14 January 2019

Marzio Finance S.r.I. – Series 3-2018 Italian Consumer CQS ABS

Structured Finance

SCOPE Sco Ra

Scope Ratings

Ratings

Series	Rating	Notional at issuance (EUR m)	Outstanding amount (EUR m) ¹	Current CE ² (% assets)	Coupon	Final maturity
Class A	AAA _{SF}	421.9	382.9	14.0	1mE + 0.40%	January 2043
Class J	NR	64.7 ³	64.7	0.0	Variable	January 2043
Rated notes		486.6	447.6			

Scope's analysis is based on the portfolio dated 31 July 2018, servicer reports and investor reports provided by the originator. Scope's Structured Finance Ratings constitute an opinion about 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 the SF Rating Definitions.

Transaction details

Purpose	Liquidity/funding
Issuer	Marzio Finance S.r.l.
Originator/servicer	IBL – Istituto Bancario del Lavoro S.p.A. (IBL Banca or IBL)
Back-up servicer	Zenith Service S.p.A. (Zenith)
Account bank	Citibank N.A., Milan Branch (Citibank)
Swap counterparty	Credit Agricole Corporate and Investment Bank
Closing date	24 May 2018
Payment frequency	Monthly, 28th day of each month

The transaction (Series 3-2018) is IBL Banca's third true-sale static securitisation of Italian payrolldeductible loans ('cessione del quinto dello stipendio' or CQS⁴), under the Marzio Finance S.r.I. programme. The notes are backed by a EUR 437.2m portfolio⁵ of CQS loans composed of 'cessione del quinto' (83.4%) and 'delegazione di pagamento' (16.6%) loans extended to public administration (41.2%), central state administration (13.5%), private sector employees (8.7%) and pensioners (36.6%). The portfolio is highly granular and around 83.0% of the pool has a residual life of more than eight years. All underlying loans are insured against life and employment events. Regional concentration is as follows: north (29.1%), centre (28.9%) and south (42.0%).

Rating rationale (summary)

The ratings reflect: i) the legal and financial structure of the transaction; ii) the quality of the underlying collateral; iii) the insurance against life and employment events; iv) the ability of IBL Banca (rated BBB by Scope) as originator, servicer, calculation agent, and collection account bank; v) the ability of Zenith as back-up servicer and back-up calculation agent; and vi) the counterparty exposure to Citibank, as transaction bank and paying agent, and to Credit Agricole Corporate and Investment Bank, as swap counterparty.

The ratings are mainly driven by the securitised portfolio's characteristics and expected performance and by the relatively diversified pool of insurance companies covering life or employment events. The ratings also incorporate our positive assessment of the servicer's abilities and incentives. We considered Italian sovereign risk by assessing the impact on the ratings of a distressed scenario affecting the government of Italy and the associated loss severity for the securitised assets.

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Related Research

General Structured Finance Rating Methodology

Consumer ABS Rating Methodology

Methodology for Counterparty Risk in Structured Finance

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¹ As of 29 October 2018.

² Including a EUR 11m liquidity reserve.

³ Class J funds a portion of the portfolio (EUR 53.7m) as of the closing date, but also the liquidity reserve, which is included in this figure.

⁴ In Italy, CQS is used as an abbreviation for 'cessione del quinto dello stipendio'. In the context of this transaction, we use this term to refer to 'cessione del quinto' (CDQ) loans, extended to employees or pensioners, and to 'delegazione di pagamento' (DP) loans.

⁵ All portfolio figures refer to the composition of the portfolio as of 30 September 2018.



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Series 3-2018 class A is supported by 14% of credit enhancement and benefits from the structural protection provided by sequential principal amortisation. A dedicated liquidity reserve provides liquidity and credit protection to the class A notes.

IBL Banca performs several key roles, including that of originator, servicer, calculation agent, and collection account bank. Operational risk is mitigated by the appointment of Zenith as back-up servicer and back-up calculation agent.

Rating drivers and mitigants

Positive rating drivers

Experienced originator. IBL Banca is one of the most experienced CQS loan originators in Italy. Its loans book has an above-average default and recovery performance track record.

Underlying asset type with low historical losses. CQS loans incur lower losses than standard unsecured consumer loans, primarily because they are fully insured and the instalments are withheld by the borrower's employer to be paid directly to the lender.

Diverse insurance coverage. The portfolio benefits from a well-diversified pool of over 12 insurance companies covering individual borrowers against life events and unemployment.

Liquidity and credit protection. A fully funded liquidity reserve provides liquidity protection to class A notes during the life of the transaction and can be used to repay the notes at maturity.

Interest rate swap. The class A notes pay one-month Euribor plus a margin, while the portfolio pays a fixed rate. To hedge interest rate risk, the issuer has entered into a fix-floating interest rate swap with Credit Agricole Corporate and Investment Bank.

Static portfolio. The portfolio will start amortising immediately after closing, reducing the risk of performance volatility compared to revolving transactions.

Negative rating drivers and mitigants

Exposure to public entities. A large portion of the portfolio is exposed to public entities that pay salaries or pensions to the borrowers (91.3%). These borrowers normally have lower default rates than those in the private sector. However, such a high concentration can increase vulnerability to a sovereign default. Our analysis considers this risk by incorporating a sovereign stress event.

Set-off risk via upfront loan commissions. Borrowers can claim back a portion of the fees and commissions paid upfront if they prepay their loan. A dedicated management fee reserve, equal to 25% of the total exposure, mitigates the set-off risk. As of 30 September 2018, management fees amounted to EUR 0.62m.

Commingling risk. Commingling risk is mitigated by: i) a daily sweep of collections to the issuer's account held with IBL, and subsequently, two business days before each monthly payment date, to the issuer's account held with Citibank; and ii) instructions to borrowers to redirect payments to the issuer's account in the event of servicer disruption. However, as most employers pay by bank transfer, the redirection of payments may take longer than for a standard, unsecured loan portfolio.

Upside rating-change drivers	Downside rating-change drivers	
Better-than-expected pool performance may positively impact the ratings.	A significant deterioration in the insurers' credit profile, leading to lower rating-conditional recovery rate assumptions, could negatively impact the ratings.	
A rating upgrade of Italy or reduction in the insurers' default risk could also lead to an upgrade.	A decline in the overall pool performance versus our expectations or a significant rating downgrade of Italy could also have a negative effect on the ratings.	

