

Research

New Issue: BPCE Master Home Loans FCT (A2023-01 Through A2023-06)

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Related Research

New Issue: BPCE Master Home Loans FCT (A2023-01 Through A2023-06)

Ratings Detail

Ratings assigned							
Class	ISIN code	Rating*	Amount (bil. €)	Available credit enhancement (%)§	Coupon (%)	Expected maturity date	Final legal maturity date
A2023-01	FR001400HDA8	AAA (sf)	5.0	6.0	1.0	July 31, 2027	Dec. 31, 2071
A2023-02	FR001400HDE0	AAA (sf)	8.0	6.0	1.0	July 31, 2027	Dec. 31, 2071
A2023-03	FR001400HDB6	AAA (sf)	8.0	6.0	1.0	July 31, 2027	Dec. 31, 2071
A2023-04	FR001400HDC4	AAA (sf)	8.0	6.0	1.0	July 31, 2027	Dec. 31, 2071
A2023-05	FR001400HDG5	AAA (sf)	8.0	6.0	1.0	July 31, 2027	Dec. 31, 2071
A2023-06	FR001400HDH3	AAA (sf)	8.0	6.0	1.0	July 31, 2027	Dec. 31, 2071

*Our ratings address timely interest and ultimate principal payments on or before extended legal final maturity. §Available credit enhancement (provided by subordination and excluding the general reserve and excess spread) equals 6.0% at the time of this new issuance, with dynamic credit enhancement throughout the transaction's life subject to rating agency review and a 6.0% floor (minimum level).

Overview

- S&P Global Ratings has assigned 'AAA (sf)' credit ratings to the €45.0 billion class A2023-01 through A2023-06 notes from BPCE Master Home Loans FCT, a securitization of a pool of €84.3 billion of French prime residential home loans originated by Groupe BPCE.
- The issuer is a French securitization fund ("Fonds Commun de Titrisation" [FCT]), which is bankruptcy remote by law. BPCE Master Home Loans is a multi-issuance, French RMBS program originally issued in 2014 with a 10-year revolving period (see "Ratings Assigned To French Prime RMBS Transaction BPCE Master Home Loans," published on May 28, 2014). The outstanding class A notes cannot exceed the maximum program size set at €100 billion of class A notes.
- In May 2023, the program was restructured with an unlimited revolving period. The legal final maturity was postponed by 10 years.
- Our ratings reflect our analysis of the transaction's main features, as well as its exposure to counterparty and operational risks. Our analysis indicates that the available credit enhancement for the rated notes is sufficient to mitigate their exposure to credit and cash flow risks at the 'AAA (sf)' rating level. A combination of subordination, a cash reserve, and excess spread provides credit enhancement for the notes.
- BPCE is one of the largest participants in the French mortgage market. The receivables have been originated by participating "Caisses d'Epargne" and "Banques Populaires," which are part of Groupe BPCE for French borrowers.

The Credit Story

The credit story	
Strengths	Concerns and mitigating factors
Groupe BPCE has strong, well-established underwriting procedures. Servicing is in-house within Groupe BPCE. It has fully integrated servicing systems and policies and previous securitization experience through its existing securitization and covered bond programs. The historical performance of the lender's home loan book has proven strong to date, with a very low arrears level.	During the revolving period, the issuer can add new home loans to the pool, or substitute maturing loans. As a result, the pool's credit quality could deteriorate. In order to capture the pool's potential deterioration over the replenishment period, we assumed a stressed weighted-average foreclosure (WAFF) and weighted-average loss severity (WALS). The documentation includes a test, which ensures that the WAFF and WALS are regularly reviewed during the revolving phase. If our WAFF and WALS are no longer compliant with the current ratings assigned on the class A notes, the revolving period would stop, unless other elements are factored in the overall analysis and its continuation would not affect our ratings in the transaction. In addition, the transaction's eligibility criteria limit the inclusion of certain types of loans during the revolving period, and the documentation also includes global portfolio limits that mitigate the pool's potential deterioration over the revolving period.
The share of civil servant borrowers in the pool is 22.4% as of March 31, 2023. We have received historical performance for civil servants showing lower arrears than the total portfolio.	The issuer may issue further class A notes at a higher coupon, which could reduce available excess spread. The issuer net margin ensures that the revolving period ends if excess spread is insufficient to pay any liabilities, including newly defaulted loans over the period. We have factored this into our cash flow analysis.
This transaction benefits from a combined waterfall using the excess spread to cure defaults and to amortize the notes' principal amount.	At closing, BPCE Master Home Loans had 6.0% credit enhancement (excluding the general reserve and excess spread). The outstanding class B notes constitute the main credit enhancement available for the class A2023-01 through A2023-06 notes. The level of credit enhancement is sufficient for the class A2023-01 through A2023-06 notes to achieve a 'AAA (sf)' rating. However, the class B notes' required amount under the documentation may increase or decrease over time--down to a floor of 6%. The decrease is permissible under the documentation as long as the then-current rating on the class A notes is maintained. For this purpose, we will provide rating confirmation each time the class B notes' amount decreases.
Under the transaction's global portfolio limits, at least 97% of the pool pays a fixed interest rate, and the notes pay fixed coupons. Therefore, the transaction does not include any hedging mechanisms.	Potential employee setoff risk and deposit setoff risk could arise if the originator becomes insolvent. Employee setoff risk could arise if borrowers/originator employees offset their loan repayments with salaries due by the originator. Deposit setoff risk could arise if borrowers offset their loans repayments with deposits held with the originator considering the originator is a deposit-taking entity. Nevertheless, we have received sufficient legal comfort on the employee and deposit setoff risks and have not applied further stresses in our analysis.
The issuer is an FCT and is considered bankruptcy remote under French law.	As of March 31, 2023, 25.0% of the pool has an original loan-to-value (OLTV; according to our methodology) strictly exceeding 100%. It is not unusual in France to have home loans with an OLTV exceeding 100% at origination as some home loans also finance an upfront fee (a notary and guarantor fee). However, we consider OLTV levels in our credit analysis.
	A significant portion of the loans within the pool (24.1% of the pool as of March 31, 2023) has a debt-to-income (DTI) ratio equal to or exceeding 35% including 2.7% higher than 45.0%. However, we consider DTI levels in our credit analysis and apply an adjustment to our WAFF between 1.5x and 2.5x to loans with DTI above 35%. Finally, the French regulator has recently mandated that the DTI for newly originated loans generally cannot exceed 35%.

