

## Investor protection

# Enhancing transparency of EU securitisations

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The EU Securitisation Regulation includes a number of due diligence and monitoring requirements for investors. ESMA is tasked with developing draft transparency technical standards that will assist investors in fulfilling these obligations, in line with its investor protection mandate. At the same time, securitisation capital requirements are also changing, with important implications for the types of transactions to be observed in the future. This article uses a loan-level and tranche-level dataset of 646 securitisations to simulate the securitisation features that can arise when originators seek to use securitisation as part of their capital management exercises. The draft ESMA disclosure templates can assist investors in fulfilling their due diligence and monitoring tasks to better understand the risks and aspects of these instruments.

After several years of development, the Securitisation Regulation – a key pillar of the Capital Markets Union – will enter into force on 1 January 2019. The Regulation includes a number of due diligence and monitoring requirements for actual and potential securitisation investors. In addition, it establishes a set of transparency obligations for originators, sponsors, and Securitisation Special Purpose Entities (SSPE).

As part of these provisions, ESMA has been mandated to develop draft technical standards specifying both the content and format of securitisation disclosures. These technical standards aim to cover all salient features of securitisations deemed capable of standardisation, while limiting the reporting burdens for originators, sponsors and SSPEs. In line with its investor protection mandate, ESMA considers that the draft technical standards will allow potential investors to form an independent opinion on whether a securitisation is in line with their risk appetite, while also helping investors to monitor the performance of their investments.

Coupled with the parallel amendments to securitisation capital requirements in the Capital Requirements Regulation (CRR), the wide-ranging provisions of the Securitisation Regulation are likely to significantly alter originator and sponsor incentives to issue new securitisations or, alternatively, to sell off retained tranches of existing securitisations, all else being equal.

This article provides simulations of the features of securitisations that are likely to be selected by issuers, via the less-explored perspective of managing capital requirements through securitisation. At a high level, an originating bank may choose to securitise assets for two reasons: obtaining funding for illiquid assets and/or reducing its capital requirements. In recent years, the funding channel has been the most important driver of securitisation issuance, as stressful market conditions have steered securitisation originators (chiefly banks) towards additional, secured forms of financing. At the same time, lengthy regulatory uncertainty over the capital treatment of securitisations also made it challenging for originators to consider securitisations as viable avenues for their capital management exercises. Finalisation of the Securitisation Regulation and amendments to the CRR both reduce this uncertainty, raising the possibility, relative to the past few years, of greater use of securitisation by originators to manage their capital positions. By doing so, originators may transfer exposures to their underlying assets to other investors in EU financial markets; to the extent that such securitisations are high-quality, this may be in line with the objectives of the Securitisation Regulation to help re-start high-quality EU securitisation markets and support a Capital Markets Union. ESMA plans to follow market developments closely in this regard, in line with

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its investor protection and financial stability mandates.

As discussed in this article, managing capital via securitisation relies upon a delicate combination of specific underlying exposures with precise securitisation features, and this combination will be altered as capital requirements formulae and calibrations evolve. This subtle mix of underlying exposures and securitisation features is in turn expected to command close attention by investors (especially investors in less senior tranches), who will require appropriate transparency in order to meet their due diligence and monitoring obligations. This article therefore seeks to demonstrate how ESMA's draft disclosure requirements and templates can meet these investors' needs. Given the scope of the CRR, the article focuses on incentives for bank originators<sup>55</sup> of securitisations and on the more commonly-found non-Asset-Backed Commercial Paper securitisations.

The remainder of the article is structured as follows: The first section sketches a brief background on the technique and motivation for securitisation, followed by an overview of the main transparency-related provisions introduced in the Securitisation Regulation. The subsequent section introduces the key transparency arrangements under the Securitisation Regulation. The sections thereafter discuss issuer considerations for structuring securitisations aimed at releasing capital under the modified CRR, and the data and methodology used for the simulations. Afterwards, the simulation results are presented and examined from the perspective of transparency and investor protection, before the concluding summary.

