Assets pledged in financing activities

At the end of 2015, there are certain financial assets pledged in financing operations, i.e. offered as collateral or guarantee for certain liabilities. Such assets correspond mainly to loans linked to the issue of mortgage covered bonds, territorial bonds or long-term securitisation bonds (see Note 21 and Schedules III and IV of the 2015 consolidated annual accounts). The remaining pledged assets are debt securities that are submitted in operations of assets ceded under repurchase agreements, pledged collateral (loans or debt instruments) to access certain financing operations with central banks and all types of collateral provided to guarantee derivatives.

On the other hand, the bank has used part of its loan portfolio and harmonised loans in fixed income securities by transferring assets to various securitisation funds created for this purpose. Under current regulations, securitisations where there is no substantial risk transfer cannot be derecognised from the balance sheet (further details on securitisation funds are included in Schedule II of the 2015 consolidated annual accounts).

For further information on funding programs in the capital market, refer to the section below on liquidity risk.

Liquidity risk

Description

Liquidity risk arises from the possibility of losses being incurred as a result of the bank's being unable, albeit temporarily, to honour payment commitments due to a lack of liquid assets, or of its being unable to access the markets to refinance debts at a reasonable cost. This may be associated with factors of a systemic nature or specific to the bank itself.

The group is exposed to daily demands on its available cash resources to meet contractual obligations related to financial instruments with which it trades, such as maturing deposits, drawdowns of credit facilities, settlements of derivatives, and so on. Experience shows, however, that only a minimum amount is ever actually required and this can be predicted with a high degree of confidence.

In this regard, the objective of the Banco Sabadell group is to maintain liquid assets and a financing structure that, in line with its strategic objectives and based on its risk appetite statement, allows it to fulfil its payment commitments normally and at a reasonable cost, under business as usual conditions or under a stress situation caused by both systemic and idiosyncratic factors.

In order to fulfil these objectives, the group's current liquidity risk management plan is based on the following principles and pillars, serving the group's retail business model and defined strategic objectives:

- Involvement of the Board of Directors and Senior Management in the management and control of liquidity risk and funding.
- Clear segregation of functions between the different areas of the organisation, with a clear delineation of the three lines of defence, providing independence in the valuation of positions and in risk control and analysis.
- Decentralised liquidity risk management system for the most significant units, but with a centralised risk monitoring and management system.
- Sound processes of identification, measurement, management, control and information of the different liquidity and financing risks facing the group.
- Existence of a price transfer system to transfer financing costs.
- Balanced financing structure, based primarily on customer deposits.
- Wide range of unencumbered and immediately available liquid assets to generate liquidity, which make up the group's first line of defence.
- Diversification of funding sources, with controlled use of short-term wholesale funding and which is not dependent on providers of individual funds.
- Self-funding of significant foreign banking subsidiaries.
- Oversight of the level of encumbrance of the group's balance sheet.
- Maintenance of a second line of liquidity that makes up the capacity of issuing mortgage covered bonds and territorial bonds.
- Availability of a liquidity contingency plan.

Liquidity management

The purpose of managing liquidity in Banco Sabadell is to guarantee the financing of commercial activities at an adequate cost and within a reasonable time frame, thus minimising the liquidity risk. In recent years, the bank's financing policy has focused on generating a liquidity gap in commercial business, reducing total financing in wholesale markets (which stood at €27,436 million at the end of 2015) and increasing the bank's liquidity position.

Basic policies state that all management units must comply with local regulatory requirements and with internal limits. These limits are established in the first instance for the consolidated companies in the Banco Sabadell group, and as management limits for each of the management units. Standardised individual limits are also established for each management unit which are adapted to the specific aspects of each business and to the risk of each jurisdiction. These limits, at group-level and at management unit-level are established for the following variables:

- Collateral guarantees under agreement with the Bank of Spain: a minimum figure is set which may be achieved through discountable assets within the National Central Banks of the European Central Bank System as a whole.