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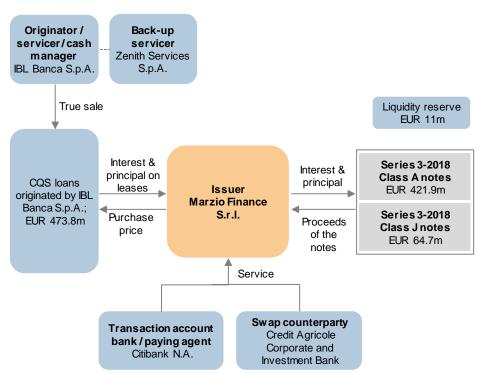
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1. Transaction summary Figure 1: Simplified transaction diagram

IBL Banca



Source: Transaction documents and Scope

Marzio Finance S.r.I. has established a EUR 10bn securitisation programme of notes backed by CQS loans. The loans were extended to borrowers in Italy and originated by IBL Banca. CQS loans are collateralised by the debtor's salary or pension and in most cases by accrued severance amounts (e.g. 'trattamento di fine rapporto' or TFR).

Several series of notes may be issued under the programme. Each series is structured as an independent transaction, with no cross-collateralisation, for the purpose of financing the purchase of a static portfolio of receivables originated by IBL Banca. The capital structure, cash reserve level and notes' interest rates may differ among the different series.

The transaction (Series 3-2018) is the third true-sale securitisation under the programme. At closing, the notes were backed by a EUR 473.8m static portfolio of CQS loans (EUR 437.2m balance as of 30 September 2018).

Originator and seller 2.

IBL Banca is the parent company of the IBL banking group, whose fully owned subsidiaries manage the services, real estate and distribution of insurance for the entire group. IBL is a specialised lender that offers personal finance loans to individuals, particularly Italian CQS loans. As of end-2017, the group was Italy's market leader for CQS, with a solid 15.2% market share and about 170,000 loans under management. IBL also offers saving and insurance products, and payment cards.

IBL's distribution model comprises 50 IBL branches, plus branches via distribution agreements with nine banking partners. The bank also has a broker network of 81 agents, promoters and intermediaries, as well as an online channel.

Series 3-2018 is IBL Banca's third issuance under the Marzio **Finance programme**

IBL Banca, market leader in Italy for CQS, with a 15.2% market share



Historically, IBL operated an originate-to-distribute model, largely due to limited financial resources. After obtaining a banking licence in 2004 and acquiring 30 Citifinancial branches, IBL started to raise funding through deposits. This gave the bank the financial firepower to transition to a more balance sheet-intensive model, reaching an asset size of around EUR 4.2m at end-2017.

2.1. Sanctioning and underwriting

The originator's credit-scoring system uses both internal and external information. All credit approval and underwriting activities are handled in-house, despite around half of new loans being originated by the broker network.

Given the nature of payroll-deductible loans, the underwriting process mainly focuses on the borrower's employer. The loan applicant must also satisfy all quantitative and qualitative requirements. Among other things, the credit department ascertains whether the employer meets certain size, legal, capital and performance requirements, using internal databases and external credit bureaus as main sources of information. The credit assessment is supported by a specialised outsourced provider which focuses on fraud risk, creditworthiness and the existence of outstanding default exposures.

Loans are ultimately disbursed upon receipt of insurance coverage confirmation and acceptance of the payment delegation by the employer or pension provider.

2.2. Servicing and recovery

In our view, IBL Banca's loan collection processes and management of non-performing loans is adequate, involving a reasonably proactive and diligent approach.

Collections management is performed entirely in Rome by a dedicated team of 13 employees. Most collections are paid via bank transfer and portfolio performance is monitored daily to check for any delinquent payments.

When a loan becomes delinquent, the credit monitoring department contacts both the borrower and his employer within 90 days via phone and email to solicit missed payments. If the contract is still delinquent after 90 days and an insurance claim has not been opened, it is sent to an external supplier for another 90 days. After 180 days, a written notice is sent to both the borrower and his employer. IBL starts legal proceedings within 30 days of such written notice unless the position has been cured by either the borrower or his employer.

In case of life or employment events, the credit monitoring department classifies the loans as 'subject to claim' as soon as it receives the death certificate (for life events) or verifies the nature of unemployment (for employment events). For the latter, IBL requests the employer to cover the residual debt (partially or in full) with the borrower's accrued severance indemnity. The remaining claim is then settled by the insurance company upon receipt, of the relevant documentation.

3. Asset analysis

The securitised portfolio is a granular pool of CQS loans granted to individuals in Italy who work in either the public or private sector or who are pensioners. A sub-pool of the portfolio is composed of 'delegazione di pagamento' (DP) loans, which are also payroll-deductible but have slightly different characteristics to 'cessione del quinto' (CDQ) loans, as explained below.

3.1. Payroll-deductible loans: CDQ and DP loans

Payroll-deductible loans offer additional protection and differ from standard consumer loans in two key respects: i) monthly instalments are paid directly to the lender by the employer or pension provider, after being deducted from the obligor's monthly salary or



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pension; and ii) every loan is insured for job-loss and life-event risks. CQS portfolios are exposed directly to employers, pension providers and insurance companies. We have considered these risks in our analysis.

3.1.1. CDQ loans

Loan instalments cannot exceed 20% of the borrower's total net salary or pension and they are deducted directly from the salary or pension by the employer or pension provider. For employees, the loans are also generally collateralised by a pledge on the debtor's accrued TFR. CDQ loans typically have an original term of 10 years, they pay a fixed rate and cannot be refinanced until two-fifths of the loan has been repaid.

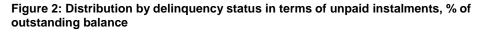
3.1.2. DP loans

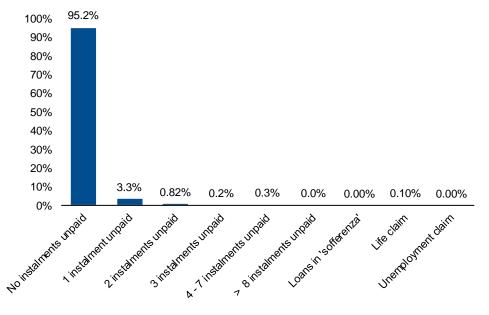
DP loans are typically granted to borrowers that already have an outstanding CDQ loan. The addition of a DP loan can entail a monthly instalment of up to 50% of the borrower's net income. DP loans are subordinated to CDQ loans, but this risk is partly mitigated by the originator's familiarity with the existing borrower before the DP loan is authorised.