## Background on securitisation and due diligence requirements

In its simplest form, securitisation involves an institution taking the future rights to cash flows from an asset it owns and selling those rights to investors. Often, the rights to many assets (e.g. loans) are grouped together and, furthermore, different priorities on these future cash flows are sold off to investors (i.e. tranches). Institutions that securitise assets they own in this way are called 'originators' in the Securitisation Regulation.

Securitisation is often, though not exclusively, performed by banks. There are several reasons

why a bank might conduct such an operation. For example, a bank may seek to raise funds from investors, rather than wait a long time to receive cash flows on the same assets. This can also help the bank diversify its sources of funding, in order to complement more traditional issuance of debt or equity, or to replace more short-term sources of funding such as interbank financing.

From a similar perspective, securitisation involves a transfer of risk from the bank to investors. By transferring sufficient risk to investors a bank can, under certain regulatory conditions, adjust the capital it is required to set aside. This capital motivation is the chief focus of the note and is further explored below.

Securitisations can be highly attractive for certain classes of investors, so long as the products are adequately understood. For example, securitisations can have relatively long maturities, stretching into several decades. Institutional investors with long-dated liabilities, such as life insurers and pension funds, can invest in securitisations to help reduce mismatches in maturity profiles between their liabilities and their assets – a key risk for these investor groups. More generally, securitisations offer the potential for investors to diversify their exposure to sectors of the economy that are less liquid and thus more difficult to access otherwise. Indeed, EU securitisations include a wide variety of assets, such as residential mortgages, commercial mortgages, loans to small and medium-sized enterprises (SMEs), equipment leases, auto loans/leases, consumer loans, credit card receivables, and others.

At the same time, securitisations are often complex products. This implies that investors must devote considerable effort on conducting due diligence on a possible securitisation investment, and must afterwards regularly monitor the various factors within a securitisation that may drive the performance of their holdings. The Securitisation Regulation establishes a number of elements that investors and potential investors must take into account, including the performance of the securitised assets (referred to hereafter as 'underlying exposures'), the quality and role of service providers such as swap counterparties, the degree of legal ring-fencing of their underlying exposures relative to the originator ('bankruptcy-remoteness'), and other aspects. In line with its investor protection

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<sup>55</sup> Rather than non-bank originators, such as private equity firms.

mandate, ESMA plans to continue monitoring EU securitisation markets over the coming years.

The next section of this note goes on to discuss the transparency arrangements under the Securitisation Regulation, which aim to provide an adequate basis for investors to meet these due diligence and monitoring requirements.

### Key transparency arrangements under the Securitisation Regulation

As mentioned in the previous section, the Securitisation Regulation establishes new requirements regarding transparency, both in terms of transaction documentation and data on underlying exposures and transaction features. ESMA is mandated to develop draft technical standards setting out precise details on what underlying exposure and transaction features and elements should be reported, as well as the standardised templates to be used. These draft technical standards, which were consulted on in Q1 2018, cover two main categories of information:

- underlying exposures data (such as on interest rates, outstanding amounts, etc.) and
- data on all other aspects of the transaction (e.g. investor reports, inside information, and significant events) – hereafter designated as ‘investor report templates’ for the sake of simplicity.

Several underlying exposure templates have been developed, covering the major types observed in EU securitisations: residential mortgages, commercial mortgages, as well as auto loans/leases, consumer loans, corporate loans (including SME loans), credit card receivables, and leases. The draft templates leverage on previous contributions, including ESMA’s own draft CRA3 RTS on securitisation disclosure requirements in June 2014, the Joint Committee’s Task Force on Securitisation Report in May 2015, and the ECB and Bank of England’s respective loan-level requirements. Furthermore, wherever possible the draft templates aim to be consistent with parallel reporting arrangements in practice, such as those set out in the AnaCredit Regulation and in ESRB (2017).

ESMA’s draft underlying exposure templates cover exposure-level (e.g. loan-level) details on the underlying exposure product, borrower, performance since origination, and collateral (at the level of each collateral item). Similarly, the draft investor report templates cover essential information on all elements of the securitisation besides underlying exposures, including information on the overall securitisation, tranche/bond, account-level information, counterparty information, tests/trigger-related information, cash-flow information, as well as a free-text section entitled ‘other information’. Each template has been developed to facilitate both the due diligence and monitoring of individual securitisations as well as a wider understanding of the evolution of securitisation structures and arrangements across the European Union (including for financial stability purposes). In line with its mandates under the Securitisation Regulation, ESMA has developed these templates for use by potential and actual investors, as well as the public authorities named in the Securitisation Regulation. In so doing, ESMA has also sought to leverage on the knowledge gained from its investor protection activities, as well as its experience in developing large-scale data reporting requirements, such as under MiFID II and EMIR.