- Cash ratio coverage: the cumulative position in coverage of minimum reserves in all group banks on any day shall be between the following upper and lower limits:
  1. Minimum balance in Bank of Spain account.
  2. Monitoring indicator for maximum cumulative daily balance.
  3. Lower limit of cumulative daily balance.
- Sensitivity matrix by term and product: A certain interest rate risk could arise in operative liquidity management which is limited for each term and product through a maximum sensitivity matrix.
- Maximum level of financing needs on the trading balance sheet.
- Unutilised commitments indicator: a maximum figure is established for loan agreements, credit card facilities, discount facilities and personal mortgage loans as a whole which represent a commitment towards third parties and which have yet to be utilised. This indicator is to be checked on a monthly basis.
- Available liquid assets: high quality assets must be available at all times as defined by the regulatory LCR (Liquidity Coverage Ratio), in accordance with regulatory requirements plus a management buffer on net outflows in 30 days provided for by said ratio.
- Interbank lines: For wholesale market funding lines are set with banking counterparties and clearing houses.
- Survival horizon: the bank must have a buffer of sufficient liquid assets to overcome a stress situation so that it can remain at least one year in a situation wherein it does not acquire liquidity and where this does not affect its operation.
- Loan to deposit (LtD): a target LtD level is set to guarantee the stability of the group's funding structure.

In order to manage its liquidity, the group follows a structure based on Liquidity Management Units (LMU). Each LMU is responsible for managing its own liquidity and for setting its own liquidity risk control metrics in coordination with the group's corporate area. Current LMUs are: Banco Sabadell, including consolidated subsidiaries, Sabadell United Bank (SUB), Banc Sabadell d'Andorra (BSA), Banco Sabadell Mexico and TSB.

Tools/metrics for monitoring and control of risk management

The basic tools for managing and measuring liquidity risk are:

- Information on daily asset and liability balances.
- Information on the status of liquid assets and second lines of liquidity based on discountable assets at the ECB and on the capacity to generate them. Additionally, Banco Sabadell analyses the robustness of its liquid asset portfolio as discountable assets at the ECB by assessing the sensitivity of the eligible asset base to various combined scenarios of downgrades in rating and impacts on the market price of the assets, in order to verify that the bank's eligible asset base is sufficiently robust to guarantee that the bank has sufficient eligible assets available, considering its current position with the ECB.
- Information on short, medium and long-term maturities of financing operations in wholesale financial markets.
- Regular stress tests. Banco Sabadell regularly carries out stress tests centred on the bank's position in the institutional market, where a prolonged closure of capital and interbank markets is considered, combined with a divestment of deposits from institutions and companies that professionally manage the group's treasury funds. These tests set a survival horizon, identifying the period over which the group can remain in a situation where no new liquidity is acquired without affecting its activities; this guarantees that the group has the necessary liquid asset buffer to cover the net income and expenses balance in a stress situation.

  To complement this exercise, the bank carries out a stress test which, unlike the previous tests and as an additional measure, considers the full provision of all available assets in the bank over a one-month period, the outflow of 7.5% of the deposit base of retail customers (households and SMEs), 15% of the deposit base of public administrations and companies over a one-month period and the non-renewal of all securities placed with retail customers.

  Additionally, Banco Sabadell establishes a monthly contingency plan in which two liquidity stress scenarios are considered: a systemic crisis and a crisis specific to Banco Sabadell. This contingency plan takes into account the bank's issuing capacity in a capital market under each of the two scenarios, as well as all that of the on-balance assets that are able to generate liquidity, establishing the percentage that could become liquid for each type of asset and in line with the crisis scenario within the space of one week and one month, thus calculating the entity's contingent liquidity in a liquidity crisis scenario.
- Early Warning Indicators (EWI). Banco Sabadell has designed and implemented an early warnings system to identify any possible strain in capital markets and within the group's own funding structure that could endanger the group's liquidity position. These EWIs set limits for the entity's different financial variables, in such a way that once these limits are exceeded the entity must consider adopting different measures and corrective actions to maintain the group's liquidity.
- General information relating to the situation of financial markets: issuances, spreads, reports from external credit agencies, etc.

