro banknotes within the Eurosystem;
- accrued interest recorded at quarter-end by each NCB on monetary policy assets the maturity of which
 is one year or longer;
- a limited amount of each NCBs' gold holdings in proportion to each NCB's capital key share.

The amount of each NCB's monetary income shall be determined by measuring the actual income that derives from the earmarkable assets recorded in its books. As an exception to this, gold is considered as generating no income and the following are considered to generate income at the latest available marginal interest rate used by the Eurosystem in its tenders for main refinancing operations: (i) securities held for monetary purposes under Decision ECB/2009/16 of 2 July 2009 on the implementation of the covered bonds purchase programme, (ii) securities held for monetary policy purposes under Decision ECB/2011/17 of 3 November 2011 on the implementation of the second covered bonds purchase programme and (iii) debt instruments issued by central, regional and local governments and recognised agencies and substitute debt instruments issued by public non-financial corporations under Decision ECB/2020/9 of 3 February 2020 on the implementation of a secondary markets public sector asset purchase programme or Decision ECB/2020/17 of 24 March 2020 on a temporary pandemic emergency purchase programme.

Where the value of an NCB's earmarkable assets exceeds or falls short of the value of its liability base, the difference shall be offset by applying to the value of the difference the latest available marginal rate for the Eurosystem's main refinancing operations.

NOTE 33 - OTHER INCOME

Other income includes revenue for services rendered to third parties, adjustments to prior years' accruals, income from numismatic activities and the recovered functioning costs of EPCO (Eurosystem Procurement Co-ordination Office).

Other income includes also, when appropriate, the BCL's revenue from financial agreements between the Government of Luxembourg and the BCL.

NOTE 34 - STAFF COSTS

	2020 EUR	2019 EUR
Gross wages and salaries	[48 101 623]	[44 980 322]
Other staff costs	(2 282 580)	(2 180 217)
	(50 384 203)	(47 160 539)

This item includes the gross wages and salaries, compensations as well as other staff costs (the employer's share of contributions to the social security scheme and meal vouchers).

The amount relevant to the Board of Directors, including the amounts of the representation expenses as decided by Government in council, amounted to 775 219 euro for the year 2020 (753 945 euro for the year 2019).

As at 31 December 2020, the BCL employed 416 persons (407 on 31 December 2019). The average number of persons working for the BCL from 1 January to 31 December 2020 was 410 (393 for the year 2019).

NOTE 35 - BCL'S CONTRIBUTION TO THE LEGAL PENSION SCHEME OF ITS STAFF

	2020 EUR	2019 EUR
Notional employer's share	(7 795 858)	(7 256 122)
Adjustments to the pension liabilities	(20 731 271)	(2 630 934)
	(28 527 129)	(9 887 056)

This item includes the notional employer's share of the BCL determined on the basis of the gross wages and salaries for an amount of 7.8 million euro as well as the contribution of the BCL for an amount of 20.7 million euro as a result of the revaluation of pension liabilities (see also note 20.2 "Provisions for pensions").

NOTE 36 - OTHER ADMINISTRATIVE EXPENSES

This item includes indemnities incurred in order to align the BCL's workforce to its needs from both a recruitment and a qualification perspective, indemnities for hierarchical responsibility, expenses for external consultants, leasing, cleaning and repairing of buildings and equipment, small goods and materials, other services and supplies. It also includes expenses in relation to the Council meeting amounted to 303 556 euro for 2020, of which 302 241 euro for indemnities and attendance fees paid to the 9 members of the Council (172 817 euro for 2019, of which 167 905 euro for indemnities and attendance fees).

NOTE 37 - DEPRECIATION OF TANGIBLE AND INTANGIBLE ASSETS

This item shows the depreciation applied on buildings, renovations on buildings, furniture and office equipment, computer hardware and software.

NOTE 38 - BANKNOTE PRODUCTION SERVICES

This item shows mainly the costs relating to the production and issue of banknotes denominated in euro.

NOTE 39 - OTHER EXPENSES

This item includes in particular costs relating to numismatic activities.

NOTE 40 - RESULT FOR THE YEAR

	2020 EUR	2019 EUR
Profit for the year	1 671 086	1 990 103
	1 671 086	1 990 103

The fiscal year 2020 shows a profit of 1 671 086 euro (profit of 1 990 103 euro in 2019).

When taking into consideration the BCL's obligation or objective respectively relating to pension (see Note 20.2) and the provision for banking risks (see Note 20.1), the provisional results indicate a trend towards a significant structural loss.