Environmental, Social, And Governance (ESG)

Our analysis considers a transaction's potential exposure to ESG credit factors. For RMBS, we view the exposure to environmental credit factors as average, social credit factors as above average, and governance credit factors as below average (see "ESG Industry Report Card: Residential Mortgage-Backed Securities," published on March 31, 2021).

In our view, the exposure to social credit factors is in line with the sector benchmark. Social credit factors are generally considered above average because housing is viewed as one of the most basic human needs, and conduct risk presents a direct social exposure for lenders and servicers, particularly as regulators are increasingly focused on ensuring fair treatment of borrowers. For RMBS, social risk is generally factored into our base-case assumptions. The risk of a usury

rate is mitigated as in France the credit rates are capped by usury laws.

The transaction's exposure to environmental credit factors is also in line with the sector benchmark, in our opinion. Physical climate risks, such as floods or wildfires, or long-term shifts in climate patterns, such as rising sea levels or increased weather variability, could severely damage properties and reduce their value, decreasing recoveries if borrowers default. We believe that the geographically well-diversified portfolio reduces exposure to physical climate risks.

In our view, the exposure to governance credit factors is in line with the sector benchmark. There are very tight restrictions on what activities the special-purpose entity can undertake compared with other entities. Given that this transaction securitizes a revolving pool with reinvestment features, the originator's role becomes active over the transaction's life, but the portfolio eligibility criteria under the transaction documentation mitigate the risk of loosening underwriting standards or potential adverse selection. We have considered this risk during our credit analysis, while sizing the worst-case pool composition.

In addition, Groupe BPCE has strong internal control frameworks with significant relevant experience at key stages of the process. Finally, the origination process is subject to regular post-completion scrutiny and checking and oversight.

As a result, we have not separately identified a material ESG credit factor in our analysis.

Collateral And Originator

Groupe BPCE's subsidiaries originated the portfolio's home loans. In our view, Groupe BPCE has strong, well-established underwriting and servicing procedures. It has previous securitization experience through its existing securitization and covered bond programs. We have frequent interaction with BPCE as it is a major issuer in the French RMBS and covered bond markets. We met the originator in June 2022 and were satisfied with its processes and its ability to undertake origination and servicing under good operational conditions. Additionally, BPCE confirmed that its servicing and origination policies have not changed significantly. It largely bases its procedures on regulation and the industry standard "Code of Conduct for Mortgages." In our opinion, its standards are similar to those of its peers. Our ratings reflect our assessment of its origination policies and our evaluation of its ability to fulfil its role as the portfolio's servicer.

Asset description

We received loan-level data as of March 31, 2023, and historical performance data on the originator book since 2013. The quality of data provided is in line with our standards, and the collateral is in line with other BPCE transactions. The portfolio has an outstanding principal balance of €84,312,342,130, which comprises 789,618 home loans. We received and considered a pool audit report in our analysis. The audit report is clean in our view, with only minor errors, therefore we have not applied any adjustments to our WAFF.