The risk control and reporting framework for the liquidity risk management limits is comprised of:
- Supervision of global liquidity risks, independently calculating the risk management metrics within risk systems.

The generation of a liquidity gap in commercial business has continued, reducing total funding of wholesale markets and increasing the liquidity position.

- Define the risk measurement methodologies and verify the correct operation of control and measurement systems.
- Daily monitoring of risk indicators and limits, reporting to the various management units (Treasury Management and Capital Market and Financial Management Division).
- Systematic control and analysis of the adherence to limits, identifying instances of non-fulfilment and activating the necessary protocols for their correction.
- Establish and generate the necessary reporting framework for optimum monitoring and control of risk management limits.

Funding strategy and liquidity evolution in 2015

The main source of funding of the group is the customer deposits base (mainly demand accounts and time deposits collected through the branch network), complemented by financing through interbank markets and capital markets, where the entity has various short and long-term financing programs to achieve an appropriate level of diversification by product type, term and investor. The entity also maintains a diversified portfolio of liquid assets, mostly eligible as collateral for the financing operations with the European Central Bank (ECB).

On-balance sheet customer funds
At 31 December 2015, on-balance sheet customer funds amounted to €131,489 million, compared with €94,461 million at 2014 year-end and €94,497 million at 2013 year-end (a 39.2% increase in December 2015 compared with December 2014 as a result of the acquisition of TSB in June 2015 and a -0.04% reduction in December 2014 compared with December 2013). In 2015, the movement of balances from time deposits to demand accounts and mutual funds has continued, as a result of the downward evolution of interest rates. At 31 December 2015, the balance of demand accounts (checking accounts, together with savings accounts) totalled €84,536 million euros (+95.3%), to the detriment of time deposits, which showed a -11.7% decrease (T4).
Off-balance sheet customer funds managed by the group and those traded but not under management are shown in Note 31 of the 2015 consolidated annual accounts.

The deposits of the entity are traded through the following units/companies of the group (Commercial Banking, Corporate Banking and Global Businesses, Private Banking, SUB and TSB). Details of the volumes of these business units are included in the section on Business results of the Directors' Report.

During 2015, the generation of commercial gap has stabilised, with the positive trend seen over the last years continuing, although more moderately. This has allowed, on the one hand, continuing with the bank's policy of partially refinancing maturities in capital markets and, at the same time, with the system for the reduction of the loan to deposit (LtD) ratio of the group (from 147% at the end of 2010 to 106.5% at the end of 2015). The evolution of the ratio over the year has also been positively affected by the incorporation of TSB in June 2015, with a financing structure that is mainly concentrated on customer deposits.
To calculate the loan to deposit (LtD) ratio, the net credit investment, adjusted by subsidised financing, is used as the numerator, and the retail financing as denominator.

Capital market
As a result of deleveraging by the group and its successful campaign to attract deposits, the proportion of funding raised on the wholesale markets has declined steadily in recent years. At the end of 2015, the outstanding balance of capital market funding was €27,436 million, which excluding TSB amounted to €22,961 million, compared with an outstanding balance of €23,106 million at 2014 year-end. By type of product, at December 2015, €13,628 million of the total amount placed in capital markets corresponded to mortgage covered bonds, €2,816 million to commercial paper and Euro Commercial Paper (ECP) aimed at wholesale investors, €2,595 million corresponding to senior debt (of which €1,058 million were for transactions with State guarantees as a result of the acquisition of Banco CAM), €1,388 million corresponded to issuances of subordinated debt and preference shares placed on the market, €6,974 million corresponded to securitisation bonds placed on the market (of which €3,951 million corresponded to TSB) and €34 million corresponded to other medium- and long-term equity instruments (T5).

The Banco Sabadell group performs activities and maintains certain financing programs active on capital markets to diversify its various sources of liquidity.