3 ANNEXES

3.1 ECB LEGAL ACTS PUBLISHED IN 2020

Monetary policy

In the field of monetary policy, the European Central Bank has, in particular, adopted the following legal acts:

- Guideline (EU) 2020/1690 of the European Central Bank of 25 September 2020 amending Guideline (EU) 2015/510 on the implementation of the Eurosystem monetary policy framework (ECB/2020/45);
- Guideline (EU) 2020/1692 European Central Bank of 25 September 2020 amending Guideline (EU) 2016/65 on the valuation haircuts applied in the implementation of the Eurosystem monetary policy framework (ECB/2020/46);
- Guideline (EU) 2020/1691 European Central Bank of 25 September 2020 amending Guideline ECB/2014/31 on additional temporary measures relating to Eurosystem refinancing operations and eligibility of collateral (ECB/2020/47);
- Decision (EU) 2020/1264 of the European Central Bank of 8 September 2020 amending Decision (EU) 2019/1743 of the European Central Bank on the remuneration of holdings of excess reserves and of certain deposits (ECB/2020/38);
- Decision (EU) 2020/1143 of the European Central Bank of 28 July 2020 amending Decision (EU) 2020/440 on a temporary pandemic emergency purchase programme (PEPP) (ECB/2020/36);
- Guideline (EU) 2020/634 of the European Central Bank of 7 May 2020 amending Guideline ECB/2014/31
 on additional temporary measures relating to Eurosystem refinancing operations and eligibility of
 collateral (ECB/2020/29);
- Decision (EU) 2020/614 of the European Central Bank of 30 April 2020 amending Decision (EU) 2019/1311
 on a third series of targeted longer-term refinancing operations (TLTRO III) (ECB/2020/25);
- Decision (EU) 2020/440 of the European Central Bank of 24 March 2020 on a temporary pandemic emergency purchase programme (PEPP) (ECB/2020/17);
- Decision (EU) 2020/441 of the European Central Bank of 24 March 2020 amending Decision (EU) 2016/948 on the implementation of the corporate sector purchase programme (CSPP) (ECB/2020/18);
- Decision (EU) 2020/407 of the European Central Bank of 16 March 2020 amending Decision (EU) 2019/1311 on a third series of targeted longer-term refinancing operations (TLTRO III) (ECB/2020/13).

Statistics

In the field of statistics, the European Central Bank has, in particular, adopted the following legal acts:

- Regulation (EU) 2020/2011 of the European Central Bank of 1 December 2020 amending Regulation (EU) 1409/2013 on payment statistics (ECB/2013/43);
- Guideline (EU) 2020/1552 of the European Central Bank of 14 October 2020 amending Guideline ECB/2013/23 on government finance statistics (ECB/2020/50);
- Guideline (EU) 2020/1553 of the European Central Bank of 14 October 2020 amending Guideline ECB/2013/24 on the statistical reporting requirements of the European Central Bank in the field of quarterly financial accounts (ECB/2020/51);
- Guideline (EU) 2020/1554 of the European Central Bank of 14 October 2020 amending Guideline ECB/2011/23 with regard to the frequency of reporting to the European central Bank on the quality of external statistics (ECB/2020/52);
- Guideline (EU) 2020/497 of the European Central Bank of 20 March 2020 on the recording of certain data by national competent authorities in the Register of Institutions and Affiliates Data (ECB/2020/16);
- Guideline (EU) 2020/496 of the European Central Bank of 19 March 2020 amending Guideline (EU) 2019/1265 on the euro short-term rate (€STR) (ECB/2020/15);
- Guideline (EU) 2020/381 of the European Central Bank of 21 February 2020 amending Guideline (EU) 2017/2335 on the procedures for the collection of granular credit and credit risk data (ECB/2020/11).

ECB's Capital

In the field of ECB's Capital, the European Central Bank has, in particular, adopted the following legal acts:

- Decision (EU) 2020/137 of the European Central Bank of 22 January 2020 on the national central banks' percentage shares in the key for subscription to the ECB's capital and repealing Decision (EU)2019/43 (ECB/2020/3);
- Decision (EU) 2020/138 of the European Central Bank of 22 January 2020 on the paying-up of the ECB's capital by the national central banks of Member States whose currency is the euro and repealing Decision (EU) 2019/44 (ECB/2020/4);
- Decision (EU) 2020/139 of the European Central Bank of 22 January 2020 laying down the terms and conditions for transfers of the ECB's capital shares between the national central banks and for the adjustment of the paid-up capital and repealing Decision (EU) 2019/45 (ECB/2020/5);
- Decision (EU) 2020/140 of the European Central Bank of 22 January 2020 laying down the measures
 necessary for the contribution to the ECB's accumulated equity value and for adjusting the national
 central banks' claims equivalent to the transferred foreign reserve assets and repealing Decision (EU)
 2019/46 (ECB/2020/6); and
- Decision (EU) 2020/141 of the European Central Bank of 22 January 2020 amending Decision ECB/2010/29 of the ECB of 13 December 2010 on the issue of euro banknotes (ECB/2020/7).