### Why securitise? The capital management channel

When considering the use of a securitisation in a capital management exercise, the originator will compare its return on risk-adjusted capital (RORAC) before and after securitisation. If the RORAC after securitisation is inferior to the RORAC before securitisation, there are few capital-related incentives for the originator to create the transaction.<sup>56</sup> This condition can be summarised using the following inequality<sup>57</sup>:

$$RORAC_{post\_securitisation} > RORAC_{pre\_securitisation}$$

The ‘return’ aspect of  $RORAC_{pre\_securitisation}$  consists of the spread on the portfolio, in other words, the income earned on the underlying exposures that have been securitised, such as

<sup>56</sup> One potential reason to persist with the securitisation nonetheless may be to meet leverage ratio requirements. However, in this case it may be more efficient to sell off the loans directly without incurring the costs associated with securitisation (e.g. third-party service provider fees).

<sup>57</sup> Alternatives to securitisation include issuing equity, outright sales of the underlying exposures, or purchasing credit protection on the underlying

exposures. So even if RORAC inequality is satisfied, an originator would need to verify that the costs of securitisation were the lowest (relative to capital saved) among these alternatives. This is not explored further here, because RORAC inequality is a necessary precondition for this second step and the topic is less relevant to the benefits of transparency for investors.

interest payments, less a benchmark rate.<sup>58</sup> Similarly, 'return' in  $RORAC_{post\_securitisation}$  consists of the spread on the portfolio less the costs associated with operating the securitisation (such as legal fees, any rating agency fees, and payments to third-parties such as trustees and swap counterparties) and also less the yield paid on any securitisation tranches that are sold off.

The 'capital' aspect of  $RORAC_{pre\_securitisation}$  refers to the funds an originator must set aside to cover extreme losses on the underlying exposures.<sup>59</sup> In contrast, 'capital' in  $RAROC_{post\_securitisation}$  denotes originator funds set aside to cover extreme losses on securitisation tranches that are held by the bank and not sold off to investors, according to the provisions of the modified CRR.

Based on these considerations, RORAC inequality can be represented as follows:

$$\frac{Income_{u.exposures} - Cost\ of\ structure - Yield\ paid}{Capital_{post\_securitisation}} > \frac{Income_{u.exposures}}{Capital_{pre\_securitisation}}$$

Filling in the terms in this inequality represents a challenging exercise for any originator interested in managing their capital using securitisation. This is because the above variables are generated on the basis of numerous assumptions, including:

- prepayment and dilution risks on the underlying exposures, thus affecting  $Income_{u.exposures}$
- credit risk migration and loss given default, which impacts  $Income_{u.exposures}$  and  $Capital_{pre\_securitisation}$
- the amount of tranche notes that are able to be sold (i.e. a bid/cover ratio of at least 1), thus influencing  $Yield\ paid$  and  $Capital_{post\_securitisation}$
- yield conditions for different tranches in the capital structure at the time of marketing (i.e.

potential investors' Internal Rate of Return), which will impact  $Yield\ paid$

- the market rate of any third-party services deemed necessary to mitigate risks on the securitisation and thus improve investor take-up and/or pricing. This includes the cost of contracting swaps (e.g. for basis risk, fixed/floating mismatches, or currency mismatches), bank accounts (e.g. for commingling risks), and custodial services. On the one hand, contracting these necessary services in-house will lower the *Cost of structure* measure; however it also raises the possibility of diminishing investor appetite, particularly among investors in lower-ranked tranches of the securitisation.<sup>60</sup>

## Simulation approach

Despite the number of assumptions required, it is still possible to simulate situations in which RORAC inequality is likely to hold. For this exercise, a dataset of traditional<sup>61</sup> residential mortgage-backed securitisations (RMBS) providing loan-level and tranche-level data is employed. This is inevitably an imperfect exercise, not least because RMBS may not necessarily be the first choice of securitisation for capital management purposes, given the comparatively lower capital charges on these assets in contrast to exposures to small and medium-sized enterprises (SMEs) for example.