For more detail on CQS loans, download our Consumer ABS Rating Methodology.

3.2. Securitised assets

The EUR 437.2m portfolio as of 30 September 2018 (the current portfolio) was composed of CDQ (83.4%) and DP (16.6%) loans extended to public administration (41.2%), central state administration (13.5%), private sector employees (8.7%), and pensioners (36.6%). Around 1.3% of the current portfolio balance has more than two instalments in arrears.





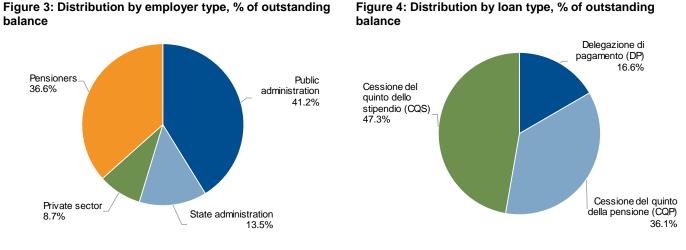
Portfolio seasoning is low

Source: IBL Banca, Scope

The current portfolio has around 12 months of weighted average seasoning and a weighted average remaining term to maturity of 8.3 years. The loans in the portfolio were originated between 2010 and 2017, with 84.7% originated in 2017. Around 83.1% of the portfolio has a maturity date greater than eight years. The maturity date can be extended if payments are suspended due to salary or pension reductions or temporary leave (e.g. maternity leave). Any suspended payments will be moved to the end of the original amortisation plan.



All loans in the pool are amortising and pay monthly instalments at a weighted average fixed rate of 6.0%. Eligibility criteria exclude loans with an interest rate below 3.5%.



Source: IBL Banca, Scope

Source: IBL Banca, Scope

The pool is highly granular with top one and top 10 borrowers accounting for 0.02% and 0.19%, respectively. Borrowers receiving state salaries or pensions comprise 91.3% of the initial portfolio. Excluding pensioners and state employees, the top one and top 10 employers account for 2.0% and 10.9% of total exposure, respectively.

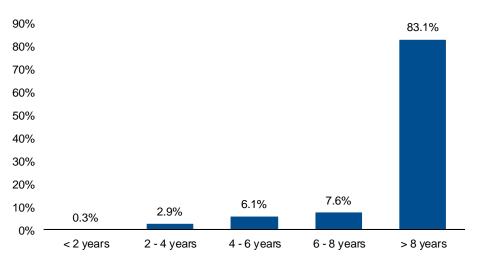


Figure 5: Distribution by maturity date, % of the outstanding balance

Source: IBL Banca, Scope

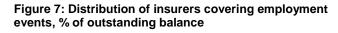
3.2.1. Insurance coverage

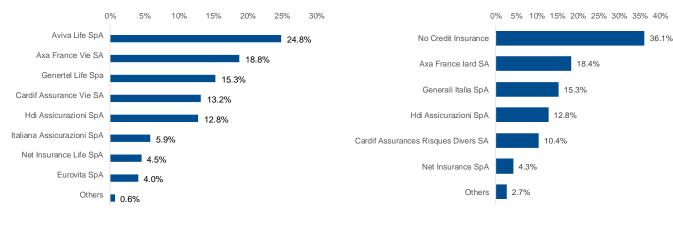
All underlying loans extended to public and private sector employees are insured against life and employment events, while loans to pensioners are insured only against life events. Insurance coverage on the pool is well diversified, with an inverse-Herfindahl score of 5.7. Aviva Life S.p.A. insures most of the life events (24.8%), while Axa France lard SA covers most of the employment events (18.4%). We analysed the effect of a deterioration in the insurance companies' credit quality and take comfort in their credit quality and diversity.

Well-diversified pool of insurance companies

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Figure 6: Distribution of insurers covering life events, % of outstanding balance

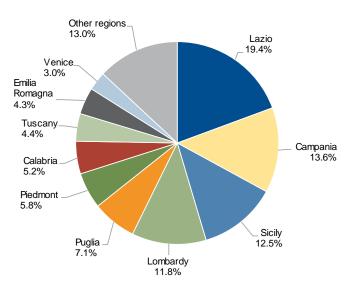




Source: IBL Banca, Scope

The current portfolio is mainly concentrated in southern Italy (42.0%), which is a common feature for Italian CQS portfolios. Borrowers in northern and central regions account for 28.9% and 29.1% of the outstanding portfolio, respectively.

Figure 8: Distribution by region, % of outstanding balance



Source: IBL Banca, Scope

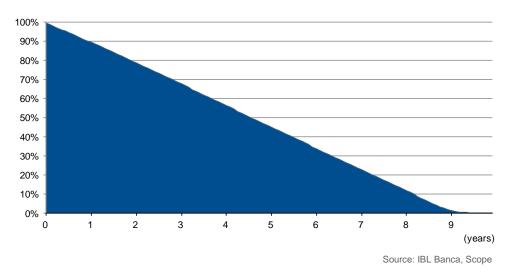


Amortisation profile may be extended if payments are suspended

3.3. Amortisation profile

We projected the amortisation profile of the underlying assets, assuming a 0% prepayment and default rate. The results are shown in Figure 9 below.

Figure 9: Projected portfolio amortisation profile



3.4. Portfolio assumptions

We derived default rate and recovery rate assumptions based on 2008-18 vintage data on IBL Banca's loan book, which is representative of the securitised portfolio and segmented by default type (delinquency, life event, employment event) and by employer type (public administration, state administration, private sector and pensioners). These details are shown in Appendix II.

Vintage data includes two periods of severe recession in Italy: 2008-09 and 2012-14. Therefore, no long-term adjustment was applied to the mean default rate or coefficient of variation derived from the vintage analysis.

Historical data does not reflect sovereign crisis scenarios, which, while rare, could prove highly severe. We incorporated sovereign risk as explained below in section 7.

