Diana SPV S.r.l.

Italian Non-Performing Loans ABS

Ratings

Tranche	Rating	Size (EUR m)	% of notes	% of GBV[1]	Coupon	Final maturity
Class A	BBB_{SF}	235.0	85.9	23.5	6M Euribor[2] + 0.5%	Dec 2038
Class B	NR	35.0	12.8	3.5	6M Euribor[3] + 9.0%	Dec 2038
Class J	NR	3.7	1.3	0.4	6M Euribor + 15%+ variable return	Dec 2038

Scope's Structured Finance Ratings constitute an opinion about the relative credit risks and reflect the expected loss associated with the payments contractually promised by an instrument on a particular payment date or by its legal maturity. See Scope's website for our SF Rating Definitions.

[1] Gross book value (GBV) of the securitised portfolio at closing (EUR 999.7m)

[2] Class A interests will be capped ranging from 0.60% at the issue date to 3.75% on the final maturity date. In addition, the base rate on the class A notes will be partially hedged through an interest rate cap spread agreement with a lower bound rate ranging from 0.0% at the issue date to 0.70% on December 2032, and an upper bound rate ranging from 0.60% at the issue date to 3.75% on December 2032.

[3] Class B interest are floored at 0%. The Euribor component is subordinated to the full repayment of class A principal.

Transaction details

Purpose	Risk transfer
Issuer	Diana SPV S.r.l.
Originators	Banca Popolare di Sondrio Società Cooperativa per Azioni
Servicer	Prelios Credit Servicing S.p.A. (master and special servicer)
Portfolio cut-off date	1 April 2019
Issuance date	17 June 2020
Payment frequency	Semi-annual (June and December)
Co-arrangers	Société Générale and Banca IMI S.p.A.

The transaction is a cash securitisation of a static Italian non-performing loan (NPL) portfolio worth EUR 999.7m by gross book value.

The portfolio was originated by Banca Popolare di Sondrio S.C.p.A.. The pool comprises both secured[1] (64.7%) and unsecured (35.3%) loans (including junior secured loans). The loans were extended to companies (78.5%) and individuals (21.5%). Secured loans are backed by first-lien mortgages on residential properties (46.5% of property values), commercial assets (17.0%), land (14.1%) and industrial assets (13.5%), while the remainder collateral (8.9%) is composed of other type of properties. Properties are concentrated in the north of Italy (83.8%), while the rest of the assets are distributed in the centre (9.7%) and south (6.5%) of the country.

The issuer acquired the portfolio at the transfer date of 1 June 2020 but is entitled to all portfolio collections received since 1 April 2019 (the portfolio cut-off date).

The structure comprises three classes of notes with fully sequential principal amortisation: senior class A, mezzanine class B, and junior class J. Class A will pay a floating rate indexed to six-month Euribor, plus a margin of 0.5%, while Class B will pay a floating rate indexed to six-month Euribor, plus a margin of 9.0%. Class J principal and interest are subordinated to the repayment of the senior and mezzanine notes. Prelios Credit Servicing S.p.A. has been appointed as master and special servicer.

The notes have been structured in accordance with requirements of the GACS scheme, updated in 2019[2].

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Related Research

Non-Performing Loan ABS Rating Methodology

Methodology for Counterparty Risk in Structured Finance

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[1] Secured loans are defined as exposures guaranteed by at least a first-lien mortgage.

[2] Italian Law Decree No. 18 of 14 February 2016, converted into Law No. 49 of 8 April 2016, subsequently amended and supplemented under the Italian Law Decree No. 22 of 25 March 2019, converted into Italian Law No. 41 of 20 May 2019

Rating rationale (summary)

The rating is primarily driven by the expected recovery amounts and by the timing of collections from the NPL portfolio. Our recovery amount and timing assumptions are based on the portfolio's characteristics, our economic outlook for Italy and our assessment of the special servicer's capabilities. The rating considers the structural protection provided to the notes, the absence of equity leakage provisions, the liquidity protection provided by the cash reserve, and the interest rate hedging agreement.

Interest rate risk on the class A notes is mitigated by a cap spread hedging structure and a cap embedded in class A notes interest rates. Under the cap spread structure there is an increasing upper bound rate to six-month Euribor ranging from 0.6% to 3.75%, and an increasing lower bound rate ranging from 0% to 0.7%. The cap embedded in class A notes, is aligned with the upper band of the cap spread structure. The cap spread notional schedule is generally aligned with our expected amortisation profile on the class A notes. Interest rate risk on class B notes is not hedged, but the risk for Class A noteholders is mitigated by the Euribor component ranking junior to class A principal repayment.

The rating also addresses the exposure to the key transaction counterparties. The analysis also considered the replacement mechanisms for the respective counterparty roles. The replacement trigger for the Italian account bank is not aligned with the criteria described in Scope's Methodology for Counterparty Risk in Structured Finance. However, the potential credit exposure of the issuer towards the Italian account bank is not expected to be material.

We performed a specific analysis for recoveries, using different approaches for secured and unsecured exposures. For secured exposures, Scope's expected collections are mainly based on the most recent property appraisal values, stressed to account for, appraisal type, liquidity and market value risks. We derived recovery timing assumptions considering line-by-line asset information on the type of legal proceeding, the court issuing the proceeding, and the stage of the proceeding as of the cut-off date. For unsecured exposures, we used historical line-by-line market-wide recovery data on defaulted loans between 2000 and 2017 and considered the special servicer's capabilities when calibrating lifetime recoveries. We considered that unsecured borrowers were classified as defaulted for a weighted average of 4.4 years as of the cut-off date of 1 April 2019. We accounted for the current macro-economic scenario, taking a forward-looking view on the macro-economic developments.

Rating drivers and mitigants

Positive rating drivers

Geographic concentration. The portfolio is mostly concentrated in the north of Italy (83.8% of GBV), which benefits from the country's most dynamic economic conditions and, in general, the most efficient tribunals.

Seasoning of secured and unsecured exposures. The seasoning of secured and unsecured exposures is respectively 3.8 and 4.4 years; this is below the average seasoning of peer transactions rated by Scope.

Hedging structure. Interest rate risk on the class A notes is mitigated through a cap spread hedging structure, which applies an increasing upper bound rate to six-month Euribor ranging from 0.6% to 3.75%, and an increasing lower bound rate ranging from 0% to 0.7%. The terms and conditions also contain a cap on the interest rate for Class A notes, which is aligned with the upper band of the cap spread. The cap spread notional schedule is generally aligned with our expected amortisation profile on the class A note. Interest rate risk on class B notes is not hedged, but it is mitigated by Euribor component ranking junior to class A principal.

Negative rating drivers and mitigants

Legal proceedings. Around 63.5% of the secured loans are in the initial legal phase or are yet to have proceedings initiated. This is above average compared to peer transactions.

Loan to value. Secured loans with a loan-to-value higher than 200% are 30.2% of GBV; this is above average considering peer transactions rated by Scope.

Portfolio concentration. Top 100 borrowers represent ca. 35% of portfolio's GBV, which is higher than the average concentration in peer transactions rated by Scope.

Upside rating-change drivers

Rapid economic growth following the pandemic crisis. A scenario of rapid economic recovery would improve liquidity and affordability conditions and would prevent a sharp deterioration of collateral values. This could positively affect the rating, enhancing servicer performance on collection volumes.

Servicer outperformance on recovery timing. The pandemic led to the temporary suspension of courts' activity. If courts advance on legal proceedings backlogs faster than expected, an outperformance on recovery timing could occur. This could positively impact the rating.

Downside rating-change drivers

Long lasting pandemic crisis. Recovery rates are generally highly dependent on the macroeconomic climate. Scope baseline scenario foresees a 7.5% gross domestic product contraction in 2020 (with downside risk on this estimate), before a recovery of +4.5% in 2021. If current crisis will last beyond Scope baseline scenario, liquidity conditions could deteriorate, reducing servicer performance on collection volumes. This could negatively impact the rating.

Servicer underperformance on recovery timing. Servicer performance below Scope's base case collection timing assumptions could negatively impact the rating.

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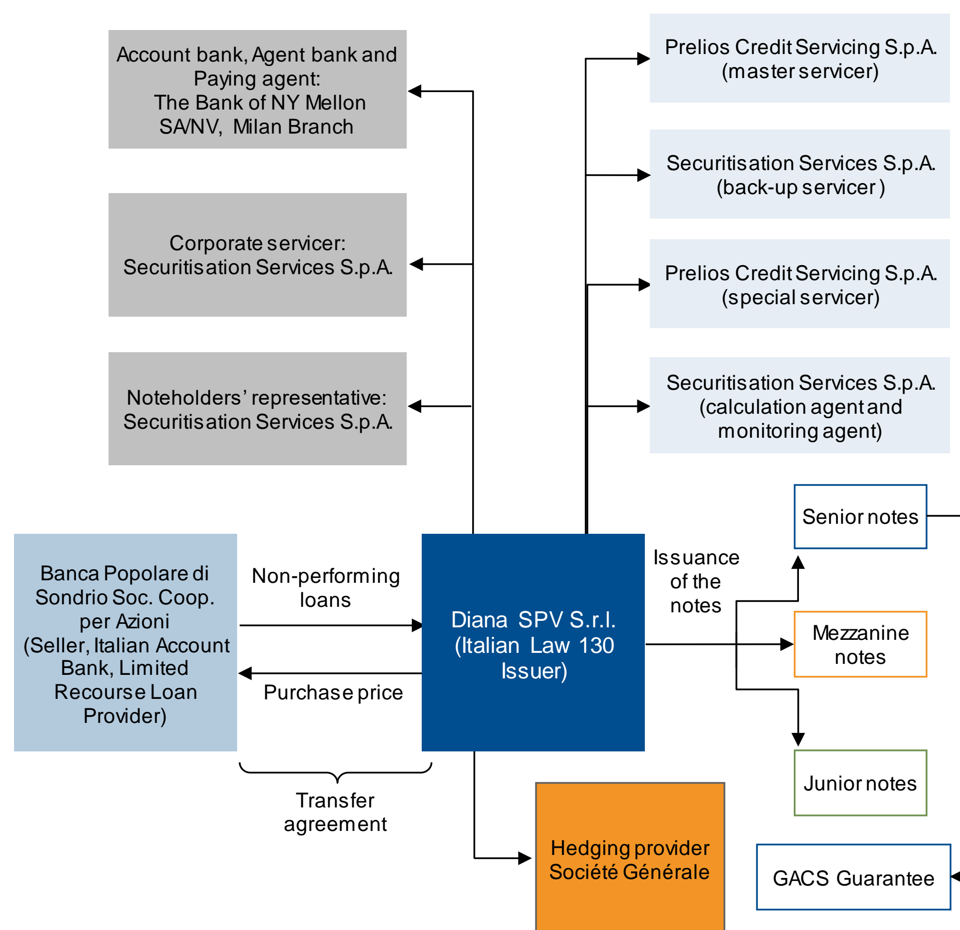
1. Transaction summary

The transaction's structure comprises three tranches of sequential, principal-amortising notes, an amortising liquidity reserve equal to 4.5% of the outstanding class A, and an interest rate cap spread agreement to hedge interest rate risk on class A notes.