On the other hand, assumptions for determining capital requirements on residential mortgages are relatively easier to find. Furthermore, the exercise can be instructive in illustrating which securitisations among this class appear able to successfully adjust the originator's capital position (i.e. satisfy the above RORAC inequality) under certain conditions. This in turn helps highlight which underlying exposures and structural features help satisfy the above inequality, and therefore which aspects may be particularly relevant for due diligence and monitoring purposes.

Moreover, the use of actual loan-level data ensures that realistic credit risk metrics can be derived for  $Capital_{pre\_securitisation}$  and  $Capital_{post\_securitisation}$  in the above. Elsewhere, the use of actual securitisations preserves the

<sup>58</sup> The return can be defined as either including ('gross') or excluding ('net') operating costs and taxes. For the sake of simplicity the gross return is used in this article.

<sup>59</sup> In the simulations below we also include expected losses in the measure of capital, where the originator is assumed to apply the Internal Ratings-Based Approach (IRBA) as per Article 255(3) of Regulation 2017/2401 amending the Capital Requirements Regulation.

<sup>60</sup> See Amzallag and Blau (2017) for further discussion.

<sup>61</sup> In contrast to synthetic securitisations—see Article 2(9) and 2(10) in the Securitisation Regulation for definitions.



link between the underlying exposures and relative size of tranches of different seniority (i.e. the relative size of junior, mezzanine and senior tranches as well as the use of reserve funds and overcollateralisation) — a key choice for originators.

As a result, this simulation exercise is both grounded empirically and represents a lower bound on what securitisation capital management outcomes are achievable.<sup>62</sup> A total of 646 RMBS across nine countries are used, covering a total of around 12mn underlying exposures worth around EUR 1.3tn at origination (V.1). All loan-level data items are measured at the time of loan origination, in order to capture the conditions of a 'new' securitisation.

#### V.1

##### Summary statistics

##### RMBS simulation dataset

	Deals	Exposure	Balance	Capital	Loss	Interest rate
BE	19	1.0	90	7.9	0.06	2.6
DE	8	0.8	84	7.7	0.07	3.2
ES	206	1.6	211	11.7	0.24	3.5
FR	33	2.3	217	9.6	0.06	3.0
IE	30	0.3	60	11.8	0.17	3.7
IT	131	1.2	139	8.1	0.36	3.5
NL	142	2.9	293	4.5	0.04	4.2
PT	39	0.5	37	7.7	0.15	3.9
UK	38	1.2	140	4.8	0.03	3.9

Note: Deals: number of deals; Exposure: number of underlying exposures (mn); Balance: total balance in EUR bn; Capital: average capital required (IRB) per deal (in %). IRB: Internal Ratings Based Approach, including expected losses as per Article 255(2) of Regulation 2017/2401. Losses: average expected losses per deal (in %). Interest rate: average interest rate (in %).

Sources: European DataWarehouse, Fitch Ratings, ESMA.

Using loan-level data, it is possible to estimate the weighted-average interest rate spread at origination for the pool of underlying exposures, i.e.  $Income_{u.exposures}$ . Elsewhere, publicly available rating agency assumptions are used to derive the necessary probability of default (PD) and loss given default (LGD) inputs for calculating capital requirements. The assumptions allow loan-specific and property-specific features to be linked with credit risk variables, for example riskier repayment features (e.g. interest-only loans), borrower profiles (e.g. unemployed borrowers), lending standards (e.g. high debt-to-income ratios), property characteristics (e.g. illiquid properties), and recovery situations (e.g. regions with higher foreclosure costs and longer recovery timing).<sup>63</sup> These inputs are used to calculate  $Capital_{pre\text{-}securitisation}$  and also enter into  $Capital_{post\text{-}securitisation}$  above.<sup>64</sup> *Cost of structure* is set at a range of 0.05-0.25% of the underlying exposure pool balance, based on market intelligence, rating agency assumptions, and the number of non-affiliated counterparties operating in the securitisation (using the database in Amzallag and Blau 2017).<sup>65</sup>