Figure 10: Portfolio assumptions

	Portfolio	
Mean default rate	7.0%	
Coefficient of variation	40.0%	
Base case recovery rate	76.5%	
AAA rating-conditional recovery rate	54.4%	
Recovery timing	50% after one year, 20% after two years, 20% after three years and 10% after four years	
Low constant prepayment rate	0.0%	
High constant prepayment rate	5.0%, for the first three years 10.0%, thereafter	
Portfolio's weighted average yield	5.2%	

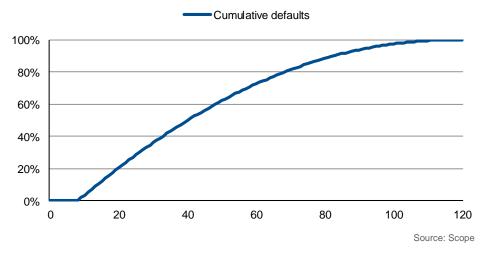
IBL Banca vintage data covers periods of severe recession in Italy



3.4.1. Portfolio defaults

We assumed an inverse Gaussian default distribution, with a mean default rate of 7.0% and a coefficient of variation of 40%. In the transaction, a default occurs if either: i) a loan is eight months delinquent; ii) a loan is declared defaulted by the servicer ('in sofferenza'); iii) a life event occurs; or iv) an employment event occurs. Our analysis assumes a simplified default definition of eight months in arrears and a front-loaded default term structure. The cumulative default-timing assumptions are shown in Figure 11 and represent the assumed default timing for the pool.

Figure 11: Cumulative default-timing assumption



3.4.2. Loan recovery rate analysis

We calculated rating-conditional recovery rate assumptions as the weighted average of two recovery rate levels. We assumed an 80% recovery rate in a scenario where the insurance does not default (RR1) and a 20% recovery rate in the event of insurance default (RR2). The weights applied to RR1 and RR2 reflect the default probability of the pool of insurance companies, assuming a 20% asset correlation between insurers. For the class A notes specifically, we applied a rating-conditional haircut to RR2 of 40%.

Figure 12: Rating-conditional recovery rate assumptions

76.5% 76.4% 72.5% 63.7% 60.7% 54.4%	В	BB	BBB	А	AA	AAA
	76.5%	76.4%	72.5%	63.7%	60.7%	54.4%

Source: Scope

Further details on how we calculate rating-conditional recovery rates in CQS transactions can be found in the Consumer ABS Rating Methodology.

Recoveries come from a combination of three sources: insurance pay-outs, the pledged TFR amount, and borrower collections. Figure 13 below shows the proportion of IBL Banca's historical recoveries on defaulted loans from these three sources. The 80% RR1 calculation is derived from the vintage data, which incorporates all three recovery sources, while the 20% RR2 calculation represents expected recoveries in the absence of insurers and ultimately reflects the borrower's credit quality.

Figure 13: Sources of CQS recoveries (last five years on average)

Insurance	TFR	Borrower
67.0%	7.4%	25.6%

Source: IBL Banca, Scope

We assumed a front-loaded default term structure

We give credit to recoveries from insurance pay-outs and other sources



Additionally, the recovery vintage data shows that most recoveries are received in the first four years after default. Therefore, the portfolio recovery timing, derived from the corresponding recovery vintage data, was estimated as follows: 50% after one year, 20% after two years, 20% after three years and the remaining 10% after four years.

3.4.3. Constant prepayment rate (CPR)

We tested two CPR scenarios to test the structure's reliance on excess spread: CPR assumptions of i) 0%; and II) 5% for the first three years and 10% thereafter.

3.4.4. Excess spread

Excess spread will be available to cure undercollateralisation arising from portfolio defaults. Excess spread will also be trapped under certain trigger conditions (see Figure 14).

Available excess spread will depend on several factors, such as senior fees, the default rate, and the prepayment rate. Our analysis assumes a stressed weighted average yield of 5.2% on the portfolio, which also assumes that 25% of the loans with the highest yield will either default or prepay. This resulted in a portfolio yield compression of 0.80% on the 6.0% original weighted average interest rate of the receivables.

Excess spread is estimated at 3.7%, after deducting liability costs and stressed annual fees of 1.0%.

4. Financial structure

4.1. Capital structure

Issuance proceeds from the class A notes and part of the class J proceeds were used to purchase the portfolio of receivables. The class J notes funded a portion of the assets as well as the liquidity reserve. The structure is fully sequential.

4.2. Priority of payments

The structure features a single priority of payments under which principal collections from the assets can be used to cover any interest shortfall on the notes, mitigating the risk of a missed interest payment. Figure 14 below details the transaction's pre-enforcement priority of payments.

If the cumulative portfolio net default ratio exceeds 3% of the initial outstanding balance on any payment date, remaining cash is trapped at item 6 in the simplified preenforcement priority of payments (see Figure 14 below). Those funds would then be available in the next payment period to cover any shortfall on items 1-5.

Figure 14: Simplified priority of payments and available funds

Pre-enforcement priority of payments

Available funds

Collections and recoveries from receivables, the management fee prepayment amount and the liquidity reserve

- Taxes and expenses (ordinary and extraordinary, including servicer fee, even if this has been replaced)
- 2) Class A interest
- 3) Replenish the liquidity reserve to the required balance
- 4) Class A principal up to the target redemption amount
- 5) Adjustment of purchase price and indemnity due and payable to the originator
- 6) Cash-trapping (if the cash-trapping condition is satisfied)
- 7) Remuneration on class J
- 8) Class J principal (if class A is redeemed in full) up to the target redemption amount
- 9) Additional remuneration on class J

Source: Transaction documents and Scope

The transaction benefits from a

3.7% estimated excess spread

Combined priority of payments is the main protection against payment interruption



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Fully funded reserves provide 2.6% of credit enhancement

4.3. Liquidity reserve

At closing, the liquidity reserve is fully funded with part of the class J issuance proceeds, equating to 2.6% of the rated notes' initial balance (EUR 11.0m).

During the life of the transaction, the liquidity reserve will amortise to the higher of: i) 5.2% of the principal outstanding for the rated notes; and ii) 1.3% of the initial principal outstanding for the rated notes.

The liquidity reserve will provide liquidity protection to the class A notes during the life of the transaction and can be used to repay the notes' principal at maturity. As of 29 October 2018, the liquidity reserve can cover costs and interest on the class A for more than 20 monthly payment dates.