Banking supervision

In the field of banking supervision, the ECB has adopted, in particular, the following legal acts:

- Recommendation of the European Central Bank of 17 January 2020 on dividend distribution policies (ECB/2020/1);
- Guideline (EU) 2020/497 of the European Central Bank of 20 March 2020 on the recording of certain data by national competent authorities in the Register of Institutions and Affiliates Data (ECB/2020/16);
- Recommendation of the European Central Bank of 27 March 2020 on dividend distributions during the COVID-19 pandemic and repealing Recommendation ECB/2020/1 (ECB/2020/19);
- Regulation (EU) 2020/605 of the European Central Bank of 9 April 2020 amending Regulation (EU) 2015/534 on reporting of supervisory financial information (ECB/2020/22);
- Decision (EU) 2020/1015 of the European Central Bank of 24 June 2020 on the establishment of close cooperation between the European Central Bank and Българска народна банка (Bulgarian National Bank) (ECB/2020/30);

- Decision (EU) 2020/1016 of the European Central Bank of 24 June 2020 on the establishment of close cooperation between the European Central Bank and Hrvatska Narodna Banka (ECB/2020/31);
- Guideline (EU) 2020/978 of the European Central Bank of 25 June 2020 on the exercise of the discretion
 under Article 178(2)(d) of Regulation (EU) No 575/2013 of the European Parliament and of the Council by
 national competent authorities in relation to less significant institutions with regard to the threshold for
 assessing the materiality of credit obligations past due (ECB/2020/32);
- Amendment 1/2020 of 23 July 2020 to the Rules of Procedure of the Supervisory Board of the European Central Bank;
- Recommendation of the European Central Bank of 27 July 2020 on dividend distributions during the COVID-19 pandemic and repealing Recommendation ECB/2020/19 (ECB/2020/35);
- Decision (EU) 2020/1331 of the European Central Bank of 15 September 2020 nominating heads of work units to adopt delegated fit and proper decisions and repealing Decision (EU) 2017/936 (ECB/2020/39);
- Decision (EU) 2020/1332 of the European Central Bank of 15 September 2020 nominating heads of work units to adopt delegated decisions on the significance of supervised entities and repealing Decision (EU) 2017/937 (ECB/2020/40);
- Decision (EU) 2020/1333 of the European Central Bank of 15 September 2020 nominating heads of work units to adopt delegated own funds decisions and repealing Decision (EU) 2018/547 (ECB/2020/41);
- Decision (EU) 2020/1334 of the European Central Bank of 15 September 2020 nominating heads of work units to adopt delegated decisions regarding supervisory powers granted under national law and repealing Decision (EU) 2019/323 (ECB/2020/42);
- Decision (EU) 2020/1335 of the European Central Bank of 15 September 2020 nominating heads of work
 units to adopt delegated decisions on passporting, acquisition of qualifying holdings and withdrawal of
 authorisations of credit institutions and repealing Decision (EU) 2019/1377 (ECB/2020/43);
- Decision (EU) 2020/1306 of the European Central Bank of 16 September 2020 on the temporary exclusion
 of certain exposures to central banks from the total exposure measure in view of the COVID-19 pandemic
 (ECB/2020/44);
- Recommendation of the European Central Bank of 15 December 2020 on dividend distributions during the COVID-19 pandemic and repealing Recommendation ECB/2020/35 (ECB/2020/62).

3.2 BCL REGULATIONS PUBLISHED IN 2020

2020/N° 29 of 31 December 2020

Regulation of the Banque centrale du Luxembourg 2020/N°29 of 31 December 2020 amending Regulation of the Banque centrale du Luxembourg 2014/N°18 of 21 August 2014 implementing Guideline ECB/2014/31 on additional temporary measures relating to the refinancing operations of the Eurosystem and eligibility of collateral.

Field: Monetary Policy

2020/N°28 of 18 May 2020

Regulation of the Banque centrale du Luxembourg 2020/N°28 of 18 May 2020 amending Regulation of the Banque centrale du Luxembourg 2014/N°18 of 21 August 2014 implementing Guideline ECB/2014/31 on additional temporary measures relating to the refinancing operations of the Eurosystem and eligibility of collateral.

Field: Monetary Policy

2020/N°27 of 20 April 2020

Regulation of the Banque centrale du Luxembourg 2020/N°27 of 20 April 2020 amending Regulation of the Banque centrale du Luxembourg 2014/N°18 of 21 August 2014 implementing Guideline ECB/2014/31 on additional temporary measures relating to the refinancing operations of the Eurosystem and eligibility of collateral.

Field : Monetary Policy

For a complete list of regulations published by the BCL, please visit the BCL's website (www.bcl.lu).

3.3 LIST OF BCL CIRCULARS PUBLISHED IN 2020

For a complete list of circulars published by the BCL, please visit the BCL's website (www.bcl.lu).

3.4 LIST OF BCL PUBLICATIONS PUBLISHED IN 2019

3.4.1 BCL bulletins

BCL Bulletin 2020/1, April 2020

For a complete list of bulletins published by the BCL, please visit the BCL's website (www.bcl.lu).

3.4.2 Financial Stability Review

Revue de stabilité financière 2020, July 2020

3.4.3 BCL annual report

- Annual Report 2019, French version, July 2020
- Annual Report 2019, English version, October 2020

For a complete list of annual reports published by the BCL, please visit the BCL's website (www.bcl.lu).