Given these calibrations, the following variables are simulated:

- amount of tranche notes sold by the originator, subject to minimum regulatory requirements to qualify for capital adjustment via securitisation.<sup>66</sup>

<sup>62</sup> Many securitisations in recent years were structured for funding purposes and not capital management; they may therefore have less optimal structures than those tailored for capital-release purposes. So if the simulation exercise suggests that even 'not optimised for capital management' securitisations can still achieve some adjusted capital requirements (under the forthcoming modified rules), this implies that even greater amounts of such capital management securitisations are possible than suggested in this exercise.

<sup>63</sup> See Amzallag et al. (2018) for further details.

<sup>64</sup> For all capital-related measures (i.e. for underlying exposure and securitisation tranches) we use the IRBA and, alternatively, the Standardised Approach (SA). This also reflects the relative order of these approaches in the hierarchy available to bank originators (the third and last is the External Ratings-Based Approach) and, furthermore, the fact that capital management securitisations are not always rated by rating agencies. The applicable securitisation capital caps and floors set out in Regulation 2017/2401 amending the Capital Requirements Regulation are also incorporated.

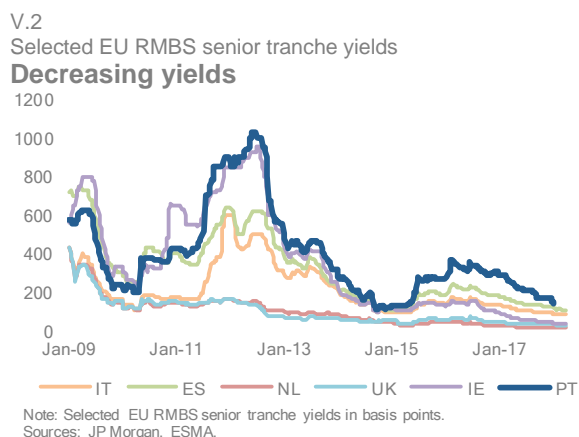
Lastly, it is assumed that the risk retention requirements in Article 6 of the Securitisation Regulation are satisfied using the option set out in Article 6(3)(c) (randomly selected exposures)—thus for example for a portfolio of loans worth EUR 105mn, the originator retains

EUR 5mn of randomly selected exposures and the remaining EUR 100mn are securitised. This appears to be the least capital-intensive method available to bank originators under the Capital Requirements Regulation (e.g. compared with the 'vertical slice' option).

<sup>65</sup> It is assumed that securitisations with more non-affiliated counterparties (such as swap providers, account banks, back-up servicers, etc.) are likely to have to pay greater costs than securitisations relying more on themselves or intra-group entities to fulfil key roles in the transaction (although this appears riskier for investors—Amzallag and Blau 2017)

<sup>66</sup> In other words, various possibilities exist for how many tranche notes are sold off. One scenario could be to assume that 50% of the senior tranche, 50% of the mezzanine, and 0% of the junior are sold off, while another could be 100% of the senior tranche, 100% of the mezzanine, and 50% of the junior, etc. However, the scenarios are structured so that they always respect the minimum requirements for significant risk transfer (e.g. 50% of mezzanine notes are sold off or, if there are no mezzanine tranches, 80% of the junior tranches are sold off) set out in Article 244 of Regulation 2017/2401 amending the Capital Requirements Regulation.

- adjusting *Yield paid*<sup>67</sup> based on country-specific and tranche-specific securitisation market data (V.2).<sup>68</sup>



The simulations are run using 75 tranche sale scenarios and 38 scenarios for market conditions (corresponding to quarterly average observations of market conditions over January 2009 – April 2018), for a total of 2,850 scenarios per securitisation. For each scenario, those securitisations that are able to satisfy the above RORAC inequality are recorded. The features of these transactions can then be compared with securitisations not satisfying the inequality in that scenario.