Figure 1: Transaction diagram



Sources: Transaction documents and Scope Ratings

We adjusted the pool's gross book value using information on collections and sold properties since the 1 April 2019 cut-off date. The analysis excluded loans, which we assumed to be closed, based on the amount of collections already received and cash-in-court amounts to be received. Collateral connected with these positions was also removed.

The adjustments reduced the portfolio's gross book value to EUR 855.9m from EUR 999.7m. Collections received since the cut-off date ("ad interim collections") are assumed to be cash available at closing that will be distributed in the first payment date, while cash-in-court is assumed to be received up to three years after the closing date.

Our analysis is performed on a loan-by-loan level, considering all information provided to us in the context of the transaction as well as publicly available information. Loans are defined as 'secured' if they are guaranteed by first-lien mortgages, otherwise they are classified as 'unsecured'.

Figure 2 shows the main characteristics of the portfolio that we analysed, with the details of the secured and unsecured portions.

Figure 2: Key portfolio stratifications

	All	Secured	Junior liens**	Unsecured
Number of loans	4,813	1,326	145	3,342
Number of borrowers	2,981			
Gross book value (EUR m)	999,717,421	646,928,920	33,849,538	318,938,963
% of gross book value	100%	64.7%	3.4%	31.9%
Weighted average seasoning	4.00	3.79	3.10	4.52
Sum of collateral appraisal values (EUR m)***		654,758,683	179,442,464	
Borrower type (% of GBV)				
Corporate	78.5%			
Individual	21.5%			
Primary procedure*				
Bankrupt borrower	22.0%	28.2%	14.8%	
Non-bankrupt borrower	78.0%	71.8%	85.2%	
Stage of procedure (secured loans)				
Initial		63.5%	72.5%	
Court-appointed valuation (CTU)		2.5%	0.6%	
Auction		22.3%	14.5%	
Distribution		11.8%	12.4%	
Geography (% of collateral value)				
North	83.8%	81.5%	92.4%	
Centre	9.7%	10.7%	5.8%	
South and islands	6.5%	7.8%	1.8%	
Borrower concentration				
Top 10	8.7%			
Top 100	34.7%			
Property type				
Residential	46.6%	46.5%	46.8%	
Non-residential	53.4%	53.5%	53.2%	

* Some loans have more than one type of ongoing procedure. This distribution partly reflects our assumptions regarding the primary type of procedure. In case of more than one procedure we assumed the bankruptcy procedure to be the primary one.

** Junior liens are all liens subordinate to the first ranking mortgage lien, i.e. second and lower-ranking mortgage liens.

*** The sum of collateral appraisal is based on the latest available valuations, without the application of any haircut to the appraisal values. Properties already sold have been removed from this figure.

2. Macroeconomic environment

Scope revised the rating Outlook on Italy's BBB+ long term rating to Negative on material fiscal deterioration

On 15 May, Scope **revised the Outlook** on Italy's long-term sovereign ratings to Negative, from Stable, reflecting: i) sharp deterioration in public finances as a result of the significant cyclical downturn and the government's response to the Covid-19 crisis and ii) low nominal growth expectations alongside structural bottlenecks to long-term fiscal consolidation expectations that limit a material reduction in the government's public debt burden longer term. The next review of Italy's BBB+/Negative sovereign ratings is scheduled by 30 October 2020.

To mitigate the adverse economic consequences of the health crisis, Italian authorities have launched meaningful budget stimulus of 4.5% of gross domestic product (GDP) in 2020, pushing Italy's deficit to above 10% of GDP, and increasing public debt from 135% of GDP in 2019 to above 155% of GDP by end-2020. Risks to Scope's baseline debt projections remain skewed heavily to the upside with, for example, the 2020 increase in debt being much greater (to about 185% of GDP) under a stressed scenario of a more severe economic contraction and/or in the case additional fiscal resources are activated to address the crisis beyond those announced to date. Annual government gross financing needs are expected to remain structurally more elevated post-crisis due to debt accumulated.

At the same time, Italy maintains credit strengths including the economy's memberships of the European Union and euro area with a strong reserve currency and the ECB and European Stability Mechanism acting as lenders of last resort. The ECB's open-ended guidance and commitment to public sector bond purchases have been critical in the anchoring of accommodative financing conditions for sovereign issuers experiencing

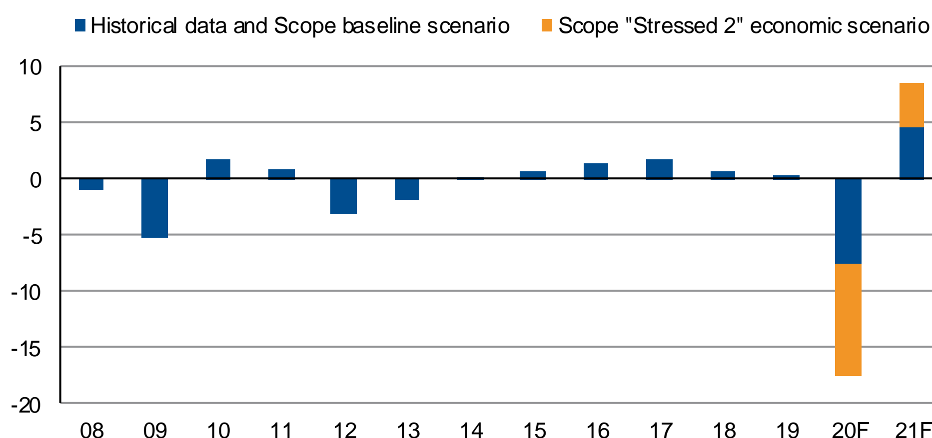
economic distress in 2020. Italy's 10-year yield level stands at below 1.5%, comparatively benign compared with the above 7% level reached at 2011-12 sovereign debt crisis peaks, and ECB purchases will mean well above 20% of Italian general government debt is transitioned to the Eurosystem balance sheet by year-end, curtailing the scale of the 2020 increase in outstanding government debt owned by the private sector – the segment of sovereign debt rated by Scope.

In addition, Scope recognises Italy's systemic relevance for the euro area and the associated high likelihood of additional enhanced contingent support from European institutions under more severe market scenarios. Moreover, a pre-crisis record of primary fiscal surpluses, a strong external sector, moderate levels of non-financial private sector debt and enhanced financial system cushions are acknowledged as credit strengths.

Risks associated with severe 2020 economic contraction

In 2020, Scope expects a severe economic decline, with Italian GDP to contract between 7.5% and 17.5% under alternative Scope scenarios ("baseline" and "stressed 2" economic scenarios are reported in Figure 3). This is before a recovery in 2021 of 4.5% to 8.5%. In addition, there are risks that a prolonged crisis and loss of investment will further weaken Italy's growth potential. Italy's growth potential was weak entering the crisis. Over 2010 to 2019, nominal growth averaged 1.3% (with average real growth of 0.2% per year) – the lowest in the euro area after Greece. Scope estimates Italy's medium-run real economic growth potential at 0.7% (the second weakest in Scope's rated sovereign universe after that of Japan), reflecting in part assumptions of medium-run working-age population decline of 0.4% per year. Tepid growth potential informs Scope's expectation that a significant share of public debt accrued during this year's crisis will be of permanent nature longer term.

Figure 3: Annual real GDP growth, Italy



Sources: ISTAT, Scope Ratings GmbH forecasts per Scope's Q2 2020 Sovereign Update.

Although unemployment rates have declined in past months, they are expected to rise by the 2H of 2020

Before the current crisis, unemployment had fallen to 9.1% as of February 2020 (from a 2014 peak of 13%). While unemployment rates have, since the crisis started, fallen (to 6.3% in April 2020 as workers left the labour force), unemployment rate trends are likely to see a more unfavourable trajectory by the second half of the year. The European Commission foresees the unemployment rate in 2020 rising to an annual average of 11.8%, before easing to 10.7% in 2021.

NPLs to rise, although banks entered 2020 with strengthened balance sheets

Italian banks' stock of non-performing loans had been curtailed to 6.7% of total loans as of Q4 2019 before the crisis, compared with 18.2% during a 2015 peak, although NPLs are expected to rise in 2020 – even if the scale of this increase might be mitigated by public guarantees issued on loans by government authorities. The Italian banking sector's regulatory tier 1 capital ratios stood at 14.9% of risk-weighted assets as of Q4 2019,

100bps higher than levels per Q4 2018 – meaning banks entered the crisis having enhanced balance sheet resilience.

3. Portfolio characteristics

In this section we provide details of key portfolio characteristics as of 1 April 2019. Percentage figures refer to gross book value, unless otherwise stated.

3.1. Eligible loans

Customary eligibility criteria

The representations and warranties on receivables, provided by the originator, are generally aligned with market standards.

An extract of the representations is reported below::

- All loans are denominated in euros
- All loans agreements are governed by Italian law
- All receivables are valid for transfer without any limitations
- All receivables are free from encumbrances
- Borrowers have been reported by the originator as defaulted (in sofferenza) to the Italian Credit Bureau (Centrale Rischi) of the Bank of Italy as of the transfer date
- As of the transfer date, corporate borrowers are entities incorporated under Italian law with a registered office in Italy
- As of the date on which financings were granted, borrowers were individuals residing in Italy
- Loans secured by mortgages are backed by real estate assets located in Italy
- Borrowers are not employees, managers or directors of the originator
- Each voluntary or judicial mortgage has the lien reported in the datatape

3.2. Detailed stratifications

3.2.1. Borrower type

Most of the borrowers are corporates (78.5%)

Corporates and individuals represent 78.5% and 21.5% of the pool GBV respectively.

The portfolio has a moderate share of unsecured loans (31.9%), while first-lien secured loans amount to 64.7% of the pool GBV. We treated junior-lien secured loans (3.4%) as unsecured loans.

