Guidance consultation

Supervisory Formula Method and Significant Risk Transfer



May 2011

Supervisory Formula Method (SFM) and Significant Risk Transfer (SRT)

Introduction

We are issuing this guidance to set out our expectations on firms using the Supervisory Formula Method (SFM) to calculate risk-weighted exposure amounts (RWEA) for unrated securitisation positions.

The securitisation framework has a strict hierarchy of methods to determine the capital requirements for securitisation positions (set out in BIPRU 9.12 for firms using the Internal Rating Based (IRB) approach). Where a position is rated, the firm must determine the RWEA based on the rating of the position under the Ratings Based Approach (RBA). Where a position is unrated, IRB firms may be able to use the SFM to calculate the RWEA.

The rules relating to the SFM, however, must be read against the background of the over-arching requirement for securitisations (see BIPRU 9.3.1R). Originators must transfer a significant amount of credit risk associated with the securitised exposures to third parties to be able to apply the RWEA set out in BIPRU 9. We have significant concerns that firms' use of the SFM undermines the significant risk transfer requirement (SRT) with the reduction in RWEAs due to the use of the SFM being disproportionate to the credit risk transferred.

Supervisory Formula Method (SFM)

The SFM is a formula based on the underlying asset portfolio's capital requirement calculated under the IRB Approach. The detailed requirements are set out in BIPRU 9.12.21R to 9.12.23R. The underlying formula contains an implicit assumption that there is no systematic risk in tranches of diversified portfolios that attach at a level of credit enhancement above the capital requirement on the underlying portfolio. However, the performance of senior tranches of many securitisations since 2007 has shown this assumption to be flawed. In addition, where a firm's IRB model proves, ex-post, to have under-estimated capital requirements on the underlying portfolio, the SFM leverages any undercapitalisation.

As a result, the SFM will very often fail to appropriately capture the risks in retained securitisation positions. Further, the regulatory capital charges generated by the SFM reduce very quickly and to an extremely low level for small increases in credit enhancement. The resulting RWEA are likely not to be justified by a commensurate transfer of credit risk to third parties generally causing the SRT test to be failed (see BIPRU 9.3.9G).

Alternative to the use of SFM

The SFM currently gives, in many circumstances, much more favourable RWEAs than the capital requirement that would apply if the same tranches were externally rated. To be satisfied under BIPRU 9.3.9G that commensurate risk transfer has been achieved, and therefore for firms to comply with the SRT test, the FSA will generally expect firms to obtain a public rating on retained tranches to apply the Ratings Based Approach (RBA) instead of using the SFM. Firms should be aware, however, that even the use of RBA might not be, in itself, a sufficient condition to meet the SRT test if, notwithstanding the higher RWEA that would generally apply to the retained position, there is not a significant transfer of risk for the overall transaction. Further, firms should ensure they have regard to the ECAI provisions in BIPRU 9.7 and BIPRU 9.8 when obtaining public ratings on retained positions.

A firm may still be able to demonstrate SRT without a rating but we believe that this is likely to be exceptional and we expect firms to submit any proposal to do so to the FSA before claiming any capital relief.

Cost-benefit analysis

Materiality

The number of firms reporting securitisation exposures in FSA004 fell from 30 to 23 from 31 December 2009 to 31 December 2010.¹ In the same period, the number of these firms reporting securitisation exposures under the SFM increased from three to six. This represents an increase from 10% to 26%. The total securitisation exposures reported in FSA004 decreased from £272bn to £211bn from 31 December 2009 to 31 December 2010.² In the same period, the total exposures reported in FSA046 under the SFM increased from £5.6bn to £9.7bn. This represents an increase from 2.1% to 4.6%, this would increase to 7.5% if the transactions by UK banks currently under review by the FSA were permitted to use the SFM as proposed. Therefore, the potential scale of firms' use of the SFM for capital relief purposes is significant and the impact of any undercapitalisation due to the deficiencies in the supervisory formula could become systemic.

¹ The reduction in the number of firms reporting securitisation exposures was due to mergers, acquisitions and firm failure.

² We attribute this decrease to firm failure, disposal of securitisation positions, transactions coming back on balance-sheet (and therefore exposures will be reported as credit risk exposures) and positions maturing.

Costs to firms

The principal direct cost for firms to obtain an external rating on a transaction where they are seeking capital relief is the rating agency fees. This will typically vary across rating agencies and would depend on the size and complexity of the transaction. However, we estimate that for a plain vanilla transaction – for example, prime RMBS – there would be a one-off cost of £120,000-£150,000 with an on-going cost of £7,000-£15,000 for surveillance fees. Assuming that there are five transactions over the period of a year that make use of SFM for determining their RWEA, the cost of our policy to the industry would be a one-off cost of £600,000-£750,000. These transactions would have an on-going cost of £35,000-£75,000 (assuming firms went ahead with the transactions and obtained a rating). This is considered to be a lower bound estimate, as the number of transactions making use of SFM has been increasing.

Impact on capital

We carried out scenario analysis to compare the possible reduction in RWEA available to firms under the SFM (based on the five transactions presented to us) and that which firms may achieve if they obtained an external rating. In two of our scenarios we assumed the transactions only had two tranches: a AAA position and an unrated first loss position. In our third scenario we assumed the transaction had five tranches (AAA, AA, A, BBB and first loss position).

The table below shows the percentage reduction in RWEA that firms could achieve in the absence of this guidance and under three different scenarios where positions are rated and the RWEA calculated under the RBA. This shows that in our more conservative scenario (scenario 2) the particular transactions we have reviewed would not achieve regulatory capital relief as a result of this guidance. This represents the upper bound of the potential impact of requiring a rating – firms are not obliged to hold more capital than they would have done had they retained the securitised exposures and risk weighted them under the credit risk framework.³

	Reduction in RWEA
Supervisory Formula Method	72%
Scenario 1: Assuming 10% first loss position and 90% AAA position	24%
Scenario 2: Assuming 15% first loss position and 85% AAA position	0%
Scenario 3: Assuming 6% first loss position; 2.5% BBB position; 3% A position; 3.5% AA position; and a 85% AAA position	48%

Based on recent public transactions we consider that 10% to15% levels of credit enhancement are realistic for high quality asset pools. However, for riskier portfolios it is likely that substantially greater credit enhancement would be needed to achieve a AAA rating. The transactions presented to us were typically structured for most efficient use of the SFM, therefore we would anticipate some re-structuring of the transactions when seeking a rating.

³ BIPRU 9.11.5 and BIPRU 9.12.8

Supervisory Formula Method and Significant Risk Transfer

Benefits

By better aligning firms' capital requirements against the credit risk of retained securitisation positions the policy should make firms holding these positions more robust to losses on these exposures and ensure that firms' capital requirements are more closely aligned to the risks they are running. At a firm level, a reduction in the probability of firms failing as a result of inadequate capital held against credit risk reduces the expected costs of such events. At the aggregate level, the new regime should contribute to reducing the frequency of systemic financial crises and the expected costs of such crises.