3.4.4 BCL working papers

- Working paper 150, December 2020
 Key Features of Captive Financial Institutions and Money Lenders (sector S127) in Luxembourg,
 by Gabriele Di Filippo and Frédéric Pierret.
- Working paper 149, November 2020
 The impact of tax and infrastructure competition on the profitability of local firms, by Yutao Han, Patrice Pieretti and Giuseppe Pulina.
- Working paper 148, August 2020
 Borrowing constraints, own labour and homeownership: Does it pay to paint your walls?,
 by Peter Lindner, Thomas Y. Mathä, Giuseppe Pulina and Michael Ziegelmeyer.
- Working paper 147, August 2020
 LED: An estimated DSGE model of the Luxembourg economy for policy analysis, by Alban Moura.
- Working paper 146, July 2020
 A Typology of Captive Financial Institutions and Money Lenders (sector S127) in Luxembourg, by Gabriele Di Filippo and Frédéric Pierret.
- Working paper 145, July 2020
 Why is the Ratio of Debt-to-GDP so Large for Non-Financial Companies in Luxembourg?,
 by Gabriele Di Filippo.
- Working paper 144, June 2020
 Housing and inequality: The case of Luxembourg and its cross-border workers,
 by Guillaume Claveres, Thomas Y. Mathä, Giuseppe Pulina, Jan Stráský, Nicolas Woloszko and Michael Ziegelmeyer.

- Working paper 143, May 2020
 Total Factor Productivity and the Measurement of Neutral Technology, by Alban Moura.
- Working paper 142, March 2020
 The Luxembourg Household Finance and Consumption Survey: Results from the third wave,
 by Yiwen Chen, Thomas Y. Mathä, Giuseppe Pulina, Barbara Schuster and Michael Ziegelmeyer.
- Working paper 141, March 2020
 Macroprudential stress testing: A proposal for the Luxembourg investment fund sector, by Kang-Soek Lee.
- Working paper 140, January 2020
 PENELOPE: Luxembourg Tool for Pension Evaluation and Long-Term Projection Exercises,
 by Luca Marchiori.
- Working paper 139, January 2020
 Health Subsidies, Prevention and Welfare,
 by Luca Marchiori and Olivier Pierrard.

For a complete list of working papers published by the BCL, please visit the BCL's website (www.bcl.lu).

3.4.5 BCL brochures

- La Banque centrale du Luxembourg, French version, January 2018
- The Banque centrale du Luxembourg, English version, April 2018
- Die Banque centrale du Luxembourg, German version, April 2018
- Brochure of the BCL's numismatic products (2020)

3.4.6 Information material about the security features of Euro banknotes and coins

For a complete list of the information material concerning the security features of Euro banknotes and coins, please visit the BCL's website (www.bcl.lu).

3.4.7 Publications and external presentations of BCL staff

3.4.7.1 External publications of the BCL's staff members

- Giordana, G., and M. Ziegelmeyer (2020): "Stress testing household balance sheets in Luxembourg", The Quarterly Review of Economics and Finance, 76: 115-138.
- Mathä, T.Y., S. Millard, T. Room, L. Wintr and R. Wyszyński (2020): "Shocks and labour cost adjustment: Evidence from a survey of European firms". Oxford Economic Papers, https://doi.org/10.1093/oep/gpaa041.

3.4.7.2 External presentations

- Household Finance and Consumption Network, European Central Bank, Frankfurt, 2-3 March 2020.
- Séminaire économique du STATEC, Luxembourg, 10 February 2020.
- Comité pour la Protection des Consommateurs Financiers, CSSF, Luxembourg, 23 January 2020.

3.5 EUROPEAN CENTRAL BANK PUBLICATIONS

For a complete list of documents published by the European Central Bank, as well as for the translated versions in all official languages of the European Union, please visit the ECB's website (www.ecb.int).

ORDER: European Central Bank

Postfach 160319 D-60066 Frankfurt am Main http://www.ecb.int

3.6 MONETARY, ECONOMIC AND FINANCIAL STATISTICS PUBLISHED ON THE WEBSITE OF THE BCL

1 Monetary policy statistics

- 1.1 Financial statement of the Banque centrale du Luxembourg
- 1.2 Luxembourg minimum reserve statistics

2 Monetary and financial developments in the euro area and Luxembourg

- 2.1 Aggregated balance sheet of the Luxembourg MFIs (excluding the Banque centrale du Luxembourg)
- 2.2 Liabilities of the Luxembourg MFIs included in the euro area monetary aggregates

3 Capital markets and interest rates

- 3.1 Luxembourg bank interest rates on euro-denominated deposits and loans by euro area residents new business
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3.7 LIST OF ABBREVIATIONS

ABBL	A i - + i	-l D	- + D	Luxemboura
ΔΚΚΙ	Accoriation	nes Ranniles	et Randillers	I IIYAMNAIIRA