## Results and ESMA perspective based on draft disclosure requirements

We analyse the correlation between the likelihood of a securitisation's satisfying the above RORAC inequality, based on the various tranches sold and scenarios of market conditions, and several variables in the RORAC inequality above (V.3). The information used to produce these explanatory variables is derived from the information that will be available to potential and actual investors in the forthcoming ESMA templates. The present information is also available in the non-regulatory loan-level

templates, but not on an as-required basis and not covering all publicly-listed securitisations.

The simulation results provide an early indication of some important features that potential and actual investors may need to consider as part of their due diligence and monitoring efforts, and thus help justify the amount of transparency set out in ESMA's draft disclosure technical standards. This link between investors' needs and the transparency required was first outlined in the Joint Committee's Task Force on Securitisation Report in May 2015. At the time, the Joint Committee Report judged that this conceptual link should be a key guiding principle for policymakers seeking to establish transparency requirements for securitisation – this concept was in turn reflected in the Securitisation Regulation's transparency provision. The simulation results therefore aim to provide additional evidence, using the comparatively less-rich (but still highly useful) information available to market participants, of the link between risks and the transparency needed to understand those risks.

### V.3

#### Regression results

#### Likelihood of securitisations fulfilling RORAC inequality

	(1)	(2)	(3)	(4)
Capital pre-securitisation	-1.618*** (0.305)	-1.629*** (0.304)	2.323*** (0.477)	1.722*** (0.431)
Income on exposure	8.279*** (1.078)	8.496*** (1.053)	10.273*** (1.030)	7.956*** (0.935)
Cost of structure	0.001 (0.001)	0.000 (0.001)	0.002 (0.002)	0.001 (0.001)
Pool granularity	0.010 (0.008)	0.010 (0.008)	0.018* (0.010)	0.014* (0.008)
Average tranche thickness	-0.573*** (0.068)	-0.543*** (0.071)	-0.718*** (0.086)	-0.639*** (0.078)
R squared	0.377	0.384	0.305	0.269

Note: (1): RBA; (2): IRBA\_STS; (3): SA; (4): SA\_STS. Robust standard errors in parentheses. \*\*\* p<0.01, \*\* p<0.05, \* p<0.1.

Sources: European DataWarehouse, Fitch Ratings, JPMorgan, ESMA.

Results are reported for different capital requirement approaches – Internal Ratings Based (both non-STS and STS) and

and mezzanine tranches) is likely to focus relatively more on the credit risk of the underlying loans - which, in practice, is also likely to be reflected in the interest rate margin on those exposures. Nevertheless, there are many other drivers of interest rates on underlying exposure; see Amzallag et al. (2018) and the references therein.

<sup>67</sup> In doing so it is assumed that there is little correlation between the spread on the underlying exposures (i.e.  $Income_{u.exposures}$ , which does not change per scenario) and the spread on the tranches simulated. In other words, this assumes that investors' pricing of securitisation tranches is driven mainly by wider considerations than lending rates on underlying exposures, for instance the pricing of nearby substitutes such as covered bonds, general risk appetite, liquidity conditions, regulatory treatment (e.g. in the Liquidity Coverage Ratio), eligibility as collateral for central bank credit operations, and ratings (which include considerations on loans but also wider features such as the strength of any third-party service providers). At the same time, pricing on less senior tranches (e.g. junior

<sup>68</sup> Monthly averages of weekly data are taken. Where a tranche category is not available (e.g. spreads for junior tranches), a fixed mark-up over that country's next-closest available tranche is applied.

Standardised (both non-STS and STS). The results are interesting insofar as they illustrate the extent to which investors may need to pay attention to key aspects of securitisation. For example, it appears that less risky underlying exposure pools in the IRB approach tend to make it more likely that the above RORAC inequality is satisfied, whereas under the less risk-sensitive Standardised Approach the opposite effect holds: riskier exposure pools increase the chance of adjusting the originator's capital position via securitisation.<sup>69</sup> These results also reflect the fact that the riskiness of the underlying exposures enters twice into the RORAC inequality: first via  $Capital_{pre\_securitisation}$  and also as an input into the CRR formulae to calculate  $Capital_{post\_securitisation}$ ; this implies more subtle outcomes. Thus, from the perspective of transparency requirements, this finding suggests that investors in such capital management securitisations may need to pay close attention to both the sophistication of the originating bank and also the various underlying exposure features that are associated with higher credit risk. In this regard, the draft ESMA disclosure templates have been set up to capture a wide range of characteristics, including:

- borrower features, including income, employment status, resident or not of the country where the underlying exposure is located, whether occupying the property or not;
- loan maturity (a key input in the IRB capital formula in particular);
- loan default/status variables: number of days in arrears, date of default, the type of any restructuring arrangements, whether any litigation proceedings are under way;
- repayment arrangements: repayment frequency (monthly, quarterly, annual, etc.), amortisation type (linear, increase, bullet, etc.);
- lending practices: how the borrower income was verified, the purpose of the loan (e.g. property purchase or equity release), the origination channel of the loan (e.g. in branch, via a broker, via the internet, etc.);
- property features: the original and current loan-to-value ratios and their dates, the property's geographic region, valuation

method used for the property value estimates;

- losses on any sale of property collateral; and
- where applicable, guarantee information on the underlying exposure.

Moreover, the findings presented (in V.3) have important implications for the type of securitisation structure that is likely to be observed. This reflects the fact that the RORAC condition has a time dimension: Bank originators will seek to maintain the RORAC inequality over time, which includes maintenance of the capital position of the underlying exposures, all else being equal. One way to achieve this is to employ 'revolving' arrangements that allow originators to replenish pools of underlying exposures with additional exposures over time as the initial exposures that were securitised amortise.

This implies that investors may wish to consider the type of securitisation and, once it has been determined that it is a 'revolving' structure, pay even closer attention to the order of priority of their tranche(s) in the securitisation structure, even after having purchased the tranche notes (since orders of priorities can change). The draft ESMA disclosure templates include standardised fields to facilitate this activity, including:

- information on the securitisation structure: whether it is revolving or not, the type of securitisation waterfall (i.e. general order of priority of payments), the type of master trust (if this is used);
- information on any tests or triggers that may affect the securitisation (e.g. events of default or changes to the order of priority of payments); and
- information on the tranche notes: the order of priority of the specific tranche in the waterfall.

We can examine whether further characteristics are associated with greater or less likelihood of capital adjustment via securitisation, among the set of RMBS considered in this analysis. For example, use of the Standardised Approach (SA) to calculate capital requirements, rather than the Internal Ratings-Based Approach (IRBA), carries a different likelihood of capital adjustment. In turn, this implies that originators with relatively more risk-sensitive measurement systems are likely to seek out more capital adjustment transactions. Since originators using the IRBA tend to be larger entities, investors may also find it interesting to

<sup>69</sup> This does not automatically imply that securitisations with riskier underlying exposure pools are riskier for investors, especially senior tranches, depending on where and in what way credit enhancement is used

(including reserve funds and overcollateralization – to the extent these make economic sense for such transactions).

examine further characteristics of the originator (or originators) in question. To facilitate these efforts, the ESMA underlying exposure templates include fields for the Legal Entity Identifier (LEI) and matching name of the originator of each underlying exposure, as well as the LEI and name of the original lender (in the event that the underlying exposure was purchased).

Elsewhere, a lower average thickness appears to be associated with a greater likelihood of capital adjustment being obtained via securitisation.<sup>70</sup> This is because the greater the average thinness, relative to the same size of the underlying exposure pool, the more precisely originators are able to set the yield paid on tranches, which generally implies a more sensitive *Yield paid*. On the other hand, this also implies that the average tranche sizes are likely to be thinner or have more complex payment dynamics, relative to a securitisation with fewer tranches over the same size of underlying exposures.<sup>71</sup> Given this greater risk of full losses (since losses on a given tranche are allocated on a pro-rata basis), the more thin tranches (i.e. the greater the number of tranches, all else being equal), the more investors might wish to establish a detailed understanding of the tranches and their associated payment dynamics under different scenarios. To facilitate this analysis, the ESMA templates include:

- information on the tranche notes: the order of priority of the specific tranche in the waterfall, the credit enhancement of the tranche (using both regulatory and transaction-specific definitions of credit enhancement), the legal maturity date, and whether there are any extension clauses;
- a 'cashflow information' section that details, in a structured manner and as per each reporting date, all of the inflows from the securitisation underlying exposures (and other sources such as guaranteed investment accounts) and all outflows to tranches and other liabilities (e.g. payments

to counterparties providing services to the transaction)