€ million

	2015	3 months	6 months	12 months	>12months	No mat.
Total on-balance sheet customer funds (*)	**131,489**	**8.7%**	**8.0%**	**12.7%**	**6.3%**	**64.3%**
Time deposits	42,947	25.2%	22.5%	34.6%	17.7%	0.0%
Demand accounts	84,536	0.0%	0.0%	0.0%	0.0%	100.0%
Retail issuances	4,006	15.9%	21.6%	46.4%	16.1%	0.0%

(*) Includes customer deposits (ex repos) and other liabilities placed by the branch network: mandatory convertible bonds, straight bonds of Banco Sabadell, commercial paper and others.

T4 On-balance sheet customer funds by maturity

€ million

	2016	2017	2018	2019	2020	2021	>2022	Outstanding balance
Mortgage bonds and covered bonds	2,876	2,022	1,561	1,124	2,172	2,013	1,859	13,628
Secured issuances	—	1,058	—	—	—	—	—	1,058
Senior debt	1,412	—	100	—	—	—	25	1,537
Subordinated debt and preferential bonds	299	66	—	—	425	565	33	1,388
Other medium- and long-term financial instruments	—	—	18	—	—	10	6	34
Total	**4,587**	**3,146**	**1,679**	**1,124**	**2,597**	**2,589**	**1,923**	**17,645**

T5 Maturities of issues to institutional investors by product type

In terms of short-term financing, the entity maintains a company promissory notes program and a Euro Commercial Paper (ECP) program:

— Company promissory notes program: this program regulates issues of promissory notes and is aimed at institutional and minority investors. On 5 March 2015, the promissory notes program of Banco Sabadell for 2015 was registered with the CNMV (Spanish Securities Commission), with an issue limit of €6 billion, extendible to €9 billion. The outstanding balance of the promissory notes program has increased over the year, in terms of both the outstanding balance of unqualified investors, and the institutional customer base. At 31 December, the outstanding balance was of €3,661 million (net of promissory notes subscribed by companies of the group), vis-à-vis the €2,745 million euros at 31 December 2014.

— Euro Commercial Paper (ECP) Program, aimed at institutional investors, whereby securities are issued for the short term in various foreign currencies: euro, USD and GBP. On 18 December 2015, Banco Sabadell renewed this program for a maximum nominal amount of €3.5 billion. This program has been increased from €165.2 million euros at the end of 2014, to €275.9 million euros at 31 December 2015.

Regarding medium- and long-term financing, the entity maintains the following programs in place:

— Program for the issue of non-equity securities registered with CNMV (fixed income program): this program regulates the issues of bonds and debentures, both straight and subordinated, and mortgage covered bonds, territorial bonds and structured bonds, made under Spanish law through the CNMV and aimed at both national and foreign investors. The limit available for new issues under the program for the issue of non-equity securities for 2015 of Banco Sabadell at 31 December 2015, was of €6,145.8 million (at 31 December 2014, the outstanding balance under the fixed income program of 2014 was of €5,912.7 million).

During 2015, Banco Sabadell has issued securities under the fixed income program effective at any time for a total of €10,354.2 million, including retained and placed issues. Over the year, the entity has accessed the market on several occasions, taking advantage of available liquidity windows. Specifically, Banco Sabadell made two public issues of five-year mortgage covered bonds in May and October 2015 for an aggregate of €750 million and €1 billion, respectively; two issues of 8-year mortgage covered bonds for a total amount of €300 million, subscribed in full by the European Investment Bank (EIB); ten issues of senior debt at 1 and 2 year terms, for a total amount of €2,750 million and nine issues of structured bonds for a total of €111 million and terms spanning between 1 and 5 years. In the current market context, the entity would have the capacity to issue in various formats and terms.

— Asset securitisation: Since 1993, the group has been very active on this market and has participated in various securitisation programs, in some cases together with other highly solvent entities, granting mortgage loans, loans to small and medium sized enterprises, consumer loans and credit rights derived from financial lease agreements.
  There are currently 35 outstanding asset securitisation operations (including the securitisation of Banco Guipuzcoano, Banco CAM, BMN, Banco Gallego and TSB), although part of the bonds issued were withheld by the entity as liquid assets eligible for financing operations with the European Central Bank, the rest of the bonds were placed on capital markets. At the closing of 2015, the balance of securitisation bonds placed on the market was of €6,974.4 million euros.
  For efficiency reasons, during 2015, seven securitisation operations with relatively small outstanding balances were cancelled early (see further details on securitisation funds in Schedule II of the memorandum).