4.4. Management fee reserve

Prepaying a loan allows the borrower to set off upfront management fees, resulting in a reduction of outstanding instalments. The management fee reserve was funded at closing to specifically cover this set-off risk, by covering a portion of fees paid upfront by the borrower. In addition, the originator will cover any shortfall should the reserve be insufficient.

The management fee reserve is targeted at 25% of outstanding management fees at each payment date. The reserve's amortised portion will be repaid at each payment date to the originator, outside the priority of payments. As of 30 September 2018, the management fee reserve amounted to EUR 0.15m.

4.5. Amortisation and provisioning

The strictly sequential amortisation protects senior noteholders in times of stress. Specifically, the cash-trapping mechanism (item 6 in the simplified pre-enforcement waterfall above) accelerates class A amortisation in such periods.

The transaction structure benefits from an implicit principal-deficiency ledger mechanism, since the notes amortise up to a target redemption amount. This amount is defined on each payment date as the difference between the notes' outstanding amount and the outstanding performing collateral portfolio (reduced by the amounts of the liquidity and additional reserves). As a consequence, excess spread will cover defaults rather than being distributed as additional remuneration to junior noteholders.

We believe the cash-trapping mechanism provides limited support in high-default scenarios, as higher-ranking items in the priority of payments will already have exhausted excess cash in such instances.

4.6. Matched interest rates

Class A notes pay one-month Euribor plus a margin, while the portfolio pays a fixed rate. To hedge interest rate risk, the issuer has entered into a fix-floating interest rate swap with Credit Agricole Corporate and Investment Bank. Under the terms of the swap, the issuer will pay a fixed rate of 0.50%, while the swap counterparty will pay a coupon of one-month Euribor plus 0.40% (with a floor at zero). The notional of the swap will be the lower of the class A outstanding balance and the portfolio's outstanding balance.

5. Quantitative analysis

Our cash flow analysis considered the portfolio's characteristics and the transaction's main structural features. We applied our large homogenous portfolio approximation approach when analysing the granular collateral pool and projecting cash flows over the amortisation period. The cash flow analysis considers an inverse Gaussian default distribution to calculate each rated tranche's expected loss and expected weighted average life.

Reserve limits exposure to management fee set-off risk

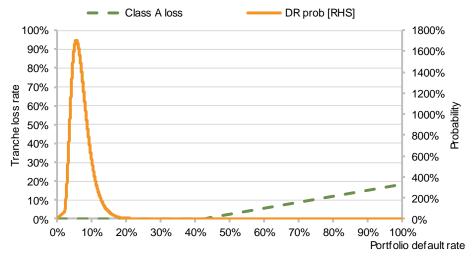
Hedging of interest rate risk

We used a bespoke cash flow analysis



Figure 15 shows the losses of the rated notes at all portfolio default rates. The chart shows how credit enhancement, recovery proceeds, and excess spread protect the notes in the event of default. The results in Figure 15 consider a 0.80% reduction in the portfolio balance to account for commingling risk.

Figure 15: Cash flow results for base case mean default rate, coefficient of variation and rating case recovery rate



Note: The probabilities displayed on the right-hand side axis must be considered in the context of the calculation of the probability density. Source: Scope

6. Rating sensitivity

We tested the resilience of the rating against deviations in the main input parameters: the portfolio mean default rate and the portfolio recovery rate. This analysis has the sole purpose of illustrating the sensitivity of the rating to input assumptions and is not indicative of expected or likely scenarios.

The following shows how the results for each rated instrument change compared to the assigned rating when the portfolio's expected mean default rate is increased by 50% or the portfolio's expected recovery rate is reduced by 50%, respectively:

Class A notes, rated AAA_{SF}: sensitivity to probability of default, zero notches; sensitivity to recovery rates, zero notches.

7. Sovereign risk

CQS obligors are less likely to meet loan instalments if their salary or pensions are not paid. The obligor employer's credit quality is therefore a major source of credit risk. Around 91.3% of the portfolio relates to the public sector, exposing the transaction to sovereign risk as these borrowers' salaries or pensions may be affected should the sovereign default. A sovereign default could also trigger a significant restructuring of the public administration. Rather than mechanistically limiting the maximum ratings on the notes, we assess the potential rating impact of a distressed scenario affecting the Italian government.

Given the relevance of the exposure to public employees and pensioners, Scope's analysis quantified the impact of Italian sovereign risk by assessing the likelihood and severity of a distress scenario (CQS stress scenario) affecting the government of Italy. This approach allows Scope to reflect the benefits of each transaction's liability structure and discriminate between them, rather than applying a mechanistic cap to the assigned ratings based on Italy's sovereign rating.

Sovereign risk does not limit the transaction's ratings



Scope's analysis assumed the likelihood of a CQS stress scenario event (a significant increase in portfolio defaults and delinquencies compared to the agency's base case assumption) occurring to be equivalent to an A risk, i.e. two notches higher than Scope's current rating on Italy. This scenario captures the potential effect on the transaction of a government default on its public debt. The probability assigned to this scenario reflects Scope's view that a sovereign default would not necessarily trigger the permanent suspension of payments to the entire population of civil servants or pensioners in Italy, or a general dismissal of civil servants, because the state will need to maintain a minimum level of key operations. For more insight into our fundamental analysis of the Italian economy, refer to our press release on the Republic of Italy, dated 7 December 2018.

We considered the following risks under the sovereign CQS stress:

- Liquidity risk. A suspension or reduction of salary and pension payments may create a spike in arrears and thus a liquidity shortfall for the transaction. However, additional losses are generally not incurred because the loan's maturity is extended in this instance – unpaid instalments become due and payable as of the original loan's maturity date until the debt is fully extinguished⁶. When analysing the transaction, we assumed that 50% of the public sector portfolio was fully suspended (i.e. no interest or principal was paid on these loans) for two years.
- 2. Credit risk. A restructuring of the public administration may lead to job losses and, therefore, asset defaults for the securitisation. However, only some parts of the public administration may be affected, as vital functions such as tax collection and law enforcement would not be completely abolished. When analysing the transaction, we assumed that 25% of the public-sector portfolio would default as a consequence of job losses.