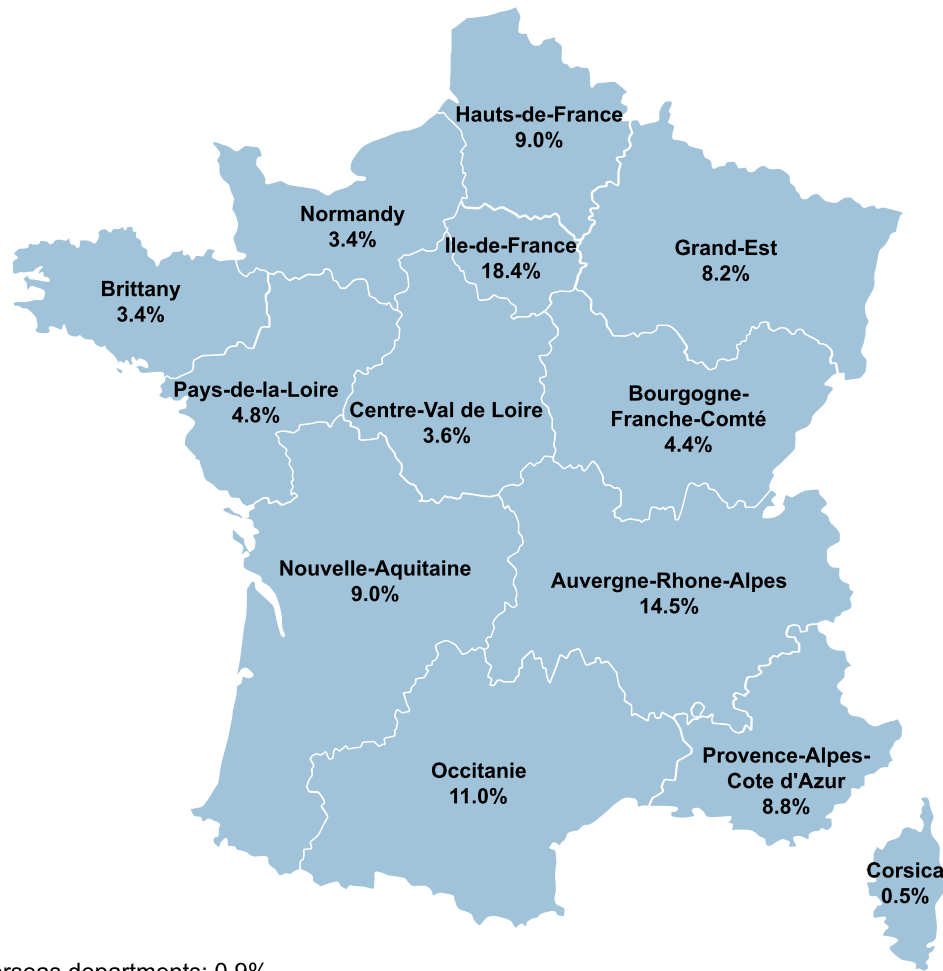
Table 1

Collateral key features*	
Pool cutoff date	March 31, 2023
Jurisdiction	France
Principal outstanding of the pool (bil. €)	84.3
Number of loans	789,618
Average loan balance (€)	106,776
Weighted-average indexed current LTV ratio (%)	71.9
Weighted-average original LTV ratio (%)	89.6
Weighted-average seasoning (months)	54
Weighted-average debt-to-income ratio (%)	30.0
Top three regional concentration (by balance)	Ile-de-France (18.4%), Auvergne-Rhone-Alpes (14.5%), and Occitanie (11.0%)
Buy-to-let (%)	11.9
Second home (%)	1.4
Jumbo valuations (%)	15.0
Weighted-average 'AAA' RMVD (%)	54.3
Current arrears greater than or equal to one month (%)	0.24

*Calculations are according to S&P Global Ratings' methodology. LTV--Loan-to-value. RMVD--Repossession market value declines.

Chart 1

Geographical distribution

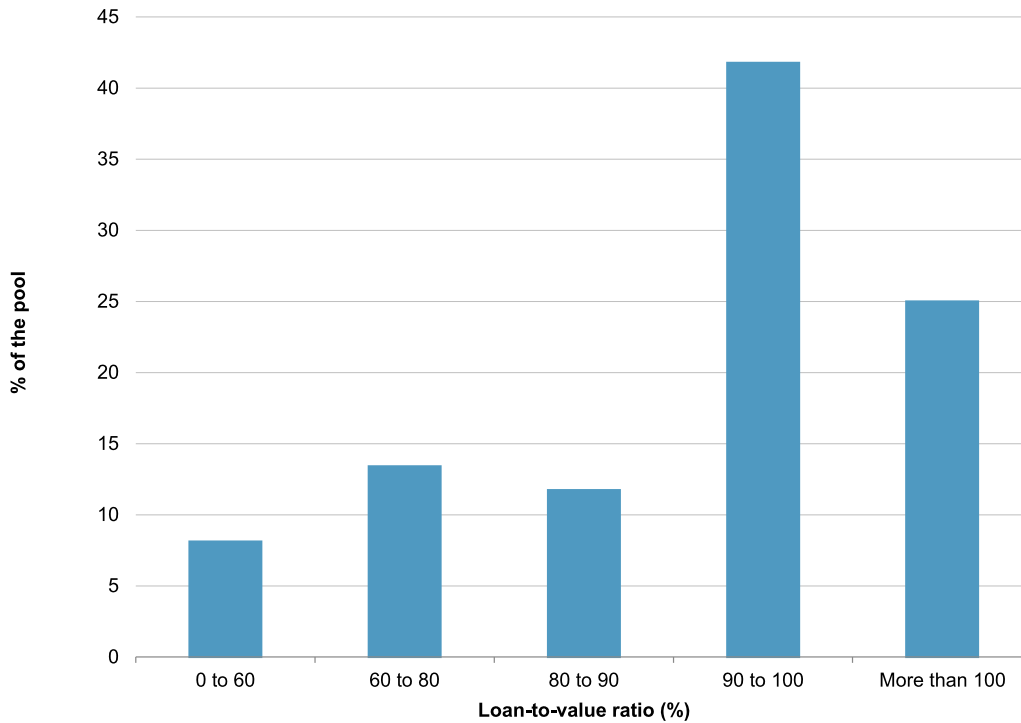


Overseas departments: 0.9%

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Chart 2

Original loan-to-value ratio distribution*



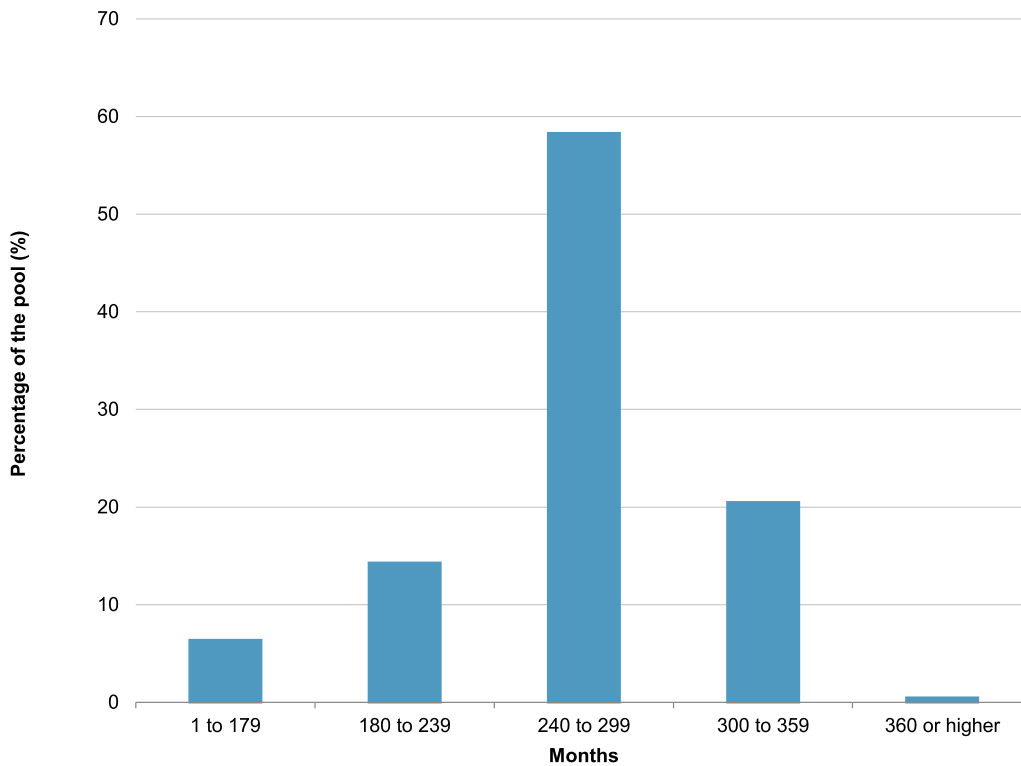
*According to our methodology.