ABS Asset-Backed Securities

ATTF Agence de transfert de technologie financière (Luxembourg Agency for the Transfer of Financial Technology)

BCL Banque centrale du Luxembourg
BIS Bank for International Settlement
CCBM Correspondent central banking model

CETREL Centre des transferts électroniques Luxembourg (Center for Electronic Transfers Luxembourg)

CLS Continuous linked settlement

CPMI Committee on Payments and Market Infrastructure

CPSS	Committee	on Payment	and	Settlement

CRD Capital Requirement Directive
CRR Capital Requirement Regulation
CSD Central Securities Depositories

CSSF Commission de surveillance du secteur financier

EBA European Banking Authority

ECAF Eurosystem Credit Assessment Framework

ECB European Central Bank

EFC Economic and Financial Committee
EFSF European Financial Stability Facility

EIB European Investment Bank
EMU Economic and Monetary Union
EPC European Payments Council
ESCB European System of Central Banks
ESM European Stability Mechanism

ESMA European Securities and Markets Authority

ESRB European Systemic Risk Board

EU European Union

EUR Euro

EUROSTAT Statistical office of the European communities

FSB Financial Stability Board
GDP Gross Domestic Product
IMF International Monetary Fund
IML Institut Monétaire Luxembourgeois

10SCO International Organization of Securities Commissions

LCR Liquidity Coverage Ratio
LFF Luxembourg for Finance
LSF Luxembourg School of Finance
LTRO Longer-Term Refinancing Operations

LU Luxembourg

MRA Maximum Risk Allowance
MRO Main Refinancing Operations
NCB National Central Banks
NSFR Net Stable Funding Ratio

OECD Organisation for Economic Cooperation and Development

PBC People's Bank of China
SDR Special Drawing Rights
SEPA Single European Payment Area
SSM Single Supervisory Mechanism
SSS Securities settlement system

STATEC Institut national de la statistique et des études économiques (National Institute for Statistics

and Economic Studies)

TARGET Trans-European Automated Real-time Gross settlement Express Transfer system

TFEU Treaty on the Functioning of the European Union

UCI Undertaking for Collective Investments

UCITS Undertaking for Collective Investments in Transferable Securities

USD US Dollar

3.8 GLOSSARY

<u>Balance of payments (b.o.p.)</u>: a statistical statement that summarises, for a specific period of time, the economic transactions of an economy with the rest of the world. The transactions considered are those involving goods, services and incomes; those involving financial claims on, and liabilities to, the rest of the world; and those (such as debt forgiveness) that are classified as transfers.

<u>Central securities depository (CSD)</u>: an entity that (i) enables securities transactions to be processed and settled by book entry, and (ii) provides custodial services (e.g. the administration of corporate actions and redemptions), and (iii) plays an active role in ensuring the integrity of securities issues. Securities can be held in physical (but immobilised) form or in dematerialized form (whereby they exist only as electronic records).

<u>Collateral</u>: assets pledged or otherwise transferred (e.g. by credit institutions to central banks) as a guarantee for the repayment of loans, as well as assets sold (e.g. by credit institutions to central banks) under repurchase agreements.

<u>Corporate sector purchase programme (CSPP)</u>: On 10 March 2016, the Governing Council decided to establish a new programme to purchase investment-grade euro-denominated bonds issued by non-bank corporations established in the euro area with the aim of further strengthening the pass-through of the conventional policy measures to the real economy by improving directly the financing conditions of the euro area companies.

Correspondent Central Banking Model (CCBM): a mechanism established by the European System of Central Banks with the aim of enabling counterparties to use eligible collateral on a cross-border basis. In the CCBM, NCBs act as custodians for one another. Each NCB has a securities account in its securities administration for each of the other NCBs (and for the European Central Bank).

<u>Council of the European Union</u>: the institution of the EU made up of representatives of the governments of the EU Member States, normally ministers responsible for the matters under consideration and the relevant European Commissioner (see also ECOFIN Council).

Counterparty: the opposite party in a financial transaction (e.g. any party transacting with a central bank).

Covered bond purchase programmes (CBPP, CBPP2 and CBPP3): an ECB programme, based on the decision of the Governing Council of 7 May 2009 to purchase euro-denominated covered bonds issued in the euro area in support of a specific financial market segment that is important for the funding of banks and was particularly affected by the financial crisis. The purchases under the programme were for a nominal value of 60 billion euro and they were fully implemented by 30 June 2010. On 6 October 2011 the Governing Council decided to launch a second covered bond purchase programme, the CBPP2. Between November 2011 and October 2012, a nominal amount of € 16.4 billion was purchased on the primary and secondary markets. The CBBP2 ended in November 2012. On 4 September 2014, the Governing Council decided to launch a new euro-denominated covered bonds purchase programme (CBPP3) in the primary and secondary markets.