Figure 4: Borrower type

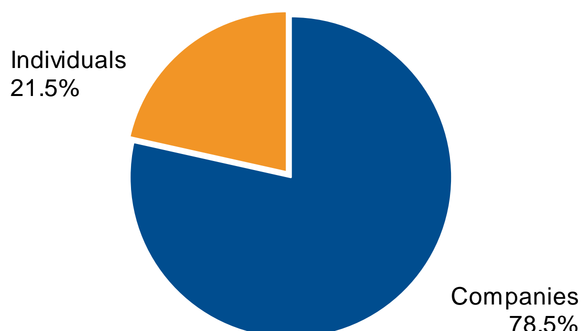
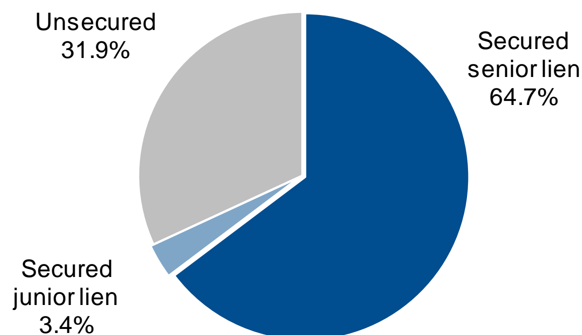


Figure 5: Loan typea



Sources: Transaction data tape; calculations by Scope Ratings

3.2.2. Geographical distribution

High geographic concentration in northern Italy is credit-positive

The portfolio is concentrated in the north of Italy with 81.4% of the first-lien property appraisal values located in this region.

Specifically, borrowers' properties are concentrated in the following main cities: Milan (11.5%), Turin (1.2%) and Genoa (0.1%). Additionally, there is a moderate share of properties concentrated in Rome (8.9%).

Our analysis considers the impact that a weak economic performance may have on property prices. This element, along with slow court-resolution times due to the portfolio's share of bankruptcy procedures, may affect the realisation of value for the properties securing the loans.

Figure 6: Collateral location of secured loans

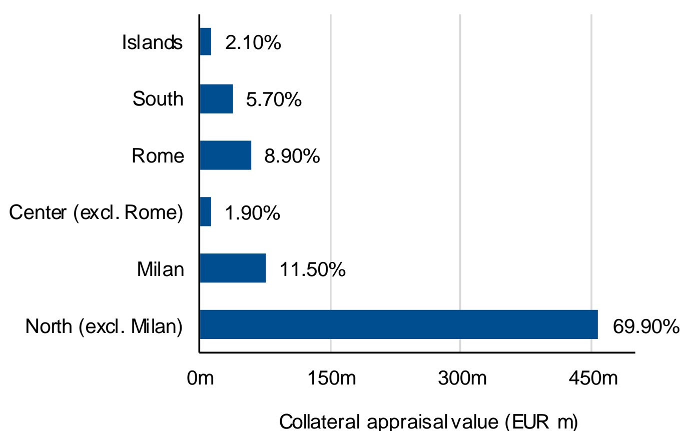
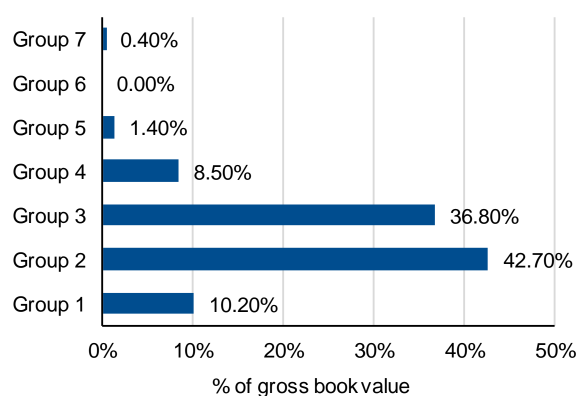


Figure 7: Court group distribution of secured loans



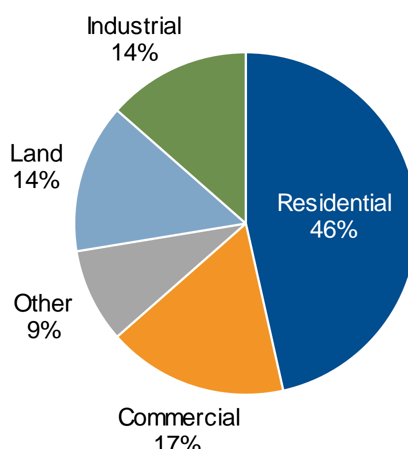
Sources: Transaction data tape; calculations by Scope Ratings

3.2.3. Collateral type

Residential and non-residential properties are in comparable shares

The portfolio's first-lien secured exposures are collateralised by the following property types: residential (46.6%), commercial (17.0%), industrial (13.5%), land (14.1%) and other type of properties (8.9%).

Figure 8: Distribution by type of collateral



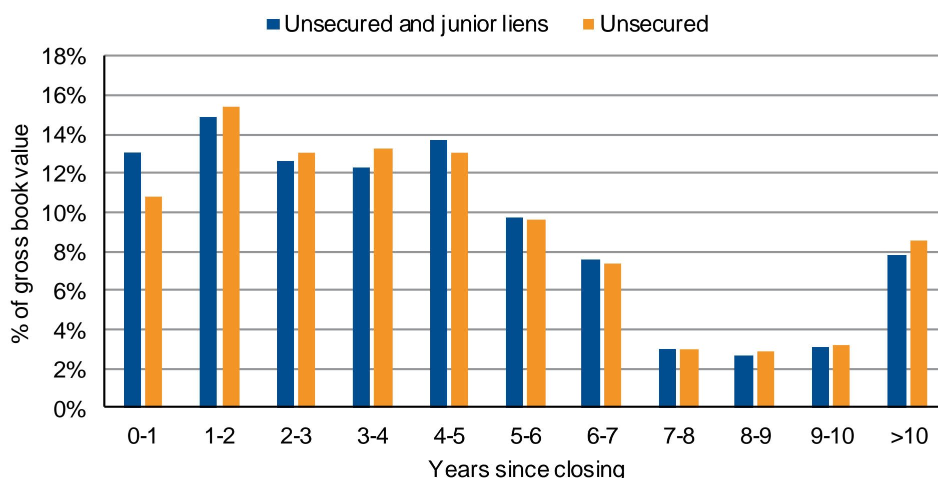
Sources: Transaction data tape; calculations by Scope Ratings

3.2.4. Loan seasoning

Unsecured and secured seasonings are below the average of peer transactions rated by Scope

The weighted average time between default and the closing date ("seasoning") is around 4.4 years for unsecured exposures. Additionally, the seasoning of secured exposures is around 3.8 years. Both figures are below the average compared to peer transactions rated by Scope.

Figure 9: Unsecured portfolio seasoning distribution as of cut-off date



Sources: Transaction data tape; calculations by Scope Ratings

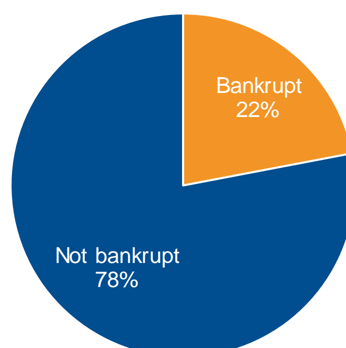
3.2.5. Borrower status

Figure 10 shows our assumptions regarding the main legal proceedings for each borrower (one borrower can have several), based on the transaction's data tape. For borrowers for which both bankruptcy and non-bankruptcy procedures were outstanding, we assumed bankruptcy as the main legal procedure. Borrowers with no ongoing procedure were assumed to enter bankruptcy procedures.

Bankruptcies result in lower recoveries than non-bankruptcy proceedings

Bankruptcies are generally more complex, lengthy and costly than non-bankruptcy processes. Bankruptcies also result in lower expected recoveries for unsecured exposures, given the focus on liquidating assets in lieu of getting borrowers to start remitting payments.

Figure 10: Borrower status assumptions



Sources: Transaction data tape; calculations by Scope Ratings

3.2.6. Recovery stage of secured exposures

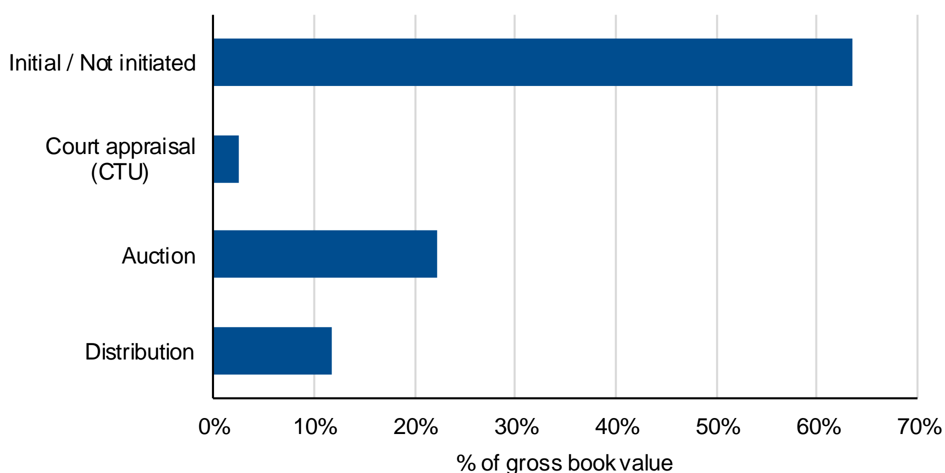
Proceedings in initial stages drive relatively long recovery timing assumptions

A large portion of the secured loans (63.5%) is in the initial stages (i.e., legal proceedings are not yet started or in an initial phase), this is above the average of peer transactions rated by Scope.

A high share of loans at initial stages typically contributes to a relatively long expected weighted average life of portfolio collections. However, this effect is counterbalanced by i) available ad-interim collections at closing (EUR 47.3m) and ii) cash in court amounts for EUR 32.6m that we assume will be recovered within the first three years of the transaction life. These factors contribute to a weighted average life of collections of 5.1 years for the class A notes analysis.

Figure 11 shows the stage of legal proceedings of secured loans.