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As of March 31, 2023, 25.0% of the pool has an OLTV strictly exceeding 100%. It is not unusual in France to have home loans with an OLTV exceeding 100% at origination as some home loans also finance an upfront fee (a notary and guarantor fee). However, we consider OLTV levels in our credit analysis.

Chart 3

Original term distribution

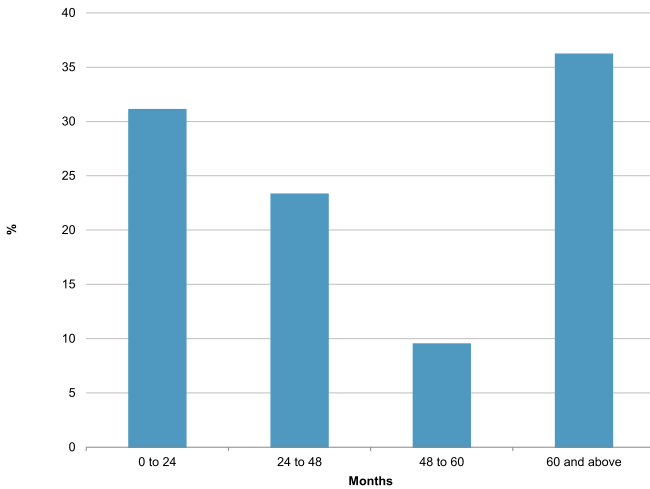


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As of March 31, 2023, 21.0% of the pool has an original loan term equal to or exceeding 25 years, and only 0.5% has an original loan term equal to or exceeding 30 years. Loans with 25-year original loan terms have become common in recent years and considering the low share of loans with terms equal to or exceeding 30 years, we have not applied any stress to our credit analysis. As per the new rules of the High Council for Financial Stability (HCSF), the maximum loan term for newly originated loans is now 25 years. Furthermore, all loans benefit from the same underwriting process regardless of their original term.