<u>CPMI-IOSCO</u>: The Committee on Payments and Market Infrastructures (CPMI) promotes the safety and efficiency of payment, clearing and securities settlement related arrangements. The CPMI monitors and analyses developments in these arrangements and is a global standard setter in this area. It also serves as a forum for central bank cooperation in related oversight, policy and operational matters.

The International Organization of Securities Commissions (IOSCO) is a body that brings together the world's securities regulators. The organization develops among others internationally recognized standards of regulation, oversight and enforcement aiming at protecting investors and promoting integrity of securities markets.

<u>Credit institution</u>: 1) an undertaking whose business is to receive deposits or other repayable funds from the public and to grant credits for its own account; or 2) an undertaking or any other legal person, other than those under (1), which issues means of payment in the form of electronic money. The most common types of credit institutions are banks and saving banks. See also electronic money (e-money).

<u>ECOFIN Council</u>: Council of the European Union reuniting/meeting at the level of the ministers of economics and finance.

Economic and Financial Committee (EFC): a committee which contributes to the preparation of the work of the ECOFIN Council and the European Commission. Its tasks include reviewing the economic and financial situation of both Member States and the EU, and contributing to budgetary surveillance.

<u>Electronic money (e-money)</u>: An electronic store of monetary value on a technical device that may be widely used as prepaid bearer instrument for making payments to undertakings other than the issuer, without necessarily involving bank accounts in the transactions.

<u>Euro</u>: The name of the European single currency adopted by the European council at its meeting in Madrid on 15 and 16 December 1995 and used instead of the term ECU originally employed in the Treaty.

<u>EURO1</u>: Multilateral net payment system providing same-day settlement at a pan-European level. EURO1 is operated by EBA Clearing and settles large-value interbank payments in euro.

<u>Euro area</u>: the area encompassing those Member States which have adopted the euro as the single currency in accordance with the Treaty and in which a single monetary policy is conducted under the responsibility of the Governing Council of the European Central Bank. The euro area currently comprises Austria, Belgium, Cyprus, Estonia, Finland, France, Germany, Greece, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, the Netherlands, Portugal, Slovakia, Slovenia, and Spain.

<u>Eurogroup</u>: an informal gathering of the ministers of economy and finance of the EU Member States whose currency is the euro.

<u>European Central Bank (ECB)</u>: the ECB lies at the centre of the Eurosystem and the European System of Central Banks (ESCB) and has its own legal personality in accordance with the Treaty (ARTICLE 282(3)). It ensures that the tasks conferred upon the Eurosystem and the ESCB are implemented either through its own activities or through those of the NCBs, pursuant to the Statute of the ESCB and the ECB. The Eurosystem and the SEBC are governed by the decision-making bodies of the ECB, i.e. by the Governing Council, by the Executive Board, and, as a third decision-making body, by the General Council.

<u>European Financial Stabilisation Mechanism (EFSM)</u>: a European Union facility, based on Article 122(2) of the Treaty, enabling the Commission to raise up to € 60 billion on behalf of the European Union to finance loans to EU Member States experiencing serious difficulties or a serious threat of such difficulties due to exceptional events beyond their control. The loans thus granted are subject to strict conditionality under the joint programmes of the European Union and the IMF.

European Financial Stability Facility (EFSF): a limited liability company established by the euro area counterparties, on an intergovernmental basis, for the purpose of providing loans to the euro area countries in financial difficulties. Such financial assistance is subject to strong conditionality in the context of joint EU-IMF programmes. The EFSF has an effective lending capacity of € 440 billion, and its loans are financed through the issuance of debt securities, guaranteed by euro area countries on a pro rata basis.

<u>European Stability Mechanism (ESM)</u>: an organisation established by the euro area countries, on an intergovernmental basis, offering a permanent crisis management mechanism, which aims to provide emergency financial support to euro area countries in need with a view to safeguarding the financial stability of the euro area as a whole. Its effective lending capacity is €500 billion and is subject to strict conditionality.

<u>European System of Central Banks (ESCB)</u>: composed of the European Central Bank (ECB) and the NCBs of all 28 EU Member States, i.e. it includes, in addition to the members of the Eurosystem, the NCBs of those Member States whose currency is not the euro. The ESCB is governed by the Governing Council and the Executive Board of the ECB, and, as a third decision-making body of the ECB, by the General Council.

<u>European Systemic Risk Board (ESRB)</u>: an independent EU body responsible for the macro-prudential oversight of the financial system within the EU. It contributes to the prevention or mitigation of systemic risks to financial stability that arise from developments within the financial system, taking into account macroeconomic developments, so as to avoid periods of widespread financial distress.

<u>Eurosystem</u>: the central banking system of the euro area. It comprises the European Central Bank and the NCBs of the Member States that have adopted the euro.

<u>Executive Board</u>: one of the decision-making bodies of the ECB. It comprises the President and the Vice-President of the ECB and four other members appointed by the European Council, acting by a qualified majority, on a recommendation from the EU Council, after it has consulted the European Parliament and the ECB.