Figure 11: Secured recovery stage by borrower status



Sources: Transaction data tape; calculations by Scope Ratings

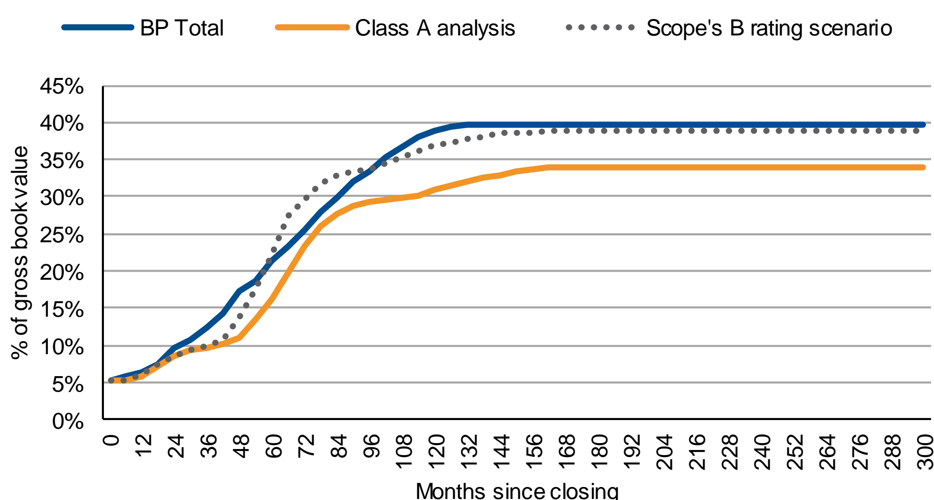
4. Portfolio analysis

Rating-conditional recovery assumptions

Figure 12 compares our lifetime gross collections and recovery timing assumptions for the entire portfolio with those in the servicer's business plan. We applied rating-conditional recovery rates (i.e., assumed expected recoveries decrease as the instrument's target rating increases). These assumptions are derived by blending secured and unsecured recovery expectations. We applied different analytical frameworks to the secured and unsecured segments to derive recoveries.

For the class A notes analysis, we assumed a gross recovery rate[3] of 34.0% over a weighted average life of 5.1. years. By segment, we assumed a gross recovery rate of 47.7% for the secured portfolio and 8.9% for the unsecured portfolio.

Figure 12: Business plan's gross cumulative recoveries vs Scope's assumptions[4]



Sources: Special servicer's business plan and Scope Ratings

4.1. Analysis of secured portfolio segment

Valuation haircuts mainly address forward-looking market value and liquidity risks

Figure 13 shows our lifetime gross collections vectors for the secured[5] portfolio segment compared to those in the servicer's business plan.

Our analytical approach mainly consists of estimating the security's current value based on property appraisals and then applying security-value haircuts to capture forward-looking market value and liquidity risks. Our recovery timing assumptions are mainly based on the efficiency of the assigned court, with the latter derived using historical data, the length of the proceeding, the type of legal proceeding and the stage of the proceeding. Our analysis also captures concentration risk, the servicer's business plan, and available workout options.

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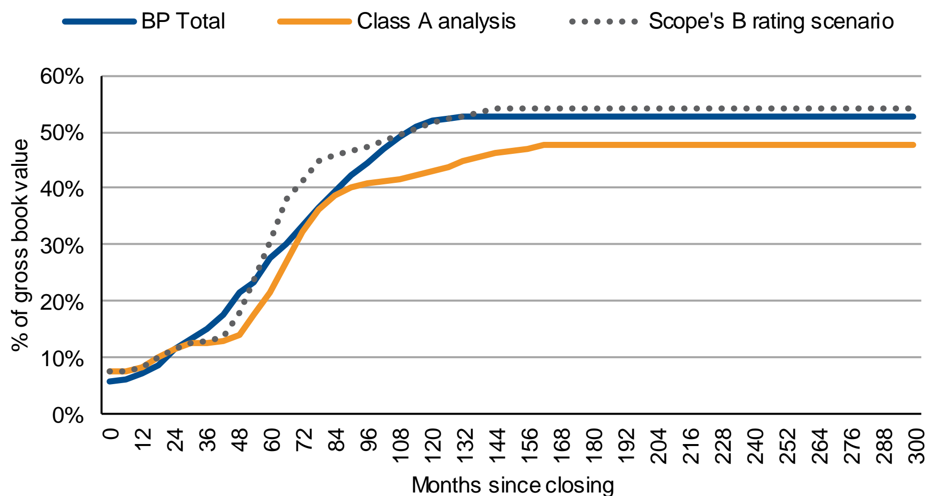
[3] The reported recovery rate includes cash-in-court amounts and ad-interim collections.
[4] The reported recovery rate includes cash-in-court amounts and ad-interim collections.
[5] We define secured loans as those guaranteed by at least a first-lien mortgage, based on a loan-by-loan analysis. Business plan secured recoveries are those related to senior secured loans as per the business plan definition.

Figure 13: Business plan's gross cumulative recoveries for secured borrower's vs Scope's assumptions[6]



Sources: Special servicer's business plan and Scope Ratings

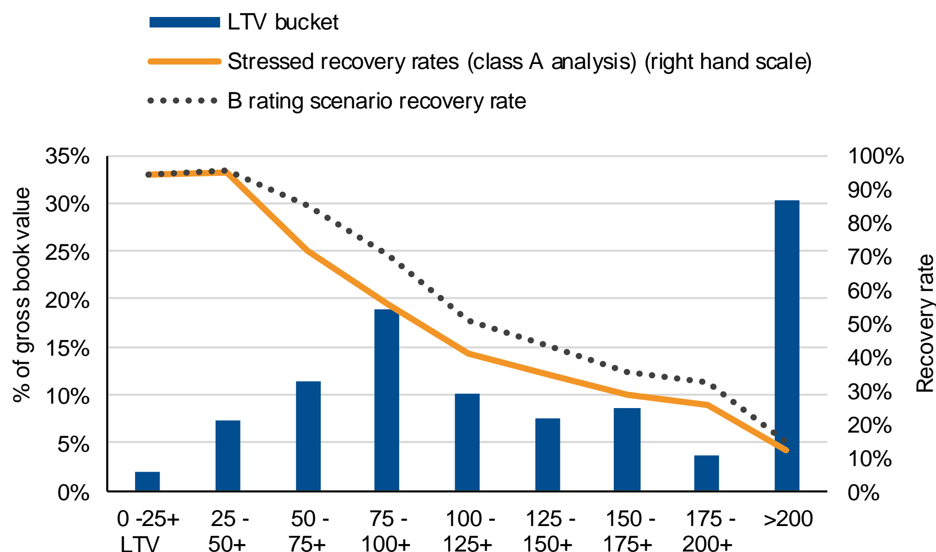
4.1.1. Collateral valuations and Scope specific recovery rate assumptions

Recovery rate assumptions reflect portfolio's LTV distribution

Figure 14 shows the secured loans' distribution by loan-to-value (LTV) bucket as well as our recovery rate assumptions for each LTV bucket (under our rating-conditional stresses applied for the analysis of the class A). This results in a weighted average recovery rate for the secured loans of 47.7% under the class A rating-conditional stress.

Compared with the peer transactions rated by Scope, the pool has an above average share of loans with high LTV: 30.2% of portfolio's GBV is related to loans with LTVs higher than 200%.

Figure 14: Secured loans' distribution by LTV and our transaction-specific secured recovery rate assumptions per class A and for the base case



Sources: Transaction data tape; calculations by Scope Ratings

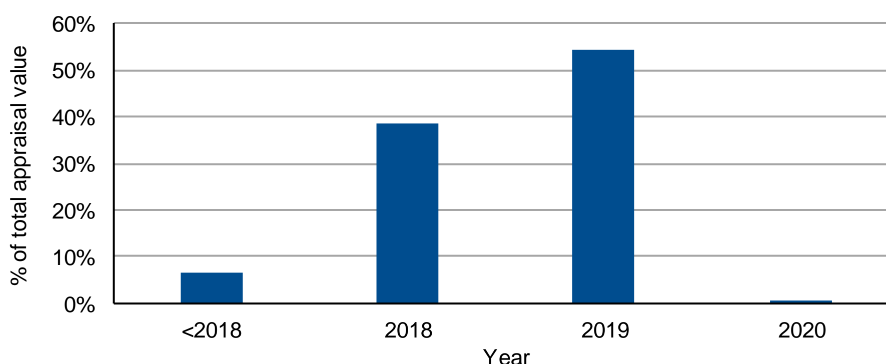
[6] The recovery rate includes cash-in-court amounts and ad-interim collections.

4.1.2. Appraisal analysis

High share of recent property appraisals is credit positive

We relied on line-by-line property market value appraisals, conducted by the CTU[7], real estate market operators and qualified third parties. We also considered valuations conducted with a statistical approach or with an automated valuation model (AVM) logic. Most of the valuations (93.5% of properties total appraisal value) are recent, i.e., conducted between 2018 and 2020. We indexed seasoned valuations using a variety of regional price indices. However, indexation has a marginal impact on this portfolio since most of the valuations are recent and property prices have remained fairly flat in the last few years.

Figure 15: Collateral valuation dates



Source: Transaction data tape

High share of drive-by property appraisals (62%)

We applied rating-conditional haircuts ranging from 0% to 20%, reflecting our view of the level of quality and accuracy of each valuation procedure.

Figure 16: Portfolio appraisal types and our transaction-specific valuation haircut assumptions

Valuation type	Percentage of collateral value	Class A analysis haircut	Scope's B rating scenario
Drive-by	62.0	-	-
Desktop	9.8	5%	4%
CTU	19.1	10%	8%
Other (statistical or AVM)	9.1	20%	16%

Sources: Transaction data tape; calculations and/or assumptions by Scope Ratings

4.1.3. Property market value assumptions

Figure 17 details our assumptions about property price changes over the transaction's lifetime when applying rating-conditional stresses for the analysis of the class A. These assumptions are specific to both the transaction and the region and are based on an analysis of historical property price volatility and on fundamental metrics relating to property affordability, property profitability, private sector indebtedness, the credit cycle, population dynamics and long-term macroeconomic performance.

[7] Consulente Tecnico d'Ufficio

Figure 17: Collateral location and our transaction-specific price change assumptions

	North						Centre			South			Islands	
Region	Milan	Turin	Genoa	Bologna	Venice	Others	Rome	Florence	Others	Naples	Bari	Others	Metropolitan cities	Rest of provinces
Class A analysis	-11.4	-11.4	-12.6	-11.4	-16.0	-17.1	-14.3	-17.1	-15.4	-14.3	-14.3	-20.0	-18.3	-18.3
Portfolio distribution (%)	11.0	2.0	0.3	0.0	0.0	70.5	7.8	0.0	1.9	0.3	0.1	4.4	0.2	1.6

4.1.4. Collateral liquidity risk

Asset liquidity risk is captured through additional fire-sale haircuts applied to collateral valuations.