Chart 4

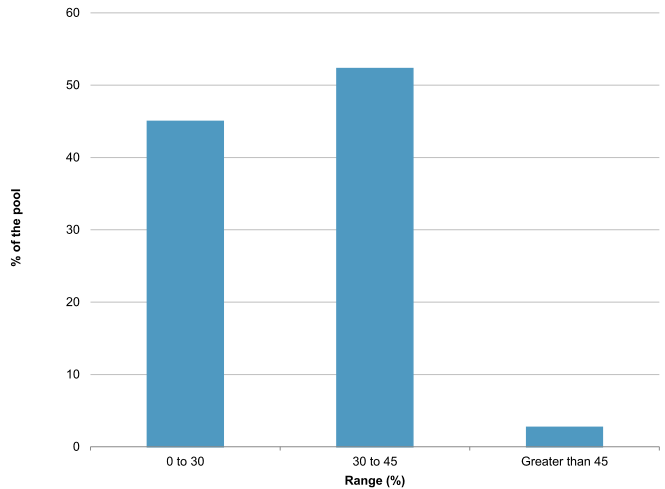
Seasoning distribution



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Chart 5

Debt-to-income distribution

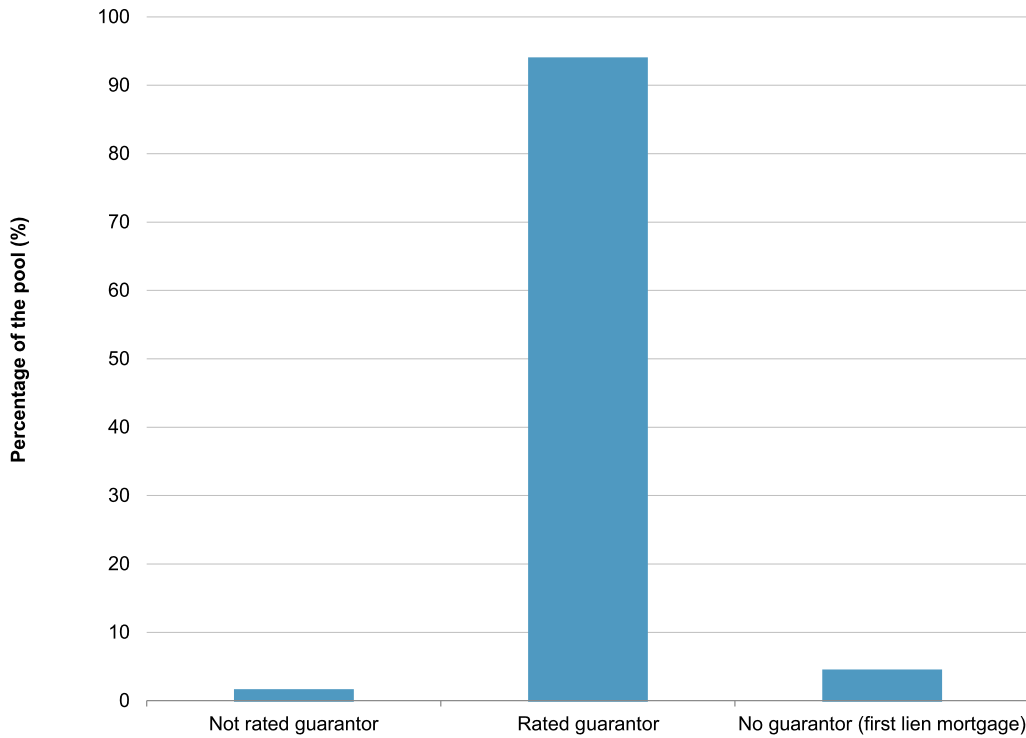


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A significant portion of the loans within the pool (24.1% of the pool as of March 31, 2023) has a DTI ratio equal to or exceeding 35%, including 2.7% higher than 45%. However, we consider DTI levels in our credit analysis and apply an adjustment to our WAFF between 1.5x and 2.5x to loans with DTI above 35%. In addition, the French regulator has recently mandated that the DTI for newly originated loans generally cannot exceed 35%.

Chart 6

Guarantor distribution



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Of the portfolio's loans, 95.5% do not benefit from a first-ranking mortgage. Rather, they benefit from a guarantee granted from a caution (a guarantor such as "La Compagnie Européenne de Garanties et Cautions" [CEGC] or "Casden - Banque Populaire"). In France, a guarantee ("caution") secures about 60% of existing loans and about two-thirds of newly originated loans, as opposed to standard mortgage loans. These guarantees have become increasingly popular, partly because it saves the cost of registering a mortgage. If the guarantor does not perform when an obligor defaults, the servicer would bear the risk of other creditors registering a judicial mortgage on the property before it.

Our European residential loans criteria give credit, to some extent, to the guarantor. The loss severity depends on the rating on the guarantor and on the notes. For instance, if a loan is guaranteed by CEGC, at the 'AAA' level in 45% of the cases, we expect the loss to be covered by the guarantor (i.e., loss severity of zero). In the remaining 55% of cases, we assume that the guarantor cannot meet its commitments, leading to the special-purpose entity incurring the loss. In this case, the loss severity calculation follows the same method as that for mortgages, but is multiplied by a factor of 1.5x.

The issuer's eligibility criteria for home loans

Some of the eligibility criteria were revised during the restructuring of the program in May 2023. The new eligibility criteria will enter into force gradually from June 2023 to March 2024. The list below outlines the transaction's key

eligibility criteria, among others:

- The underlying property is in France;
- The loan is euro-denominated;
- The loan's current LTV ratio does not exceed 100%;
- The loan's original LTV ratio does not exceed 110%;
- The current outstanding principal balance of a loan does not exceed €2,500,000;
- The loan's maximum remaining time to maturity is 30 years from the date of the issuer's purchase;
- The loan has at least one paid installment;
- The loan is current (i.e., not in arrears);
- Borrowers do not benefit from a contractual set-off right against their installments; and
- The loan has been fully disbursed.

Global portfolio limits

During the replenishment period, the pool's characteristics may change. The purchase of new home loans is therefore subject to a number of replenishment conditions under the transaction documents. Some of the global portfolio limits were revised during the restructuring of the program in May 2023. The main limits are listed below:

- No more than 3% of the portfolio are floating-rate loans.
- No more than 16% of the portfolio include buy-to-let loans.
- At least 80% of the portfolio include loans for a main home purpose.
- No more than 15% of the portfolio include loans granted to self-employed borrowers.
- At least 15% of the portfolio includes loans granted to protected employment borrowers.
- No more than 5% of the portfolio includes interest-free loan.
- More than 85% of the portfolio includes guarantees from a rated guarantor.
- No more than 5% of the portfolio includes loans not benefiting from a mortgage or guaranteed by a non-rated guarantor.
- The portfolio's weighted-average current loan-to-value (CLTV) ratio cannot be greater than 80%.
- The weighted-average interest rate cannot be lower than 0.6%.

Credit Analysis And Assumptions

We applied our global residential loans criteria to the pool in order to derive the WAFF and the WALs at each rating level. The WAFF and WALs assumptions increase at each rating level because notes with a higher rating should be able to withstand a higher level of loan defaults and loss severity. Our credit analysis reflects the characteristics of loans, properties, and associated borrowers.

During the revolving period, the issuer can add new home loans to the pool, or substitute maturing loans. As a result, the pool's credit quality could deteriorate. The documentation includes an annual test to limit the impact of such deterioration over the revolving period. To capture the pool's potential deterioration over one year, we have assumed a stressed WAFF and WALs (see table 2).

Table 2

Portfolio WAFF and WALs			
Rating level	WAFF	WALS	Credit coverage
AAA	11.07	33.26	3.68

WAFF--Weighted average foreclosure frequency. WALs--Weighted average loss severity.

Macroeconomic And Sector Outlook

The information provided in this section reflects our most recent published economic forecasts. The current eurozone macroeconomic outlook remains uncertain and has recently been subject to significant changes in short timeframes. The ratings assigned reflect this market uncertainty and our overall analysis considers the implications of further deterioration in credit conditions.

Our foreclosure frequency and loss assumptions for the archetypal pool at the 'AAA' level are not changing because we expect them to be constant during normal economic cycles (i.e., a cyclical trough no worse than a moderate-to-substantial stress). We currently expect GDP in France to slightly increase by 0.4% in 2023 and grow by 1.2% in 2024. We forecast unemployment to slightly increase to 7.6% in 2023 from 7.3% in 2022.

We expect an inflation rate of 5.4% in 2023 in France, a bit down compared to the 2022 level of 5.9%, and lower than the Eurozone forecast of 6.7%. France is less affected by the surge in gas prices as most of its energy comes from domestic nuclear plants. In addition, the government has taken measures to shield consumers from the energy price shock through a prices cap and grants. We believe that risks stemming from inflation are nonetheless mitigated in this transaction as most loans have a fixed rate.