8. Counterparty risk

The transaction is exposed to counterparty risk from: i) IBL Banca, as originator, servicer, cash manager and calculation agent; ii) Zenith, as back-up servicer and back-up calculation agent; iii) Citibank, as transaction account bank and paying agent; and iv) Credit Agricole Corporate and Investment Bank, Paris Branch, as swap counterparty.

Counterparty risk for the transaction supports the highest ratings. We do not consider any of the counterparty exposures to be excessive, i.e. if counterparty risk crystallises, a downgrade is still limited to six notches.

8.1. Operational risk from servicer

Operational risk from the servicer, IBL Banca, is well mitigated in this transaction. Zenith, back-up servicer since closing, has undertaken to become operational within 30 days in the event of a termination event for IBL.

8.2. Commingling risk from account bank

The issuer has a collection account held with IBL Banca that receives all asset proceeds and a payment account held with Citibank. Two business days before each monthly payment date, the amounts in the collection account are transferred to Citibank.

Commingling risk is mitigated by: i) daily sweeps to the issuer's collection account held with the servicer and monthly sweeps to the issuer's payment account held with Citibank; and ii) instructions to debtors to pay directly into the issuer's account at the transaction account bank upon the occurrence of a servicer disruption event. However, employers may not immediately implement the new payment instructions. We have therefore

Back-up servicer appointed since closing

Commingling risk driven by employers' responsiveness to new payment instructions

⁶ If the maturity of the loans is extended beyond the final maturity of the notes, suspensions or reductions of salary and pension payments will effectively generate a loss for the transaction. The final legal maturity date is set 15 years after the loan with the longest maturity date in order to mitigate this risk.



assumed a loss of up to four months of collections. We sized a 0.8% loss based on the probability of a commingling event over the expected life of the transaction. However, given our rating on IBL (BBB), we take comfort from the low probability of a servicer insolvency event happening.

8.3. Set-off risk from originator

Set-off risk is well mitigated in this transaction. The originator is a deposit-taking financial institution, but it has represented that, as of closing, none of the borrowers has a deposit account with IBL Banca.

9. Legal structure

9.1. Legal framework

This securitisation is governed by Italian law and represents the true sale of assets to a bankruptcy-remote vehicle, which is essentially governed by the terms in the transaction documentation.

9.2. Clawback

The originator has provided: i) a 'good standing' certificate from the Chamber of Commerce; ii) a solvency certificate signed by a representative duly authorised; and iii) a certificate from the bankruptcy court (tribunale civile – sezione fallimentare) confirming that the originator is not subject to any insolvency or similar proceedings.

This mitigates claw-back risk, as the issuer can prove it was unaware of the issuer'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 the receivables' sale price exceeds their value by more than 25% and the issuer cannot demonstrate 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 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.

Clawback risk related to repurchased receivables is mitigated by a maximum amount of 5% of the portfolio on a cumulative basis. Upon the repurchase of single loans, the originator is also required to provide a solvency certificate to the issuer. However, in our view an insolvency of IBL (rated BBB) is unlikely.

9.3. Use of legal and tax opinions

We reviewed the legal opinions produced for the issuer. These provide comfort on the issuer's legal structure and supports our general legal analytical assumptions.

The tax opinion produced for the issuer indicate that the transaction is tax-neutral, i.e. no taxes apply, except for VAT on contracted services, which the issuer covers.

10. Monitoring

We will monitor this transaction on the basis of the performance reports from the servicer and the calculation agent, as well as other available information. The ratings will be monitored on an ongoing basis.

We believe set-off risk from the originator is well mitigated

Clawback risk is mitigated

Tax efficient set-up; bankruptcy remote SPV



Scope analysts are available to discuss all the details surrounding the rating analysis

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

11. Applied methodology and data adequacy

For the analysis of this transaction we applied our General Structured Finance Rating Methodology, Consumer ABS Rating Methodology and Methodology for Counterparty Risk in Structured Finance, all available on our website, www.scoperatings.com.

IBL Banca provided us with default and recovery data, segmented by quarterly vintage of origination, by default type (delinquency, life event, employment event) and by employer type (public administration, state administration, private sector and pensioners). The default rate data covers a period from 2008 to 2018 and is generally very granular. The recovery data also covers a period from 2008 to 2018, referring to all recoveries during that period. We also received data regarding the proportion of recoveries from different sources: insurance payments, recoveries from borrowers and recoveries from the pledged TFR.