Figure 18 shows the rating-conditional haircuts applied for the analysis of the class A. These assumptions are based on historical distressed property sales data provided by the servicers and reflect our view that non-residential properties tend to be less liquid, resulting in higher distressed-sale discounts.

The stress indicated for non-residential properties in Figure 18 represents the range of stress we apply.

Figure 18: Scope's transaction-specific fire-sale discount assumptions

Property types	Percentage of collateral value	Class A analysis haircut	Class B analysis haircut
Residential	47%	35%	28%
Non-residential	53%	40%-50%	32%-40%

4.1.5. Concentration and seismic risk

Top 100 borrowers concentration is higher than the average of peers transactions rated by Scope

We addressed borrower concentration risk by applying a 13.8% rating-conditional recovery haircut to the 10 largest borrowers for the analysis of the class A notes. The largest 10 and 100 borrowers account for 8.7% and 34.7% of the portfolio's gross book value, respectively. The concentration of the top 100 borrowers is higher than the average for peer transactions rated by Scope.

Seismic risk is not material

The portfolio was originated by Banca Popolare di Sondrio Società Cooperativa per Azioni, an Italian bank mainly operating in the north of Italy. As a consequence of originator's business and operativity, the portfolio is highly concentrated in northern Italy (83.8% of collateral value), an area that is typically lowly exposed to seismic risk.

4.1.6. Residual claims after security enforcement

We address potential residual claims after security enforcement

A secured creditor may initiate enforcement actions against a debtor despite the closure of an enforcement action concerning the mortgaged property. Secured creditors generally rank equally with unsecured creditors for amounts that have not been satisfied with the security's enforcement. The creditor's right to recover its claim, whether secured or unsecured, arises with an enforceable title (i.e. a judgment or an agreement signed before a public notary).

No credit to residual claims from corporate borrowers

For corporate loans, we gave no credit to potential further recoveries on residual claims after the security has been enforced.

Partial credit to residual claims from individuals

Based on servicers' historical data, we gave credit to residual claims on 10% of the loans to individuals. Recovery strategies are typically not highly focused on collecting residual claims, as the relevant costs may be higher than the potential proceeds. On the other hand, residual claims can be enforced in a profitable way for some individual borrowers, as the elapsed time after a default may have a positive impact. An individual may, for example, find new sources of income over time and become solvent again. Also, when is

cost-efficient, servicer's interest is to maximise the amount of recoveries, even after the security has been enforced.

4.1.7. Tribunal efficiency

We applied line-by-line time-to-recovery assumptions considering the court in charge of the proceedings, the type of legal proceeding (i.e., bankruptcy or non-bankruptcy), and the current stage of the proceeding.

Court distribution is skewed towards northern regions of Italy which show below average court timings

The total length of the recovery processes is mainly determined by the efficiency of the assigned court and by the type of legal proceeding. To reflect this, we grouped Italian courts into seven categories, based on public data on the average length of bankruptcy and foreclosure proceedings between 2015 and 2017, as shown in Figure 19. Most courts are concentrated in group 2, which is driven mainly by the portfolio's high exposure to the northern Italian regions (see Figures 6 and 7 for transaction-specific details).

For the analysis of the class A notes, a rating-conditional stress was applied for both bankruptcy and non-bankruptcy procedures (3.3 years and 1.6 years were respectively added to the total legal procedures' length).

Figure 19: Total length of the recovery process by court group in years

Court group	Bankruptcy proceedings	Non-bankruptcy proceedings	Percentage of courts*
1	4	2	10.2%
2	6	3	42.7%
3	8	4	36.8%
4	10	5	8.5%
5	12	6	1.4%
6	14	7	0.0%
7	18	9	0.4%

* Percentages incorporate our assumptions with reference to courts not included in available information

4.2. Analysis of unsecured portfolio segment

Unsecured portfolio analysis is based on statistical data

We applied a stressed recovery rate of 8.9% for the class A analysis.

Our base case recovery amount and timing assumptions were based on loan-by-loan data with recoveries for different types of unsecured loans. We also considered data for unsecured loans provided by the servicer together with information obtained during the latest review performed with the servicer.

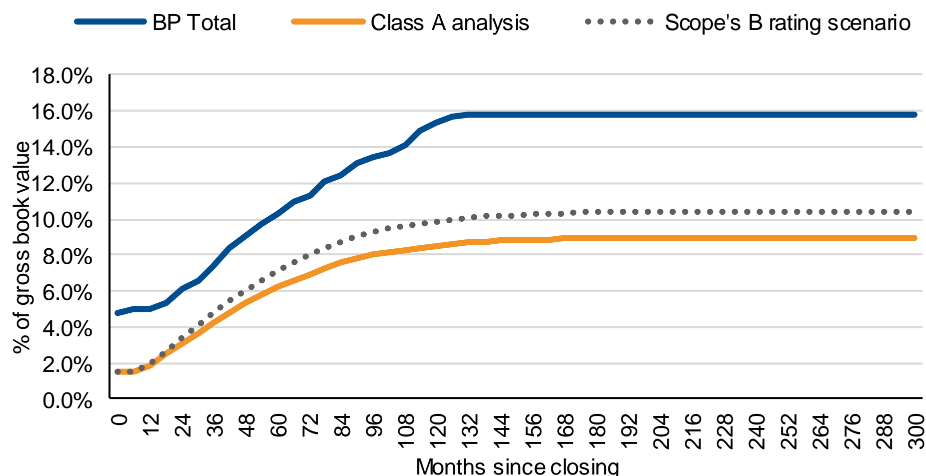
Our assumptions for unsecured exposures consider the nature of the recovery procedure; bankruptcy proceedings are generally slower and typically result in lower recoveries than non-bankruptcy proceedings.

Figure 20 shows our gross collections vectors for the unsecured[8] portfolio segment compared to those in the servicer's business plan.

The different classification of the exposures for secured and unsecured loans and the different recoveries' aggregation level partly explain the differences between our recovery assumptions and the servicer's recovery assumptions.

[8] We define unsecured loans as those not guaranteed by at least a first-lien mortgage, based on a loan-by-loan analysis and as outlined in the 'Transaction Summary' section. Business plan unsecured recoveries are those related to junior secured and unsecured loans as per the business plan definition.

Figure 20: Business plan's unsecured gross cumulative recoveries vs our assumptions[9]



Sources: Special servicer's business plan and Scope Ratings

5. Key structural features

5.1. Combined priority of payments

The issuer's available funds (i.e., collection amounts received from the portfolio and the cash reserve, along with any indemnity, cap agreement and insurance payments) will be used in the following simplified order of priority:

1. Servicer fees and other issuer counterparty fees, taxes and transaction expenses
2. Interest on the limited-recourse loan
3. GACS premium, provided the GACS guarantee is in place
4. Replenishment of recovery-expense reserve
5. Interest on class A notes
6. Any other amounts payable under the GACS guarantee
7. Cash reserve replenishment
8. Principal on the limited-recourse loan
9. Interests[10] on class B notes, provided no interest subordination event has occurred; or any unpaid interest on class B notes - as a consequence of an interest subordination event other than a GACS interest subordination event or, any unpaid interest on class B notes - as a consequence of a GACS interest subordination event that has been cured
10. Principal on class A notes, until repaid in full
11. Deferred interests of class B notes[11], and upon the occurrence of an interest subordination event, the full amount of class B interests
12. Principal on class B and mezzanine deferred servicer performance fees, if any
13. Interests on class J notes
14. Principal on class J notes, junior deferred servicer performance fees, if any
15. Any residual amount as class J variable return

[9] The recovery rate includes ad-interim collections and cash in court amounts.
[10] The Euribor component of class B interests, if positive, ranks junior to class A repayment (item 11 of the combined priority of payments). Interests on class B notes are floored at 0.
[11] The Euribor component of class B interests, if positive.

Interest subordination event for class B is aligned with the updated requirements of the 2019 GACS Scheme

An interest subordination event occurs if i) the cumulative collection ratio[12] falls below 90% (also defined as "GACS interest subordination event"); ii) the NPV cumulative profitability ratio[13] falls below 90%; or iii) the interest amount actually paid on the class A notes on the following interest payment date is lower than the interest amount due and payable on such an interest payment date. The occurrence of an interest subordination event results in class B interests being paid under item 11 of the waterfall above.

Once the interest subordination event is cured, class B interests due are paid senior to class A principal.

Class B interest payments accrued but not paid on the relevant preceding payment date due to the occurrence of a GACS interest subordination event, are only paid if (a) class A is fully repaid; or (b) the cumulative collection ratio is higher than 100%. Class B interests accrued but not paid on a preceding payment date due to the occurrence of an interest subordination event triggered by the NPV cumulative profitability ratio or unpaid interest on the senior notes – items ii) and iii) above – are paid if (a) class A is fully repaid; or (b) the interest subordination event is cured. Once these conditions are met, class B interests previously accrued and unpaid are paid senior to class A principal. These mechanisms are aligned with the requirements of GACS scheme updated in 2019[14].

We tested different recovery timing assumptions as well as different levels of lifetime recoveries to assess their impact on the triggering of an interest subordination event.

Scope's ratings do not address the GACS guarantee

The GACS guarantee ensures the payment of interest and the ultimate payment of principal by the final maturity of the class A notes. Our rating on the class A notes does not give credit to the GACS guarantee but considers the potential cost (i.e., the GACS premium) if the guarantee is added to the structure.

Non-timely class A interest payment would trigger accelerated waterfall

Non-timely payment of interest on the senior notes (if no GACS guarantee is in place), among other events such as the issuer's unlawfulness, would accelerate the repayment of class A via the full subordination of class B payments.

5.2. Servicing fee structure and alignment of interests

5.2.1. Servicing fees

Alignment of servicer and noteholder interests

The servicing fee structure links the portfolio's performance with the level of fees received by the servicer, which mitigates potential conflicts of interest between the servicer and the noteholders.

The servicer is entitled to: i) an annual base fee calculated on the outstanding portfolio's gross book value; ii) a performance fee on secured exposures, calculated on collections net of legal costs; and iii) a performance fee on unsecured exposures, calculated on collections net of legal costs. Servicer fees are calculated and payable at each payment date.

The precise level of applicable fees is subject to the type of workout process and the size of the exposure. Out-of-court settlements and lower tickets generally bear higher

[12] 'Cumulative collection ratio' is defined as the percentage ratio between: i) the aggregate net collections since 1 April 2019 (cut-off date); and ii) the net expected aggregated collections (based on the initial business plan) since the cut-off date. Net collections are the difference between gross collections and recovery expenses.