Expanded Asset Purchase Programme (APP): Following the first and second covered bond purchase programmes (CBPP and CBPP2) conducted respectively in 2009-10 and 2011-12, the expanded asset purchase programme (APP) includes all purchase programmes under which private sector securities and public sector securities are purchased to address the risks of a too prolonged period of low inflation. It consists of the third covered bond purchase programme (CBPP3), the asset-backed securities purchase programme (ABSPP), the public sector purchase programme (CSPP) and the corporate sector purchase programme (CSPP).

Fiduciary money: banknotes and coins having the status of legal tender.

<u>Financial stability</u>: condition in which the financial system- comprising financial intermediaries, markets and market infrastructures- is capable of with standing shocks and the unraveling of financial imbalances, thereby mitigating the likelihood of disruptions in the financial intermediation process which are severe enough to significantly impair the allocation of savings to profitable investment opportunities.

<u>Fine-tuning operations</u>: an open market operation executed by the Eurosystem in order to deal with unexpected liquidity fluctuations in the market. The frequency and maturity of fine-tuning operations are not standardised.

<u>G10</u>: The Group of Ten (G10) refers to the group of countries that have agreed to participate in the General Arrangements to Borrow (GAB), a supplementary borrowing arrangement that can be invoked if the IMF's resources are estimated to be below member's needs. The GAB was established in 1962, when the governments of eight IMF members—Belgium, Canada, France, Italy, Japan, the Netherlands, the United Kingdom, and the United States—and the central banks of two others, Germany and Sweden, agreed to make resources available to the IMF for drawings by participants and, under certain circumstances, for drawings by nonparticipants.

<u>G20</u>: The Group of Twenty (G20), refers to a group of key advanced and emerging market economies that was created in 1999, in response to the financial crisis in the late 1990s, to modernise the international financial architecture, strengthen policy coordination between its members, and promote financial stability. In recent years it has increasingly influenced the debate on the global economic and financial policy agenda.

The membership of the G20 comprises the G7 countries (Canada, France, Germany, Italy, Japan, United Kingdom and the United States), Argentina, Australia, Brazil, China, India, Indonesia, Mexico, Russia, Saudi Arabia, South Africa, South Korea, Turkey and the European Union, which is represented by the rotating Council Presidency and the European Central Bank.

Jointly G20 members represent about 85 per cent of global gross domestic product, over 75 per cent of global trade, and two-thirds of the world's population.

<u>General Council</u>: one of the decision-making bodies of the European Central Bank (ECB). It comprises the President and the Vice-President of the ECB and the governors of all the NCBs of the European System of Central Banks.

<u>Governing Council</u>: supreme decision-making body of the European Central Bank (ECB). It comprises all the members of the Executive Board of the ECB and the governors of the NCBs of the Member States that have adopted the euro.

<u>Harmonised index of the consumer prices (HICP)</u>: a measure of the development of consumer prices that is compiled by Eurostat and harmonised for all EU Member states.

<u>Key ECB interest rates</u>: the interest rates, set by the Governing Council, which reflect the monetary policy stance of the European Central Bank. They are the rates on the main refinancing operations, the marginal lending facility and the deposit facility.

<u>Longer-term refinancing operations</u>: a regular open market operation executed by the Eurosystem in the form of reverse transactions. Such operations are carried out through a monthly standard tender and normally have a maturity of three months. During the financial market turmoil that started in August 2007, supplementary operations with maturities ranging from one maintenance period to one year were conducted, the frequency of which varied.

<u>Main refinancing operations</u>: a regular open market operation executed by the Eurosystem in the form of reverse transactions. Such operations are carried out through a weekly standard tender and normally have a maturity of one week.

MFIs (monetary financial institutions): financial institutions which together form the money issuing sector of the euro area. These include the Eurosystem, resident credit institutions (as defined by Community law) and all other resident financial institutions whose business is to receive deposits and/or close substitutes for deposits from entities other than MFIs and, for their own account (at least in economic terms), to grant credit and/or invest in securities. The latter group consists predominantly of money market funds.

Open market operations: an operation executed on the initiative of a central bank to influence the financial market. With regard to their aims, regularity and procedures, Eurosystem open market operations can be divided into four categories: main refinancing operations; longer-term refinancing operations; fine-tuning operations; and structural operations. As for the instruments used, reverse transactions are the main open market instrument of the Eurosystem and can be employed in all four categories of operations. In addition, the issuance of debt certificates and outright transactions are available for structural operations, while outright transactions, foreign exchange swaps and the collection of fixed-term deposits are available for the conduct of fine-tuning operations.

<u>Outright Monetary Transactions (OMTs)</u>: transactions that aim to safeguard an appropriate monetary policy transmission and the singleness of the monetary policy in the euro area through purchases of euro area government bonds in the secondary market based on strict and effective conditionality.

Outright transaction: A transaction whereby assets are bought or sold up to their maturity (spot or forward).