Overall, in 2015 market performance has been positive, although there have been various episodes of volatility that have resulted in tensions and even the closing of markets over relatively extended periods of time. The system as a whole has not seen the refinancing of a large part of the market maturities. This, combined with the ECB stimulation measures over the last quarter of 2014, has caused an excess of liquidity.

Banco Sabadell has taken part in these ECB stimulation measures by attending targeted four-year liquidity auctions (TLTRO or Targeted Longer-term refinancing operations) in both 2014 and 2015, for a total amount of €11 billion. The entity has also participated in the Covered Bond Purchase Program (CBPP3) implemented by the European Central Bank.

The excess of liquidity in the market, together with a scenario of negative short-term interest rates, have driven down prices in repo financing compared to other alternatives. At 31 December 2015, the net amount of repo financing in nominal terms amounted to€ 5,303 million.

Liquid assets

In addition to these sources of funding, Banco Sabadell also maintains a liquidity buffer in the form of liquid assets to face any possible liquidity needs (T6).

In the case of TSB, the first line of liquidity at 31 December 2015, consists mainly of gilts amounting to €1,718 million and an excess of reserves at the Central Bank of England (BoE) of €3,383 million.

There are no significant amounts of cash and cash equivalents that are not available for use by the group.

In addition to the first line of liquidity, the entity maintains a buffer of mortgage assets and loans to public administrations eligible as collateral for mortgage covered bonds and territorial bonds, respectively, which at the end of 2015 provided an additional €7,376 million in terms of the capacity to issue own new bonds eligible as collateral to be discounted at the ECB. At the closing of 2015, available liquidity amounted to €29,623 million in cash, corresponding to the amount of the first line of liquidity plus the capacity to issue mortgage covered bonds and territorial bonds of the entity at year end.

Fulfilment of regulatory ratios

The Banco Sabadell group has included, as part of its liquidity management, the monitoring of the new short-term Liquidity Coverage Ratio or LCR and the Net Stable Funding Ratio or NSFR, reporting to the regulator on the required information on a monthly and quarterly basis, respectively. The measurement of liquidity based on these metrics forms part of the liquidity risk control in the set of the LMUs.

In terms of the LCR ratio, since 1 October 2015, the statutory minimum payment is 60%, a level that is widely surpassed by all LMUs of the entity, with the cases of TSB and Banco Sabadell España being noteworthy, with high levels of LCR. At the group level, the LCR ratio of the entity has been permanently and stably positioned over the year at well above 100%.

As regards the NSFR ratio, it is still in the analysis and final definition stage. The date set for its implementation is January 2018, and just as for the LCR ratio, a period of gradual application is planned. The bank has nonetheless already commenced the monitoring of this ratio as a liquidity metric at the LMU level.

Given the funding structure of the entity, with a high level of customer deposits, and the majority of the market financing being focused on the medium-/long-term, the entity has remained stable at levels that are well above 100%.

Market risk

Market risk arises from the possibility of incurring losses in the market value of positions maintained in financial assets, due to changes in risk factors which affect its prices and shares, its volatilities and their interconnections (for example: equity, interest rates or exchange rates).

These positions that generate market risk are normally kept for the treasury intermediation or capital markets management business or to maintain the entity's own positions of a discretionary nature.

It may also arise simply by maintaining global balance sheet positions (also known as structural positions) that in net terms are left open. In the latter case, the group uses the market risk management and monitoring system to treat the structural exchange rate risk position. Other market risks of a structural nature, affected by such factors as interest or liquidity rates, are addressed in the relevant sections.

The market risk acceptance, management and control system is based on the establishment of limits for expressly allocated positions and the approval of transactions