[13] 'NPV cumulative profitability ratio' is defined as the ratio between: i) the sum of the present value (calculated using an annual rate of 5%) of the net collections for all receivables relating to exhausted debt relationships since the cut-off date; and ii) the sum of the target price (based on the servicer's initial business plan) of all receivables relating to exhausted debt relationships since the cut-off date. At the numerator the following items are excluded: i) collections deriving from the sales, settlements and renegotiations approved by the seller from the cut-off date until the closing date and ii) proceeds related to the repurchase option exercised by the seller. At the denominator, the target prices of those debt relationships being exhausted as consequence of i) or ii) are excluded.

[14] Italian Law Decree No. 18 of 14 February 2016, converted into Law No. 49 of 8 April 2016, subsequently amended and supplemented under Italian Law Decree No. 22 of 25 March 2019, converted into Italian Law No. 41 of 20 May 2019

performance fees relative to collection amounts. In our analysis, we assumed average performance fee levels for secured and unsecured loans, respectively, considering the portfolio distribution by gross-book-value buckets.

The transaction has a subordination mechanism for the servicing fees, based on the level reached by the NPV cumulative profitability ratio and the cumulative collection ratio. In case of underperformance, a portion of the fees is paid under items 12 and 14 of the priority of payments. and a haircut is applied to the fees. The servicer is therefore incentivised to maximise recoveries and comply with the initial business plan.

5.2.2. Servicer monitoring

Monitoring function protects noteholders' interests

An overview of the servicers' activities and calculations, prepared by Securitisation Services S.p.A. as monitoring agent, mitigates operational risks and moral hazard that could negatively impact noteholder interests. This risk is further mitigated by discretionary servicer termination events at the option of the monitoring agent, with the authorisation of the representative of noteholders.

The servicer is responsible for the servicing, administration, and collection of receivables as well as the management of legal proceedings. The monitoring agent will verify the calculations of key performance ratios and amounts payable by the issuer, as well as perform controls on a random sample of debt positions.

The monitoring agent will report to a committee that represents the interests of both junior and mezzanine noteholders. The committee can authorise the revocation and replacement of the servicer upon a servicer termination event, subject to the approval of the noteholders' representative. The monitoring agent can also authorise the sale of the receivables, the closure of debt positions, and the payment of additional costs and expenses related to recovery activities.

5.2.3. Servicer termination events

Back-up arrangements mitigate servicing disruption risk

Securitisation Services S.p.A. will step in as back-up servicer in the event of a servicer termination event.

A servicer termination event includes: i) insolvency; ii) failure to pay due and available amounts to the issuer within two business days; iii) failure to deliver or late delivery of information to the monitoring agent, in the context of the surveillance activities of the latter; iv) an unremedied breach of obligations; v) an unremedied breach of representation and warranties; and vi) the loss of legal eligibility to perform obligations under the servicing agreement. The servicer can also be substituted owing to its consistent underperformance, if 30 months after the closing date, the NPV cumulative profitability ratio is below 85% and for two consecutive payment dates or if the cumulative collection ratio is below 90% for two consecutive payment dates.

The special servicer can be terminated following the enforcement of the GACS guarantee, in case the cumulative net collection ratio has been lower than 100% for two consecutive collection dates.

5.3. Liquidity protection

Cash reserve protects liquidity of senior noteholders

A cash reserve will be funded at closing through a limited-recourse loan provided by the originator.

The target cash reserve amount at each payment date will be equal to 4.5% of the outstanding balance of the class A notes.

The cash reserve will be available to cover any shortfalls in interest payments on the class A notes as well as any items senior to them in the priority of payments, provided that the GACS guarantee is not implemented. Following the implementation of the GACS

guarantee, any liquidity shortfalls will primarily be covered by the guarantor, with the cash reserve mainly mitigating the time it takes between the draw on the guarantee and the actual payment.

Class B will not benefit from liquidity protection.

5.4. Interest rate hedge

Interest rate risk on class A notes is mitigated through a cap spread structure and a cap embedded in the notes

The issuer will not receive regular cash flows and the collections are not linked to any defined interest rate due to the non-performing nature of the securitised portfolio. On the liability side, the issuer pays a floating coupon on the notes, defined as six-month Euribor plus a 0.5% fixed margin on the class A notes, and six-month Euribor plus a 9.0% fixed margin on the class B notes.

The interest rate risk on the class A notes is partially mitigated via a cap spread hedging structure. The base rate on the class A notes will be capped with an upper bound rate ranging from 0.6% at the issue date to 3.75% until December 2032, whilst it will be floored with a lower bound rate ranging from 0% at the issue date to 0.70% until December 2032. In addition, a cap is embedded in class A interest rate, aligned with the upper band of the cap spread, with increasing values ranging from 0.60% at the issue date to 3.75% until the final legal maturity of the notes.

Interest rate risk on class B is mitigated by Euribor component ranking junior to class A principal

Class B interest rate risk is not covered by any hedging agreement, but the risk is mitigated for class A noteholders by the fact that the Euribor component ranks junior to Class A principal if positive and class B interest rate is floored at zero.

To assess the effectiveness of the cap rate levels, we stressed the Euribor forward curve, as shown in Figure 21.

The notional schedule of the cap spread is well aligned with our expected class A amortisation profile (see Figure 22).

A delay in recoveries beyond our stressed recovery timing vectors would increase interest rate risk exposure, as it would widen the gap between the relevant cap notional amount and the outstanding principal of the notes.

Figure 21: Interest rate cap spread class A

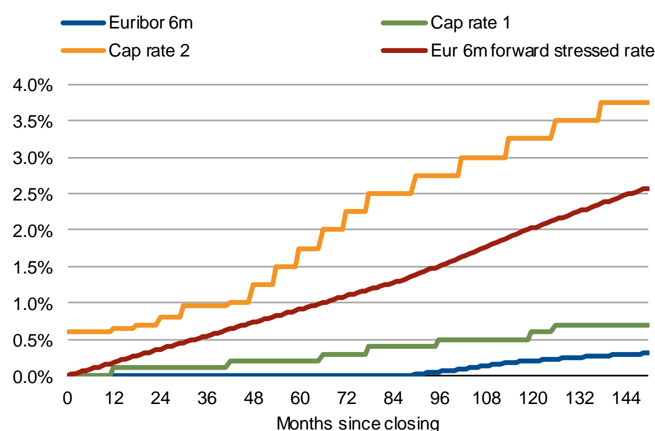
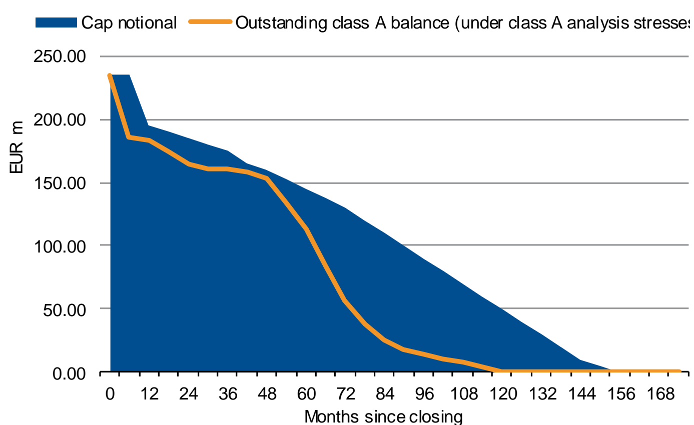


Figure 22: Cap spread notional vs outstanding class A notes



Sources: Transaction documents, Bloomberg and Scope Ratings

6. Cash flow analysis and rating stability

Our cash flow analysis considers the structural features of the transaction

We analysed the transaction's specific cash flow characteristics. Asset assumptions were captured through rating-conditional gross recovery vectors. The analysis captures the capital structure, an estimate of legal costs equivalent to 9% of gross collections, servicing fees as described in section 5.2, and estimated issuer senior fees of

EUR 175,000 annually. Our rating also addresses the cost of the GACS guarantee which, once implemented, is assumed to range between 1.23% and 3.07% of the outstanding class A notes' balance, based on the quotes provided to us. We took into account the reference rate payable on the notes, considering the cap rate embedded in the class A note, the subordination of the Euribor component paid on class B notes and the cap spread terms described in the previous section.

Scope's rating reflect expected losses over the instrument's weighted average life

The BBB rating assigned to the class A notes reflects expected losses over the instrument's weighted average life commensurate with the idealised expected loss table in Scope's General Structured Finance Ratings Methodology.

We tested the resilience of the rating against deviations from expected recovery rates and recovery timing. This analysis has the sole purpose of illustrating the sensitivity of the ratings to input assumptions and is not indicative of expected or likely scenarios. We tested the sensitivity of the analysis to deviations from the main input assumptions: i) recovery rate level; and ii) recovery timing.

For class A, the following shows how the results change compared to the assigned credit rating in the event of:

- a decrease in secured and unsecured recovery rates by 10%, zero notches.
- an increase in the recovery lag by one year, zero notches.

7. Sovereign risk

No mechanistic cap

Sovereign risk does not limit any of the ratings. The risks of an institutional framework meltdown, legal insecurity or currency convertibility problems due to an Italian exit from the euro area, a scenario which we have consistently viewed as highly unlikely, are not material for the notes' rating.

For more insight into our fundamental analysis on the Italian economy, please refer to the rating announcement on the Republic of Italy, dated 15 May 2020.

8. Counterparty risk

Counterparty risk does not limit the transaction's rating

In our view, none of the counterparty exposures constrain the rating achievable by this transaction. We considered counterparty substitution provisions in the transaction, counterparty ratings from Scope, when available, and public ratings. We also considered eligible investment criteria in the transaction documents for cash amounts held by the issuer.

The transaction is mainly exposed to counterparty risk from the following counterparties: i) Banca Popolare di Sondrio S.C.p.A. as originator/seller, regarding representation and warranties and the obligation of transferring the eventual payments that might be made by the borrowers to the issuer, as limited recourse loan provider, and Italian account bank ii) Prelios Credit Servicing S.p.A. as master servicer and special servicer; iii) Securitisation Servicers S.p.A. as back-up servicer, noteholders' representative, calculation agent, corporate servicer and monitoring agent; iv) The Bank of New York Mellon SA/NV, Milan Branch, as account bank, paying agent and agent bank; v) Société Générale as the cap spread counterparty provider. The cash manager may be appointed by the issuer, upon committee instructions, in a timely manner.