Italian Consumer CQS ABS

I. Deal comparison

	Marzio Finance 4-2018	Marzio Finance 3-2018	Marzio Finance 2-2018	Marzio Finance 1-2017	Dyret
Country	Italy	Italy	Italy	Italy	Italy
Closing date (dd/mm/yyyy)	21/11/2018	28/05/2018	29/01/2018	28/09/2017	09/03/2018
Originator	IBL Banca S.p.A.	IBL Banca S.p.A.	IBL Banca S.p.A.	IBL Banca S.p.A.	Dynamica Retail S.p.A.
Servicer	IBL Servicing S.p.A.	IBL Banca S.p.A.	IBL Banca S.p.A.	IBL Banca S.p.A.	Dynamica Retail S.p.A.
Back-up servicer Back-up servicer facilitator	Zenith Service S.p.A.	Zenith Service S.p.A.	Zenith Service S.p.A.	Zenith Service S.p.A.	Zenith Service S.p.A. Zenith Service S.p.A.
Portfolio characteristics	-	-	-	-	Zemin Gervice G.p.A.
Number of loans	19,397	22,952	13,145	19,884	8,392
Number of borrowers	18,687				8,392
Original portfolio balance (€)	389,163,840	487,141,290	334,298,977	429,475,538	194,603,643
Outstanding portfolio balance (€)	376,770,538	437,201,060	157,872,473	361,374,376	160,348,393
Average original loan balance (€) Average outstanding loan balance (€)	20,063 19,424	21,224 19,048	25,432 12,010	21,599 18,174	23,189 19,107
Length of contracts	13,424	13,040	12,010	10,174	13,107
WA original term (years)	9.2	9.3	9.7	9.4	9.6
WA seasoning (years)	0.3	1.0	4.4	1.6	1.8
WA remaining term (years)	8.9	8.3	5.3	7.8	7.8
Contract type	00.0%	00.40/	77.70/	00.00/	04.49/
CDQ - Cessione del quinto (%) DP - Delegazione di pagamento (%)	82.3% 17.7%	83.4% 16.6%	77.7% 22.3%	83.3% 16.7%	81.4% 18.6%
Portfolio yield	17.778	10.0 %	22.370	10.7 %	18.076
WA portfolio yield (%)	6.2%	6.0%	6.4%	5.9%	4.0%
Type of debtors					
Public sector employees (%)	36.6%	41.2%	39.1%	38.8%	54.8%
State employees (%)	12.8%	13.5%	16.7%	15.3%	-
Private sector employees (%)	13.7%	8.7%	2.8%	6.8%	9.9%
Pensioners (%) Borrower concentration	36.9%	36.6%	41.4%	39.1%	35.3%
Top 1 (%)	0.03%	0.02%	0.04%	0.03%	-
Top 10 (%)	0.23%	0.19%	0.30%	0.21%	-
Employer concentration					
Top 1 (%)	1.4%*	2.0%*	2.0%*	2.0%*	34.3%
Top 10 (%)	4.7%*	10.9%*	7.2%*	6.5%*	54.7%
Public sector exposure (%)	86.3%	91.3%	97.2%	93.2%	90.1%
Employer regional concentration	30.2%	29.1%	27.9%	25.7%	16.4%
Centre	28.4%	28.9%	31.3%	31.0%	21.8%
South	41.4%	42.0%	40.8%	43.3%	61.8%
Top region	Lazio - 18.9%	Lazio - 19.4%	Lazio - 21.5%	Lazio - 20.4%	Campania - 27.3%
Insurance company exposure					
Top 1 life insurance	27.0%	24.8%	25.2%	21.8%	21.8%
Top 2 life insurance Top 3 life insurance	45.1% 61.7%	43.6% 58.9%	47.2% 66.2%	43.1% 59.4%	42.0% 58.6%
Top 1 unemployment insurance	16.5%	18.4%	25.2%	20.5%	21.8%
		10.470			21.070
		33.6%	44.6%	36.8%	42.0%
Top 2 unemployment insurance Top 3 unemployment insurance	28.5% 39.9%	33.6% 46.4%	44.6% 54.0%	36.8% 48.1%	42.0% 58.6%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary	28.5%				
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition	28.5% 39.9% 8 months	46.4% 8 months	54.0% 8 months	48.1% 8 months	58.6% 9 months
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default	28.5% 39.9% 8 months 7.5%	46.4% 8 months 7.0%	54.0% 8 months 5.0%	48.1% 8 months 6.0%	58.6% 9 months 10.5%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation	28.5% 39.9% 8 months 7.5% 40%	46.4% 8 months 7.0% 40%	54.0% 8 months 5.0% 45%	48.1% 8 months 6.0% 45%	58.6% 9 months 10.5% 35.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage)	28.5% 39.9% 8 months 7.5%	46.4% 8 months 7.0%	54.0% 8 months 5.0%	48.1% 8 months 6.0%	58.6% 9 months 10.5%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation	28.5% 39.9% 8 months 7.5% 40% 80.0%	46.4% 8 months 7.0% 40% 80.0%	54.0% 8 months 5.0% 45% 80.0%	48.1% 8 months 6.0% 45% 80.0%	58.6% 9 months 10.5% 35.0% 80.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% +	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% +	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% +	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20%	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% +
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate Recovery timing	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%)	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%)	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%)	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 10%)	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%)
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% +	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% +	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% +	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20%	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% +
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate Recovery timing	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0%	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0%	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0%	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0%	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' correlation	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.0% 6.0 20%	46.4% 8 months 7.0% 40% 80.0% 20.9% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20%	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20%	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20%	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%)	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3%	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3%	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2%	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2%	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) AAA scenario recovery rate Recovery trate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%) Private sector exposure (%)	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.0% 6.0 20%	46.4% 8 months 7.0% 40% 80.0% 20.9% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20%	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20%	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20%	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) AAs scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' correlation Public sector exposure (%) Private sector exposure (%) Structural features	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3%	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3%	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2%	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2%	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (in insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%) Private sector exposure (%) Structural features Tranching	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3%	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3%	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2%	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2%	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) AAs scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' correlation Public sector exposure (%) Private sector exposure (%) Structural features	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7%	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7%	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8%	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8%	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%) Structural features Tranching Class A Class B	28.5% 39.9% 8 months 7.5% 40% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A+	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate Recovery tait (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%) Structural features Tranching Class A Class B CE Class B	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A+ 7.0%	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs-(50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (insurance coverage) AAA scenario recovery rate Recovery taite (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herlindahl metric Insurers' correlation Public sector exposure (%) Structural features Tranching Class A CE Class B Class B Class C	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A+ 7.0% N/A	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A N/A N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A N/A N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3% BB
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) AAA scenario recovery rate Recovery trate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%) Private sector exposure (%) Structural features Tranching Class A CE Class A Class B Class C Class C	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A+ 7.0% N/A N/A	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A N/A N/A N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% 4.3 18.0% N/A 18.0% N/A N/A N/A N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A N/A N/A N/A N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' inverse-Herfindahl metric Insurers' inverse-Herfindahl metric Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%) Structural features Tranching Class A Class B CE class B Class C Class J	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A+ 7.0% N/A N/A N/A NR	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% 4 AAA 14.0% N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% 4.3 18.0% N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7% NR
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (insurance coverage) AAA scenario recovery rate Recovery tait (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%) Structural features Tranching Class A Class B CE Class A Class C Class J CE class J	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A+ 7.0% N/A N/A	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A N/A N/A N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% 4.3 18.0% N/A 18.0% N/A N/A N/A N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A N/A N/A N/A N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' inverse-Herfindahl metric Insurers' inverse-Herfindahl metric Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%) Structural features Tranching Class A Class B CE class B Class C Class J	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A++ 7.0% N/A N/A N/A N/A 0.0%	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7% NR 0.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (insurance coverage) AAA scenario recovery rate Recovery taite (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' correlation Public sector exposure (%) Structural features Tranching Class A CE Class A Class B Class C CE class J CE class J CE class J	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% AAA 21.0% A+ 7.0% N/A N/A N/A N/A N/A N/A N/A 0.0% 2.6%	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A AA 9.0% N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7% NR 0.0% 2.0%
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (no insurance coverage) AAA scenario recovery rate Recovery tate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' correlation Public sector exposure (%) Structural features Tranching Class A CE Class A Class B Class C Class J CE Class J Cash reserve (% of rated notes) Revolving period (years) Commingling risk mitigants	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A+ 7.0% N/A N/A N/A N/A N/A N/A N/A N/A	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7% NR 0.0% 2.0% 0.75 Yes Daily sweeps
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (insurance coverage) AAA scenario recovery rate Recovery tate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herlindahl metric Insurers' inverse-Herlindahl metric Insurers' inverse-Herlindahl metric Insurers' correlation Public sector exposure (%) Structural features Tranching Class A CE Class B Class B Class C Class J Cash reserve (% of rated notes) Revolving period (years) Commingling risk mitigants	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA 21.0% AAA NIR 0.0% 0.0% 2.6% 0 Yes - Notification to borrowers to redirect payments into the issuer	46.4% 8 months 7.0% 40% 20.0% 20.0% 54.4% 4 yrs - (50% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7% NR 0.0% 2.0% 0.75 Yes Daily sweeps Yes
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (insurance coverage) AAA scenario recovery rate Recovery tait (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herfindahl metric Insurers' actor exposure (%) Structural features Tranching Class A Class B Class C Class C Class J CE class J CE class J Cash reserve (% of rated notes) Revolving period (years) <td>28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A+ 7.0% N/A N/A N/A N/A N/A N/A N/A N/A</td> <td>46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A N/A N/A N/A N/A N/A N/A N/A N/A N/A</td> <td>54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A N/A N/A N/A N/A N/A N/A N/A N/A N/A</td> <td>48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A N/A N/A N/A N/A N/A N/A N/A N/A N/A</td> <td>58.6% 9 months 10.5% 35.0% 80.0% 20.0% 4 yrs - (50% + 20% + 20% + 20% + 10%)) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7% NR 0.0% 2.0% 0.75 Yes Daily sweeps Ves Prepayment reserve - 1.3% of</td>	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% A+ 7.0% N/A N/A N/A N/A N/A N/A N/A N/A	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 20% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 4 yrs - (50% + 20% + 20% + 20% + 10%)) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7% NR 0.0% 2.0% 0.75 Yes Daily sweeps Ves Prepayment reserve - 1.3% of
Top 2 unemployment insurance Top 3 unemployment insurance Assumptions summary Default definition Mean default Coefficient of variation Recovery rate (insurance coverage) Recovery rate (insurance coverage) AAA scenario recovery rate Recovery tate (no insurance coverage) AAA scenario recovery rate Recovery timing Prepayment rate Portfolio yield Insurers' inverse-Herlindahl metric Insurers' inverse-Herlindahl metric Insurers' inverse-Herlindahl metric Insurers' correlation Public sector exposure (%) Structural features Tranching Class A CE Class B Class B Class C Class J Cash reserve (% of rated notes) Revolving period (years) Commingling risk mitigants	28.5% 39.9% 8 months 7.5% 40% 80.0% 20.0% 52.8% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.3% 6.0 20% 86.3% 13.7% AAA 21.0% AAA 21.0% AAA 21.0% N/A N/A N/A N/A N/A N/A N/A N/A	46.4% 8 months 7.0% 40% 80.0% 20.0% 54.4% 4 yrs - (50% + 20% + 10%) 5.0% 5.2% 5.7 20% 91.3% 8.7% AAA 14.0% N/A	54.0% 8 months 5.0% 45% 80.0% 20.0% 30.2% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.8% 4.3 20% 97.2% 2.8% AAA 18.0% N/A	48.1% 8 months 6.0% 45% 80.0% 20.0% 55.6% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 5.1% 5.1 20% 93.2% 6.8% AAA 9.0% N/A	58.6% 9 months 10.5% 35.0% 80.0% 20.0% 42.9% 4 yrs - (50% + 20% + 20% + 10%) 5.0% 3.8% 5.9 20.0% 85.0% 15.0% NR 20.5% BBB+ 10.3% BB 4.7% NR 0.0% 2.0% 0.75 Yes Daily sweeps Yes