The French nominal house prices are expected to decrease slightly by 0.5% in 2023 as a result of rising interest rates, which is lower than in the rest of the Eurozone.

Table 3

France statistics						
	2021	2022	2023f	2024f	2025f	2026f
Real GDP (% y/y)	6.8	2.6	0.4	1.2	1.6	1.4
CPI inflation (% y/y)	2.1	5.9	5.4	2.3	2.0	2.1
Unemployment rate (%)	7.9	7.3	7.6	7.9	7.9	7.6
Nominal house prices, % change y/y	7.0	4.5	(0.5)	0.5	1.5	N/A

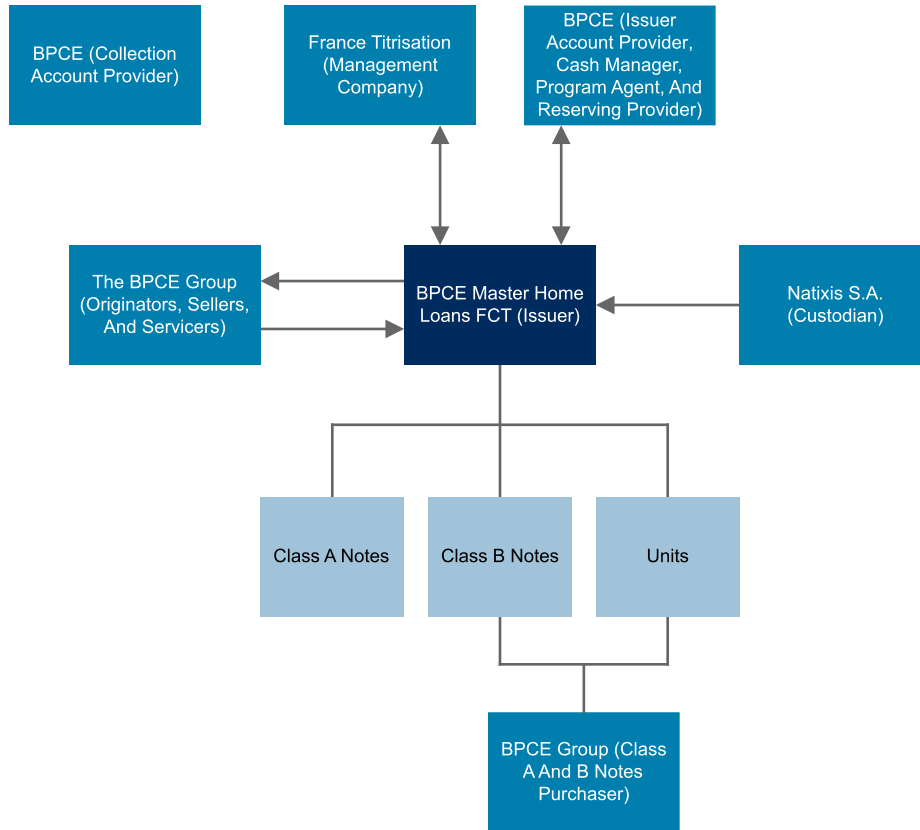
f--S&P Global Ratings Research forecast. y/y--Year on year. N/A--Not applicable. Source: S&P Global Ratings.

Transaction Structure

BPCE Master Home Loans is a bankruptcy remote FCT, a securitization vehicle set up under French law. Its sole purpose is to purchase the residential home loans from Groupe BPCE and issue the notes.

Chart 7

Transaction structure



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The class A2023-01 through A2023-06 notes have an expected maturity date of July 2027. Unless early amortization occurs, on the notes' expected maturity date, the issuer will reimburse the noteholders by using the proceeds of the newly issued class A notes, principal repayments, or by exercising a retransfer option under which any of the sellers repurchase the receivables. The receivables' purchase price would be at least equal to an amount sufficient to repay the outstanding notes.

If the issuer fails to reimburse the respective noteholders on the payment date falling immediately after the expected maturity date, the revolving period would stop and all of the outstanding notes would be extended to the legal final

maturity date. During the amortization period, all of the class A notes will be redeemed on their respective payment dates on a pari passu and pro rata basis, irrespective of the notes' initial issue date or expected maturity date. The issuer will make payments according to a combined waterfall with a default provisioning mechanism.

Credit enhancement

Subordination, a reserve fund, and excess spread provide credit enhancement for the rated notes.

Transaction periods

Revolving period. The pool is replenished, and the notes do not amortize and repay on the expected maturity date or earlier if BPCE exercises an optional redemption.

Amortization period. The notes amortize following an amortization event. All outstanding notes are extended to the legal final maturity date.

Accelerated amortization period. If the class A-2020-01 to A2023-06 notes were to miss an interest payment, this phase would be triggered.

Amortization event

The events below would lead to the transaction's amortization:

- The credit balance of the revolving account exceeds 20% of the class A and B notes' aggregate principal amount outstanding on three consecutive payment dates;
- The issuer net margin is less than zero on three consecutive payment dates;
- Any of the class A notes do not repay on the payment date falling immediately after their expected maturity date;
- The class B notes are not at their required amount under the documentation;
- A seller termination event has occurred in respect of all sellers or a servicer is not replaced within 30 calendar days after a servicer termination event occurs;
- On two successive payment dates the credit standing to the general reserve account is lower than the general minimum amount and is not remedied within the applicable period; and
- On two successive payment dates the credit standing to the commingling reserve account is lower than the commingling reserve required amount and this is not remedied within the applicable period.

The issuer net margin ensures that the revolving period ends if excess spread is insufficient to pay liabilities, including newly defaulted loans over the period.

Priority of payments

The management company applies the issuer's available funds toward the following payments in the relevant order of priority below.