The roles of the account bank, principal paying agent, agent bank and cash manager must be held by an institution with minimum short-term and long-term ratings of S-3 and BB, if rated by Scope. Other replacement triggers on those counterparties are based on public ratings by other agencies.

The expenses accounts and an ad-interim collection account (mostly used for promissory notes, bank checks and other residual type of proceeds) will be held at Banca Popolare di Sondrio S.C.p.A. (the "Italian account bank"). The rating replacement trigger for the Italian account bank is not aligned with the criteria described in Scope's Methodology for Counterparty Risk in Structured Finance. However, the potential credit exposure of the issuer towards the Italian account bank is not expected to be material.

8.1. Servicer disruption risk

A servicer disruption event may have a negative impact on the transaction's performance. The transaction incorporates servicer-monitoring, back-up and replacement arrangements that mitigate operational disruption (see section 5.2).

8.2. Commingling risk

Limited commingling risk

Commingling risk is limited, as debtors will be instructed to pay directly into the accounts held in the name of the issuer.

In limited cases in which the servicer has received payments from a debtor, the servicer would transfer the amounts within two business days.

8.3. Claw-back risk

The seller has provided: i) a 'good standing' certificate from the Chamber of Commerce; ii) a solvency certificate signed by a representative duly authorised; and iii) if issued by the relevant court, a certificate from the bankruptcy court (tribunale civile – sezione fallimentare) confirming that the relevant seller is not subject to any insolvency or similar proceedings. This mitigates claw-back risk, as the issuer should be able to prove that it was unaware of the seller's insolvency as of the transfer date.

Assignments of receivables made under the Italian Securitisation Law are subject to claw-back in the following events:

(i) pursuant to article 67, paragraph 1, of the Italian Bankruptcy Law, if the bankruptcy declaration of the relevant originator is made within six months from the purchase of the relevant portfolio of receivables, provided that the receivables' sale price exceeds their value by more than 25% and the issuer is unable to demonstrate that it was unaware of the originator's insolvency, or

(ii) pursuant to article 67, paragraph 2, of the Italian Bankruptcy Law, if the adjudication of bankruptcy of the relevant originator is made within three months from the purchase of the relevant portfolio of receivables, provided that the receivables' sale price does not exceed their value by more than 25% and the originator's insolvency receiver can demonstrate that the issuer was aware of the originator's insolvency.

8.4. Enforcement of representations and warranties

Representations and warranties limited by time and amount

The issuer will rely on the representations and warranties, limited by time and amount, provided by the originator in the transfer agreement. If a breach of a representation and warranty materially and adversely affects a loan's value, the originator may be obliged to indemnify the issuer for damages.

However, the above-mentioned guarantee is enforceable by the issuer only within 18 months after the date the transfer agreement was entered into. The total indemnity amount will be capped to a maximum of 25% of the portfolio purchase price. Furthermore, the indemnity amounts will be subject to a deductible of EUR 100,000 on a portfolio basis, and EUR 5,000 on a single-loan basis.

These deductibility thresholds are aligned with peer transactions rated by Scope, though the period for the enforceability of originator's representation and warranties is in the lower range considering peer transactions.

9. Legal structure

9.1. Legal framework

Transaction documents governed by Italian and English law

The transaction documents are governed by Italian law, whereas English law governs the cap spread agreement.

The transaction is fully governed by the terms in the documentation and any changes are subject to the risk-takers' consent, with the most senior noteholders at the date of the decision having a superior voting right.

9.2. Use of legal opinions

We had access to the legal opinions produced for the issuer, which provide comfort on the legally valid, binding and enforceable nature of the contracts.

10. Monitoring

Ongoing rating monitoring

We will monitor this transaction based on performance reports as well as other public information. The rating will be monitored on an ongoing basis.

Scope analysts are available to discuss all the details of the rating analysis, the risks to which this transaction is exposed, and the ongoing monitoring of the transaction.

11. Applied methodology

For the analysis of the transaction we applied Scope's Non-Performing Loan ABS Rating Methodology, and Scope's Methodology for Counterparty Risk in Structured Finance, both available on www.scoperatings.com.

Diana SPV S.r.l.