*INPS (Istituto Nazionale della Previdenza) and Italian Ministry of Finance are excluded from this figure.



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II. Vintage data provided by originator

IBL Banca provided default and recovery performance data for the pool. We used this information in our analysis as a foundation for the calibration of point-in-time default rates, the coefficient of variation and base case recovery rates.

Vintage data is granular and representative of the portfolio.

Figure 16: Public administration – default and recovery data

Defaults

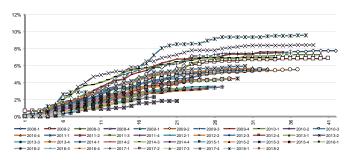


Figure 17: State administration – default and recovery data

Defaults

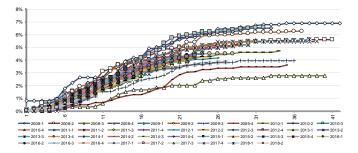


Figure 18: Private sector – default and recovery data

Defaults

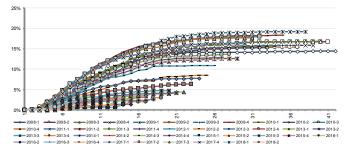
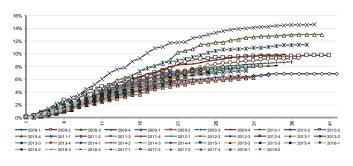
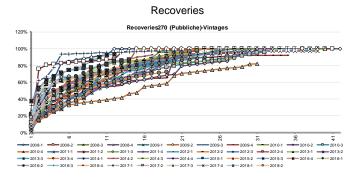


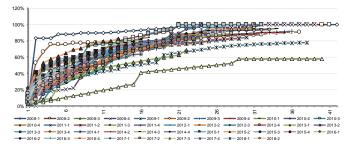
Figure 19: Pensioners - default and recovery data

Defaults

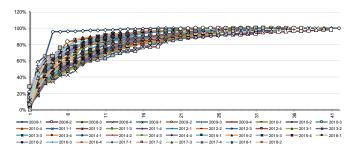




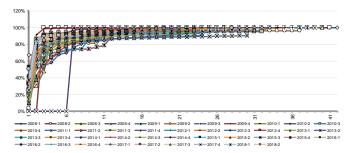














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