<u>Price Stability</u>: the maintenance of price stability is the primary objective of the Eurosystem. The Governing Council defines price stability as a year-on-year increase in the Harmonised Index of Consumer Prices for the euro area below 2%. The Governing Council has also made it clear that, in the pursuit of price stability, it aims to maintain inflation rates below, but close to, 2% over the medium term.

<u>Public sector purchase programme (PSPP)</u>: On 22 January 2015 the Governing Council expanded its scope of intervention by announcing a securities purchase programme in the public sector (PSPP) scheduled to start on 09 March 2015. The PSPP was the latest of a suite of asset purchase programmes (APP), which included the asset-backed securities (ABSPP) and the covered bonds (CBPP3), aimed at addressing the risk of a of a too prolonged period of low inflation.

The secondary market transactions conducted under the PSPP include high quality euro-denominated instruments issued by the euro area central governments - or by regional and local governments that meet all other eligibility criteria - or by eligible international or supranational institutions and agencies established in the euro area.

The share of purchases in a national central bank's home market is conducted in proportions reflecting the respective share of the national central bank in the ECB's capital key.

Additional eligibility criteria apply to countries subject to an EU-IMF macroeconomic adjustment programme.

Real-time gross settlement (RTGS) system: a settlement system in which processing and settlement take place on a transaction-by transaction basis in real time (see also TARGET2).

SDR (Special Drawing Rights): The SDR was created by the IMF in 1969 as an international reserve asset to supplement its member countries' official reserves. Its value is currently based on a basket of four key international currencies: the euro, the Japanese yen, the pound sterling, and the US dollar. The SDR is neither a currency, nor a claim on the IMF. Rather, it is a potential claim on the freely usable currencies of IMF members.

<u>Securities Markets Programme (SMP)</u>: a programme set up in May 2010 for conducting interventions in the euro area public and private debt securities markets to ensure depth and liquidity in dysfunctional market segments with a view to restoring an appropriate monetary policy transmission mechanism. The SMP was terminated when the technical features of the Outright Monetary Transactions were announced on 6 September 2012.

<u>Securities settlement system (SSS)</u>: a system which allows the transfer of securities, either free of payment or against payment (delivery versus payment).

Single Resolution Mechanism (SRM): the European banking resolution system, composed of the Single Resolution Board (SRB), together with the Council and the Commission and the national resolution authorities of the participating Member States. Together with the Single Supervisory Mechanism, the SRM is one of the three pillars of the European Banking Union.

<u>Single Supervisory Mechanism (SSM)</u>: the European banking supervisory system composed of the ECB and the national supervisory authorities and national central banks of the participating Member States. Together with the SRM, the SSM is one of the three pillars of the European Banking Union.

Stability and Growth Pact (SGP): intended to serve as a means of safeguarding sound government finances in the EU Member States in order to strengthen the conditions for price stability and for strong, sustainable growth conducive to employment creation. The SGP has two arms – a preventive arm and a corrective arm. The preventive arm prescribes that Member States specify medium-term budgetary objectives, while the corrective arm contains concrete specifications on the excessive deficit procedure.

<u>Standing Facilities</u>: Standing facilities aim to provide and absorb overnight liquidity, signal the general monetary policy stance and bound overnight market interest rates. Two standing facilities, which are administered in a decentralised manner by the NCBs, are available to eligible counterparties on their own initiative: the marginal lending facility and the deposit facility.

<u>STEP2</u>: Pan-European Automated Clearing House (PE-ACH) for retail payments in euro. The clearing house is operated by EBA Clearing.

<u>Systemic Risk</u>: the risk that the inability of one participant to meet its obligations in a system will cause other participants to be unable to meet their obligations when due, with possible spillover effects such as significant liquidity or credit problems that may threaten the stability of the financial system. Such inability may be caused by operational or financial problems.

<u>TARGET2</u>: the second-generation TARGET system. It settles payments in euro in central bank money and functions on the basis of a single shared IT platform, to which all payment orders are submitted for processing.

<u>TARGET2-Securtities (T2S)</u>: the Eurosystem's single technical platform enabling central securities depositories and NCBs to provide core, borderless and neutral securities settlement services in central bank money in Europe.

Treaty on the Functioning of the European Union (TFEU): Following entry into force of the Treaty of Lisbon on 1 December 2009, the Treaty establishing the European Community was renamed the Treaty on the Functioning of the European Union (TFEU). This Treaty - referred to as the Treaty of Rome (signed in Rome on 25 March 1957) - entered into force on 1 January 1958 to establish the European Economic Community (EEC). The Treaty establishing the European Community was subsequently amended by the Treaty on European Union (often referred to as the Maastricht Treaty) which was signed on 7 February 1992 and entered into force on 1 November 1993, thereby establishing the EU. Thereafter, both the Treaty establishing the European Community and the Treaty on the European Union were amended by the Treaty of Amsterdam, signed on 1 October 1997 and in force as of 1 May 1999, the Treaty of Nice, signed on 28 February 2001 and in force as of 1 February 2003, and then by the Treaty of Lisbon.

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