Italian Non-Performing Loans ABS

I. Summary appendix – deal comparison

Transaction	Diana SPV	POP NPLS 2019	Futura	Iseo SPV	BCC NPLS 2019	Marathon	Prisma	Juno 2	Leviticus SPV	Belvedere SPV	Riviera NPL	POP NPLS 18	Aqui	IBLA (Ragusa)	Maior SPV	Maggese	Juno 1	BCC NPLS 2018	2Worlds	4Mori Sardegna	Aragorn NPL 2018	Red Sea SPV	Siena NPL 2018	Bari NPL 2017	Elrond NPL 2017
Closing	Jun-20	Dec-19	Dec-19	Dec-19	Dec-19	Dec-19	Oct-19	Feb-19	Feb-19	Dec-18	Dec-18	Nov-18	Nov-18	Sep-18	Aug-18	Jul-18	Jul-18	Jul-18	Jun-18	Jun-18	Jun-18	Jun-18	May-18	Dec-17	Jul-17
Originators	BPS	12	53 Banks	UBI	68	17 Fin.	Unicredit	BNL	BPM	multiple	Carige &	17 Banks	BPER	Banca di	UBI Banca	C.R. Asti,	BNL	ICCREA	BPS, BDB	Banco di	Creval	Banco BPM,	MPS	BPB, CRO	Creval
Master servicer	Prelios	Prelios	Guber Banca	Italfondiario	Italfondiario	Securitisation Services	Italfondiario	Prelios	Prelios	Prelios	Credito Fondiario	Cerved	Prelios		Prelios	Prelios	Prelios	Prelios	Cerved	Prelios	Credito Fondiario	Prelios	Credito Fondiario	Prelios	Cerved
Special servicer	Prelios	Prelios, Fire	Guber Banca	doValue	doValue	Hoist Italia	doValue	Prelios	Prelios	Prelios, BVI	Credito Fondiario, Italfondiario	Cerved	Prelios	Italfondiario	Prelios	Prelios	Prelios	Prelios	Cerved	Prelios	Cerved, Credito Fondiario	Prelios	J., IF., CF., P. ***	Prelios	Cerved
General portfolio attributes																									
Gross book value (EUR m)	999.7	826.7	1,256	857	1,324	5,027	6,057	968	7,385	2,541	964	1,510	2,082	330	2,496	697	880	1,009	968	900	1,676	5,113	23,939	345	1,422
Number of borrowers	2,981	6,633	9,639	6,401	8,596	324,282	52,419	1,120	19,747	13,678	3,606	6,578	6,255	1,598	11,061	1,313	731	2,518	3,956	11,412	4,171	12,651	79,669	1,565	3,712
Number of loans	4,813	16,718	16,152	8,373	15,944	412,795	137,813	3,609	49,404	31,266	9,776	17,093	21,279	4,805	22,580	5,313	2,787	5,359	13,234	20,098	8,289	33,585	545,939	4,569	6,951
WA seasoning (years)	4.0	6.1	5.5	3.5	3.4	7.5	5.3*	3.5*	3.8*	6.7*	2.0*	2.9*	3.9	2.2*	4.2*	3.1*	3.0*	2.6*	2.7*	4.8*	2.5	3.8	4.4*	4.5	3.7
WA seasoning (years) - unsecured	4.4	7.7	6.2	4.6	4.2	7.5	6.8*	3.9*	4.4*	6.7*	2.5*	3.5*	4.5	2.7*	4.6*	3.9*	3.1*	2.9*	3.2*	6.4*	3.2	3.5	4.8*	N/A	N/A
WA LTV buckets (% or secured																									
bucket [0-25]	2	4.3	2.3	1.4	3.4	N/A	3	1.8	3.5	2	3.8	5.5	3	2.8	10.3	2.1	3.5	4.3	2.8	5.7	2.0	2.3	5.7	N/A	3.6
bucket [25-50]	7.4	10.3	5.5	5.4	9.9	N/A	8	8	9.2	4.9	11.7	11.4	11.4	7.4	19.2	6.3	7.6	6.8	13	14.6	4.2	8.1	12.4	N/A	11.1
bucket [50-75]	11.4	12.4	8	10.4	11.9	N/A	13.2	15.4	12.6	5.4	12.9	17.5	17.8	12.5	21.2	11.6	14.3	12.5	17.9	21.8	8.2	14.7	16.8	N/A	13.7
bucket [75-100]	19	17.4	7.2	15.8	14.6	N/A	15	15.6	14.8	8.5	10.7	14.9	17.9	16.3	14.9	13.9	16	15.1	15.8	20.4	13.9	18.1	17.0	N/A	19.6
bucket [100-125]	10.2	11.7	10.1	17.7	13.6	N/A	12.7	11.2	9.5	6.8	12	13.8	12.2	15.9	10	20.8	14.7	11.8	14.5	12.8	22.3	16.7	13.4	N/A	24.6
bucket [125-150]	7.5	8.6	9.5	15.7	8.5	N/A	10.6	10.9	6.9	8.6	8	10.1	8.5	12.1	5	8.4	6.3	7.7	7.5	4.0	17.9	12.0	8.3	N/A	8.6
bucket [150-175]	8.6	6.2	6.4	10.3	8.8	N/A	8.5	3.7	6.9	4.8	8.3	5.6	4.8	7.3	4.4	7.7	5.3	6.4	4.9	1.8	11.9	6.6	5.3	N/A	4.8
bucket [175-200]	3.7	3.7	3.8	7.2	6.7	N/A	6.3	7.8	4.7	5.2	3.3	7.4	4.1	6.6	2	6.8	5	6.1	6.6	4.4	3.7	4.8	3.9	N/A	1.6
bucket > 200	30.2	25.5	47.2	16.1	22.6	N/A	22.8	25.5	31.9	53.9	29.5	13.8	20.4	19.2	12.9	22.2	27.3	29.3	17.1	14.5	16.0	16.7	17.1	N/A	12.5
Cash in court (% of total GBV)	3.3		1.1	1.6	1.1	N/A	1.8	5.9	2.0	2.7	1.2	1.3	3.1	2.2	4	2.7	7.2	24	8.5	18.3	0.5	3.2	N/A	N/A	2
Loan types (% of total GBV)																									
Secured first-lien	64.7	46.9	45.7	92.2	65.9	0.0	64	57.7	50.5	41.0	39.4	53.9	57	67.2	39.9	43.1	30.4	70	53.1	56.1	67.3	70.6	41.6	53.6	66.4
Secured junior-lien	3.4	5.3	6.1	3.3	7.9	0.0	0.4	3	5.6	8.2	9.0	8.8	2.5	2.1	6.7	9.6	2.4	0.9	0	0.6	8.1	1		2.5	7.6
Unsecured	31.9	47.7	48.2	4.5	26.2	100.0	35.7	39.3	43.9	50.8	51.6	37.3	40.5	30.8	53.4	47.3	67.2	29.1	46.9	43.3	24.6	28.4	58.4	43.9	26.0
Syndicated loans	0.0	1.4	2.4	0	5.2	0.0	0	7.5		0	0	3	2.2	0.5	1.1	1		6.1	3.8	3.3	1.8	1.4	5.7		
Debtors (% of total GBV)																									
Individuals	21.5	27.8	22	100	20.7	57.4	100	7.7	14.7	12.0	13.2	22.9	16.4	25.6	17	18.9	3.4	14.3	26.4	24.4	9.9	28.4	19	12	12.7
Corporates or SMEs	78.5	72.2	78	0	79.3	42.6	0	92.3	85.3	88.0	86.8	77.1	83.6	74.4	83	81.1	96.6	85.7	73.6	75.6	90.1	71.6	81	88	87.3
Procedure type (% of total GBV)																									
Bankrupt	22	51.5	64.2	0.9	60.5	N/A	0.7	69.9	71.7	82.2	72.7	56.6	44	13.2	49.5**	53.4	71.5	62.7**	29.3	39.1	55.0	49.4	36.6	46.5	57.6
Non-bankrupt	78	48.5	35.8	99.1	39.5	N/A	99.3	30.1	28.3	17.8	27.3	43.4	56	86.8	50.5	46.6	28.5	37.3	70.7	60.9	45.0	50.6	63.4	53.5	42.4
Borrower concentration (% of GBV)																									
Top 10	8.7	5.6	4.8	1.7	5.3	0.0	0.4	19	5.4	9.1	22.6	7.3	8	6.5	1.9	8.6	8.6	6.7	3.6	8	8.3	1.8	2.1	28.2	13.4
Top 100	34.7	26.6	21.5	7.4	26	0.0	1.7	56.2	20.3	24.2	45.5	26.4	26.5	26.9	10.4	31	34.4	29	18.1	27.7	39.5	9.1	9.5	69	42.4
Collateral distr. (% of appraisal val.)																									
North	83.8	21.2	74.1	50.7	38.1	N/A	37.1	32.8	71.1	48.8	79.3	20.9	48.5	0.3	57.9	98	43.9	72.4	43.5	1.3	58.5	67.8	35.9	18.3	61.6
Centre	9.7	8.7	14.6	21.1	35.6	N/A	24.2	38.9	17.4	23.6	12.3	36.3	8.1	0	19.2	0.4	34.8	19.5	51.3	11.5	18.4	20.7	36	14.1	14.6
South	6.5	70.1	11.3	28.2	26.3	N/A	38.6	28.3	11.4	27.6	8.3	42.9	43.4	99.8	22.9	1.6	21.3	8.1	5.2	87.4	23.1	11.4	28.1	67.6	23.8
Collateral type (% of appraisal val.)																									
Residential	46.6	54.4	47.1	94.8	43.8	N/A	90.1	34.8	41.6	41.9	40.6	41.7	33.9	57.8	57.3	46.7	29.2	39.3	44.4	51.3	43.4	54.8	28.2	43	32.6
Commercial	17.9	22.2	10.6	1.6	18.8	N/A	4.5	21.1	9.5	9.6	7.2	27.4	19.5	18.4	16.2	15.4	19.5	29.5	24.6	23.7	22	15.4	71.8	40	32.4
Industrial	11.5	6.1	21.2	2.1	15.3	N/A	0	16	5.3	7.2	17.3	16.2	15	9.6	14.8	21.8	32.4	11.2	10.5	11.3	15.3	9.4			23.2
Land	12.5	6	12.1	0.7	14.2	N/A	1	9	16.2	8.8	14.7	8.6	10.6	9.3	7.9	10.1	4.8	13.7	6.6	6.2	0.0	8.6		18	8.7
Other or unknown	11.6	11.3	9	0.7	7.9	N/A	4.4	19.1	27.5	32.5	20.2	6.1	21	4.9	3.9	6	14.1	6.3	13.9	7.6	19.3	11.8			3.4
Valuation type (% of appraisal val.)																									
Full or drive-by	62	25.9	0.9	0	57.7	N/A	0	56.8	32.3	31.4	21.4	45.5	48.3	60.5	16.9	58.3	10.2	68.4	79.5	38.8	96.1	74	10	96.31	70.8
Desktop	9.8	11	53.2	71.1	19.9	N/A	0	24.8	31.7	36.1	35.7	13.8	34	33.3	69.2	18.5	3.6	5.4	12	40	1.2	14.5	65		4.0
CTU	19.1	14.3	21.1	28.2	9	N/A	29.7	10.4	5.5	0.0	7.7	26	11	3.1	10.4	0	13.4	12.1	8.5	20.5	2.7	11.5	15	3.69	23.6
Other	9.1	48.8	0.8	0.7	13.4	N/A	70.3	8	30.5	32.5	35.2	14.7	6.7	3.1	3.5	23.2	72.8	14.1		0.6	0	0	10	0	0.5
Secured ptf proc. stage (% of GBV)																									
Initial	63.5	56.2	43.1	64.4	55.7	N/A	50.9	29.5	65.5	52.4	68.5	44.6	52.5	49.7	65	60.9	54.9	73.6	75.6	61.2	66.6	64.4	52.6	55.5	36.1
CTU	2.5	16.1	15.1	9.6	22.4	N/A	22.8	17.0	10.0	0.0	5.7	31.7	13.7	28.8	12.2	10.3	11.8	11	6.3	18.3	23.4	9.1	5.4	14.2	10.7
Auction	22.3	16.6	24.3	19.9	17.2	N/A	22.1	35.4	16.6	38.3	22.9	20.7	28.5	10.9	22.5	27.5	30.8	11.5	16.9	20.5	4.7	21.3	35.2	26.5	36.4
Distribution	11.8	11.1	17.4	6.1	4.8	N/A	4.3	18.1	8.0	9.3	2.4	3	5.4	10.7	0.3	1.3	2.5	3.8	1.2	0	5.5	5.2	6.7	3.8	16.8
Summary of assumptions (BBB rating conditional stress)																									
Remaining lifetime recovery rate (%)																									
Secured (=net LTV after all stresses)	47.7	52	36.7	54.7	54.7	N/A	46.2	61.2	51.8	36.7	52	61.8	58.8	55.3	63	54.9	52.1	50.3	65.5	66.2	48.3	62.8	58.6	51.8	61.7
Unsecured	8.9	9.7	7.6	16.5	16	9.1	1.4	8.6	10.2	7.3	13.2	10.9	12.8	12.4	11.5	10.1	10.4	13.5	14	9.9	16.8	12.3	9.2	11.1	13.7
Total	**34**	**29.5**	**20.9**	**52.4**	**41.5**	**9.1**	**31.8**	**38.8**	**31.2**	**19.4**	**28.3**	**38.6**	**39.1**		**35.5**	**33.7**	**24.1**	**39.6**	**41.4**	**41.8**	**40.6**	**48.0**	**0**	**33.1**	**47.1**
Weighted average life of collections																									
Secured	3.8	7.2	6.6	5.4	7.1	N/A	5.6	5.7	8	8.2	7.1	7.2	6.5	7	6.7	6.4	5.4	8.2	6.8	7.2	7.9	6.8	N/A	N/A	4.8
Unsecured	4.4	3.5	3.4	4.8	4.5	3.1	3.2	3.6	4.5	5.2	4.6	4.7	4	4.8	4.1	4.6	4.2	4.5	4.7	4.2	4.2	4.1	N/A	N/A	3.1
Total	**5.1**	**6.6**	**5.9**	**5.4**	**6.8**	**3.1**	**5.4**	**5.5**	**7.5**	**6.4**	**6.4**	**6.9**	**6.1**	**6.8**	**6.3**	**6.1**	**5.1**	**7.8**	**6.4**	**6.9**	**7.9**	**6.6**	**N/A**	**N/A**	**4.6**
Structural features																									
Liquidity reserve (% of class A	4.5	4.5	4.5	4	3	3	4	4	4	4	4	4	5	7.5	4	4	4	5	4.05 (% of	4.9 (% of A and	5.0	4.375 (% of A	3.5	4.0	4.0
Class A Euribor cap strike	0.6%-	0	0.2%-	0.3%-	0.3% - 2.5%	N/A	0.2%-	0.4% -	0.25% -1.5%	0.5%	0.3%	0.5%-2.5%	0.3	0.1%-2.0%	0.5%-2.5%	0.5%-3.0%	0.8%-	0.5%-2.5%	0.3% -	0.3% -1.25%	0%-0.1%	0.5%-2.0%	0.5-3.0%	0.10%	0.50%
Class A																									
% of GBV	23.5	20.9	12.6	39.1	26.8	5.7	20	21.1	19.5	12.4	18.2	27.0	26.16	24.4	22.9	24.5	14.2	27	28.8	22.2	30.5	32.5	12.1	25.3	33.0
Credit enhancement	76.5	79.1	87.4	60.9	73.2	94.3	80	78.9	80.5	87.6	81.8	73.0	73.84	75.6	77.1	75.5	85.8	73	71.2	77.8	69.5	67.5	87.9	74.7	67.0
Class B																									
% of GBV	3.5	3	2.9	2.9	4	0.7	1.3	4.9	3	3	3.1	3.2	3.02	2.6	2.2	3.5	2.9	3	3	1.2	4.0	3	3.5	3.1	3.0
Credit enhancement	73	76.1	84.5	58	77.2	99.3	78.7	74	77.5	84.6	78.7	69.8	70.82	73	75	72	82.9	70	68.2	76.6	65.5	64.5	84.4	71.6	64.0
Final rating																									
Class A	BBB	BBB	BBB	BBB	BBB+	BBB+	BBB+	BBB+	BBB	BBB	BBB-	BBB	BBB-	BBB	BBB	BBB	BBB+	BBB-	BBB	A-	BBB-	BBB	BBB+	BBB	BBB-
Class B	NR	CCC	NR	NR	B-	BB	B-	NR	NR	NR	B+	B	NR	B	NR	NR	NR	B+	B	BB-	B	NR	NR	B+	B+

*the weighted average seasoning includes Scope's qualitative adjustment driven by the special servicer's superior capacity to treat unsecured loans comapared to an originator.

**This includes loans with no ongoing legal proceeding or loans where the nature of the proceeding is unknown.

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