Lastly, the simulations suggest that the 'Simple, Transparent, and Standardised' (STS) designation entails lower capital requirements on securitisation tranches. STS securitisations can thus be associated with capital management operations, suggesting that future securitisations which have been structured to adjust capital are more likely to be STS than non-STS, all else being equal. Nevertheless, as set out in the Securitisation Regulation, investors are expected to avoid relying solely on the STS notification when conducting their due diligence of these securitisations. By setting out standardised requirements for a comprehensive and up-to-date set of information on all aspects of the securitisation (as well as a 'free text' section to capture any relevant features not included), the ESMA disclosure templates also seek to facilitate investors' ability to demonstrate that they make use of additional sources of information beyond the STS notification.

## Conclusions

The Securitisation Regulation and accompanying modifications to the Capital Requirements Regulation are likely to substantially affect originators' incentives to structure securitisations, which may include securitisations created as part of capital management exercises. Simulations based on a set of 646 real-life securitisations suggest a key finding from the perspective of ESMA's investor protection mandate: securitisations structured to adjust originators' capital positions may contain relatively riskier underlying exposure pools, more dynamic structures, thinner and/or more complex tranches, and may also at the same time qualify for 'Simple, Transparent, and Standardised' status. Building on past policy recommendations, such as in the Joint Committee's Task Force on Securitisation Report in May 2015, the simulation

<sup>70</sup> Tranche thickness is defined as the difference between the tranche detachment point and the tranche attachment point. The attachment point is the level (in %) at which the specific tranche is exposed to aggregate losses in the portfolio of underlying exposures (a similar measure to the tranche's credit enhancement). In other words, this is the percentage of losses on the portfolio of underlying exposures that are necessary in order for the tranche principal to begin to be written down. The detachment point is the level at which the specific tranche ceases to be exposed to aggregate losses in the portfolio of underlying exposures, in other words the attachment point of the next-more-senior tranche in the priority of payments.

<sup>71</sup> For example, given a securitisation of EUR 1bn of underlying exposures, one possible tranche structure

could involve a junior tranche worth EUR 50mn, a mezzanine tranche worth EUR 150mn, and a senior tranche worth EUR 800mn (i.e. 20% credit enhancement). Alternatively, a structure over the same EUR 1bn of underlying exposures could be: a junior tranche of EUR 25mn, a lowest-ranked mezzanine tranche of EUR 25mn, a middle-ranked mezzanine tranche of EUR 50mn, an upper mezzanine tranche of EUR 100mn, and two pari-passu (in terms of principal) senior tranches worth EUR 400mn each (with the first-ranked senior tranche of these two paying out interest first – i.e. still 20% credit enhancement on the senior tranches).



results provide further evidence of the importance of transparency (and ESMA's role in developing adequate draft standards) in order to facilitate an understanding of the key features and risks associated with different securitisation structures and underlying exposure compositions. To this end, the draft ESMA disclosure templates aim to empower investors, through sufficient transparency, to understand and monitor these specific features, in line with their due diligence and monitoring obligations in the Securitisation Regulation.

## References

Amzallag, A. and M. L. Blau (2017), 'Tracing Structured Finance Counterparty Networks', Occasional Paper Series 199, European Central Bank.

<https://www.ecb.europa.eu/pub/pdf/scpops/ecb.op199.en.pdf?ee0c46823c6f164d9bfe7c2c3553b5b0>

Amzallag, A., Calza, A., Georgarakos, D., and J. Sousa, (2018) 'Monetary Policy Transmission to Mortgages in a Negative Interest Rate Environment'.

<https://ssrn.com/abstract=3117912>.

European Systemic Risk Board (2017), 'Recommendation of the European Systemic Risk Board of 31 October 2016 on closing real estate data gaps', ESRB/2016/4, 2017/C 31/01. [https://www.esrb.europa.eu/pub/pdf/recommendations/2016/ESRB\\_2016\\_14.en.pdf](https://www.esrb.europa.eu/pub/pdf/recommendations/2016/ESRB_2016_14.en.pdf)