Table 4

Payment priority during the revolving period	
1	Senior fees.
2	Class A notes' interest.
3	Top up of the reserve to its required amount under the documentation.
4	Class A notes' amortization amount.
5	The loan principal purchase price to the sellers.
6	The principal excess cash to the revolving account
7	To the reserves provider, the excess of the required amount.
8	Class B notes' interest.
9	The loan interest purchase price to the sellers.
10	Class B notes' amortization amount.
11	Junior fees.
12	Residual amount to residual units.

Table 5

Payment priority during the amortization period	
1	Senior fees.
2	Class A notes' interest.
3	Top up of the reserve to its required amount under the documentation.
4	Class A notes' amortization amount.
5	The excess of the required amount to the reserve provider.
6	The unpaid loan purchase price to the sellers.
7	Class B notes' interest.
8	Class B notes' amortization amount.
9	Junior fees.
10	Residual amount to residual units.

Table 6

Payment priority during the accelerated amortization period	
1	Senior fees.
2	Class A notes' interest.
3	Top up of the reserve to its required amount under the documentation.
4	Class A notes' principal in full.
5	The excess of the required amount to the reserve provider.
6	Class B notes' interest.
7	The unpaid loan interest purchase price to the sellers.
8	Class B notes' amortization amount.
9	Junior fees.
10	Residual amount to residual units.

Class A notes' amortization amount

During the revolving period. The amount is zero before the initial expected maturity date. On the initial expected maturity date or upon exercise of an optional redemption by BPCE, it is the full amount of the class A notes in question.

During the amortization period. The minimum between the class A notes' outstanding amount (as of the preceding payment date), and the product between (i) the principal amortization amount, and (ii) the full amount of the class A notes in question, with the principal amortization amount being the lower of (a) the available distribution amount minus senior fees, interest on class A notes and top up reserve amount, and (b) the aggregate of the class A and B notes' outstanding amounts, minus the outstanding amount of the loans' performing balance (as of the immediately preceding calculation date).

The principal amount due on the amortization amount includes the defaulted loans since the last calculation date. This means the structure accounts for defaults on an ongoing basis.

Cash reserve fund

The structure benefits from a dynamic cash reserve fund, providing an amount sufficient to meet four months of class A interest and issuer expenses at all times, with a floor of €70.2 million (amounting to 0.10% of the initial class A notes amount).

Cash collection arrangements and commingling reserve

Borrowers pay their installments either directly to the specially dedicated account held with BPCE, or to the collection account of the respective BPCE entity, which then transfers the amounts daily to the specially dedicated account. Consequently, some collections transit to a non-dedicated servicer collection account, before being transferred to a ring-fenced account on the same day. If the servicer becomes insolvent, the transaction is exposed to a credit loss on all collections payments that transit through these non-dedicated accounts. To mitigate this risk, a commingling reserve has been established to provide cash to the structure to mitigate potential credit loss as a result of the borrower's payments being lost upon if the servicer becomes insolvent. This reserve covers at least one month of collections, including a stressed annual prepayment assumption. It would be funded if BPCE was downgraded below 'A'.

Cash Flow Modeling And Analysis

We stressed the transaction's cash flow to test the credit and liquidity support from the assets, the subordinated tranches, and the cash reserve.

Fees

Contractually, the issuer is obliged to pay periodic fees to various parties providing services to the transaction such as servicers, the management company, and cash managers, among others. We accounted for these in our analysis. In particular, we applied a stressed servicing fee of 0.35% (the higher of 1.5x actual fees and 0.35% of the pool balance) to account for the potential increase in costs to attract a replacement servicer, based on our global RMBS criteria. In addition, we also considered €39.1 million as annual fixed fees, based on the issuer's expenses as per the transaction documents.

Default and recovery timings

We used the WAFF and WALS derived in our credit analysis as inputs in our cash flow analysis. At each rating level, the WAFF specifies the total balance of the home loans we assume will default over the transaction's life. Defaults are

applied on the outstanding balance of the assets as of the closing date. We simulate defaults following two paths (i.e., one front-loaded and one back-loaded) over a six-year period (see table 7). During the recessionary period within each scenario, we assume 25% of the expected WAFF is applied annually for three years.

Table 7

Default timings for front-loaded and back-loaded default curves		
Year after closing	Front-loaded defaults (% of WAFF per year)	Back-loaded defaults (% of WAFF per year)
1	25.0	5.0
2	25.0	10.0
3	25.0	10.0
4	10.0	25.0
5	10.0	25.0
6	5.0	25.0

WAFF--Weighted-average foreclosure frequency.

We stressed a recovery period of 34 months under our base case run. This is the result of incorporating both our assumptions for recovery timings on mortgages and guarantors.

Delinquencies

To simulate the effect of delinquencies on liquidity, we model a proportion of scheduled collections equal to one-third of the WAFF (in addition to assumed foreclosures reflected in the WAFF) to be delayed. We apply this in each of the first 18 months of the recession and assume a full recovery of these delinquencies will occur 36 months after they arise.

Prepayments

To assess the impact on excess spread and the absolute level of defaults in a transaction, we model both high and low prepayment scenarios at all rating levels (see table 8).

Table 8

Prepayment assumptions		
	High	Low
Pre-recession	24.0	1.0
During recession	1.0	1.0
Post-recession	24.0	1.0

Interest rates

We modeled two interest rate scenarios in our analysis: up and down.

Setoff risk

Potential employee setoff risk and deposit setoff risk could arise if the originator becomes insolvent. Employee setoff risk could arise if borrowers/originator employees offset their loan repayments with salaries due by the originator. Deposit setoff risk could arise if borrowers offset their loans repayments with deposits held with the originator considering the originator is a deposit-taking entity. We have received sufficient legal comfort on the employee and deposit setoff risk and have not applied further stresses in our analysis.

Summary

Combined, the default timings, recession timings, interest rates, and prepayment rates described above give rise to eight different scenarios at each rating level (see table 9).

Table 9

RMBS stress scenarios			
Total number of scenarios	Prepayment rate	Interest rate	Default timing
8	High and low	Up and down	Front-loaded and back-loaded

Scenario analysis

As part of our analysis we also conducted additional sensitivity analysis to assess the impact of, all else being equal, increased WAFF and WALs on our ratings on the notes. For this purpose, we ran eight sensitivity runs by either increasing stressed defaults and/or reducing expected recoveries as shown in the tables below.

Table 10

Sensitivity stresses			
	WALS		
WAFF	1.0x	1.1x	1.3x
1.0x	Base case	Scenario 3	Scenario 4
1.1x	Scenario 1	Scenario 5	Scenario 7
1.3x	Scenario 2	Scenario 6	Scenario 8

Table 11

Sensitivity scenarios									
Class	Base case	1	2	3	4	5	6	7	8
A	AAA	AAA	AAA	AAA	AAA	AAA	AAA	AAA	AA+

We applied a further sensitivity analysis to the notes (in the base case run) to test the impact of an extension of the recovery timing by an additional six months (i.e., 40 months in total). Under these conditions the cash flow output for the class A notes is unchanged.

Counterparty Risk

The issuer is exposed to BPCE as the specially dedicated bank account provider and transaction account provider (see table 12). The transaction's documented replacement language for this counterparty is in line with our counterparty criteria (see "Counterparty Risk Framework: Methodology and Assumptions," published on March 8, 2019). Our analysis shows that counterparty risk does not constrain our ratings on the class A2023-01 through A2023-06 notes. In addition, the issuer is exposed to BPCE as commingling reserve provider. The commingling reserve would be funded if we downgraded the specially dedicated bank account provider (BPCE) below 'A'.

Table 12

Supporting ratings				
Institution/role	Current counterparty rating	Minimum eligible counterparty rating	Remedy period	Maximum supported rating
BPCE as transaction account provider	A/Stable/A-1	A/A-1	60 calendar days	AAA
BPCE as specially dedicated bank account provider	A/Stable/A-1	A/A-1	60 business days	AAA

Sovereign Risk

Our long-term unsolicited sovereign credit rating on France is 'AA'. Therefore, our ratings in this transaction are not constrained by our structured finance sovereign risk criteria.

Surveillance

We will regularly assess the following as part of our ongoing surveillance of this transaction:

- The performance of the underlying portfolio;
- The supporting ratings in the transaction; and
- The servicer's operations and its ability to maintain minimum servicing standards.

Furthermore, during the program's revolving period, the pool's credit quality could deteriorate. We will monitor the underlying portfolio's credit quality, ensuring the annual credit quality test is satisfied.

Appendix

Transaction participants	
Sellers	Any participating Banque Populaire and Caisse d'Epargne
Servicers	Any participating Banque Populaire and Caisse d'Epargne
Management company	France Titrisation
Arranger, program agent, cash manager, transaction account provider, collection account provider, and reserves provider (including the commingling reserve provider)	BPCE
Custodian	Natixis S.A.

Related Criteria

- General Criteria: Environmental, Social, And Governance Principles In Credit Ratings , Oct. 10, 2021
- Criteria | Structured Finance | General: Global Framework For Payment Structure And Cash Flow Analysis Of Structured Finance Securities , Dec. 22, 2020

- Criteria | Structured Finance | General: Methodology To Derive Stressed Interest Rates In Structured Finance , Oct. 18, 2019
- Criteria | Structured Finance | General: Counterparty Risk Framework: Methodology And Assumptions , March 8, 2019
- Criteria | Structured Finance | General: Incorporating Sovereign Risk In Rating Structured Finance Securities: Methodology And Assumptions , Jan. 30, 2019
- Criteria | Structured Finance | RMBS: Global Methodology And Assumptions: Assessing Pools Of Residential Loans , Jan. 25, 2019
- Legal Criteria: Structured Finance: Asset Isolation And Special-Purpose Entity Methodology , March 29, 2017
- Criteria | Structured Finance | General: Global Framework For Assessing Operational Risk In Structured Finance Transactions , Oct. 9, 2014
- General Criteria: Principles Of Credit Ratings , Feb. 16, 2011
- Criteria | Structured Finance | General: Methodology For Servicer Risk Assessment , May 28, 2009

Related Research

Credit Conditions Europe Q2 2023: Costs Rising To Cure Inflation, March 28, 2023

Economic Outlook Eurozone Q2 2023: Rate Rises Weigh On Return To Growth, March 27, 2023

European RMBS Index Report Q4 2022, Feb. 9, 2023

European RMBS Outlook 2023: Permafrost Or Thaw?, Jan. 12, 2023

European Housing Prices: A Sticky, Gradual Decline, Jan. 11, 2023

Global Credit Conditions Downside Scenario: Inflation, Geopolitics Are Twin Threats To Our Base Case, Dec. 8, 2022

Research Update: France Outlook Revised To Negative On Rising Budgetary Risks; 'AA/A-1+' Ratings Affirmed, Dec. 2, 2022

European RMBS Market Update Q4 2022: The New Normal For How Long?, Nov. 9, 2022

New Issue: BPCE Master Home Loans FCT (Class A-2022-02), July 29, 2022

France, July 5, 2022

Asset Price Risks: Inflated Property Values Mean Higher Loss Assumptions In European RMBS And Covered Bonds, March 21, 2022

ESG Industry Report Card: Residential Mortgage-Backed Securities, March 31, 2021

2017 EMEA RMBS Scenario And Sensitivity Analysis, July 6, 2017

Global Structured Finance Scenario And Sensitivity Analysis 2016: The Effects Of The Top Five Macroeconomic Factors, Dec. 16, 2016

European Structured Finance Scenario And Sensitivity Analysis 2016: The Effects Of The Top Five Macroeconomic Factors, Dec. 16, 2016

Ratings Assigned To French Prime RMBS Transaction BPCE Master Home Loans, May 28, 2014

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