Solvency II

Tougher line: Higher capital charges under Solvency II standard formula

Eight of the 'second wave' of Solvency II consultation papers (CPs) propose some significant modifications to the 'European Standard Formula' for calculating capital requirements. The changes reflect the tougher line on capital adequacy that is emerging from the financial crisis and the findings of the fourth Quantitative Impact Study (QIS4).

Key messages

- If all the proposed changes to the standard formula go through, the forthcoming QIS5 is likely to see greater complexity in some areas and potentially higher capital charges for many insurers using this approach.
- The tougher line includes more exacting stress tests to demonstrate capital adequacy and the effective elimination of certain allowances that might have reduced capital requirements such as geographical risk diversification.
- This may encourage more companies to use partial or full internal models than otherwise would have been the case.
- Even companies planning to use their own internal models should be aware of the changes to the standard formula as it is expected that they will initially need to use this approach in parallel with their own models or in case they do not obtain model approval.
- The proposed changes will be road tested as part of QIS5, which is due to begin in the autumn of 2010.
- Many of the second wave of CPs do not address calibration, which may offset some of the impact of the proposed changes. Calibration will be considered in the next set of CPs, which are expected to be released in November 2009.

Life underwriting risk (CP49)

Risk evaluation under all modules is more prudent and the verification threshold higher than under QIS4. This includes an increase in the percentage stresses. The assessment of morbidity risk now also includes a stress test on the rate of policyholder recovery and allowance can no longer be made for increased policyholder charges when calculating expense risk.

The impact of life underwriting and market stresses on policyholder behaviour, including lapse rates, needs to be taken into account across all risk modules rather than just lapse risk. The Committee of European Insurance and Occupational Pensions Supervisors (CEIOPS) has proposed two simplifications to the scenario-based approach used to calculate lapse risk, which can be applied where proportionate. CEIOPS has specifically requested feedback. Further simplifications will be addressed in the next wave of CPs.

Non-life underwriting risk (CP48)

Key sources of risk mitigation will no longer be allowed. In particular, CEIOPS has proposed that geographical diversification and allowance of own historical data (loss ratios and premium data) to estimate volatility parameters should be removed from the standard formula as the Committee does not consider the approach tested in QIS4 to be sufficiently robust and reliable. In addition, CEIOPS acknowledges that QIS4 did not sufficiently take into account the risk that premium provisions set up at the start of the year may subsequently need to be increased. While CEIOPS acknowledges the need for a more appropriate approach, CP48 does not provide details on how this will be achieved.

One of the limitations of the standard formula is that certain risk mitigating effects, in particular non-proportional reinsurance, cannot be allowed for appropriately. To avoid increasing the intricacies of an already complex standard formula, CEIOPS has suggested that undertakings with complex risk mitigation arrangements consider using a partial model.

Catastrophe risk

CEIOPS has suggested a standardisation of the scenarios for catastrophe risk within health, life and non-life risks to ensure consistency across territories. Scenarios will be developed by CEIOPS with support from the industry in time for QIS5. Morbidity risk will no longer be included in the catastrophe scenarios due to the difficulty in identifying a suitable stress.

Health underwriting risk (CP50)

QIS4 feedback suggested a lack of clarity around allocation of risks between the life, non-life and health underwriting risk modules and the approach used for the various health insurance products. A revised approach has been proposed in CP50, which considers the health obligations in two separate groups of sub-modules:

- SLT health (Similar to Life techniques) underwriting risk
- Non-SLT health (Non similar to Life techniques) underwriting risk

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Calibration is currently underway and will be developed consistently with the life and/or non-life underwriting risk modules as appropriate.

Market risk (CP47)

The QIS4 approach for modelling **currency risk** was considered to be crude, with all currencies assumed to rise or fall by the same amount relative to the local currency at the same time. CP47 proposes a more refined approach where a separate capital charge will be calculated for each currency. In addition, currency risk related to foreign equity holdings should be explicitly included in the currency risk sub-module.

The interest rate risk sub-module is to be expanded from QIS4 to include a stress on volatility of interest rates. It is not clear whether the stress scenarios will distinguish between real and nominal interest rates or domestic and foreign interest rates.

In respect of **property risk**, CEIOPS will investigate whether a distinction should be made between different types of properties. CEIOPS concluded that liquidity risk is better captured under Pillars 2 and 3.

In response to QIS4 feedback, CEIOPS has provided some guidance on the interaction between the **spread risk** and **counterparty default risk** sub-modules. However, it acknowledges that the Framework Directive allows a degree of freedom in allocating risk. The basic principle remains that no risk should be either left out or double counted.

Equity risk is not explicitly considered within CP47, but will be covered in the next set of CPs.

Operational risk (CP53)

The operational risk charges under QIS4 tended to be lower than under internal models. CEIOPS is therefore proposing that the range of operational risk parameters is increased to ensure it is more consistent with internal model assessments.

Counterparty default risk (CP51)

CEIOPS has proposed that this calculation be simplified, following unanimous feedback from QIS4 that the approach was disproportionately complex. There is still limited consideration of intra-group arrangements and unrated counterparties.

Reinsurance mitigation (CP52)

Insurers are set to face tighter rules on the use of reinsurance in capital management. CP52 focuses on effective transfer of underwriting risk to a third party. Firms will need to be able to show that any increase in available capital or decrease in Solvency Capital Requirement (SCR) is commensurate with the level of risk transfer achieved.

Loss-absorbing capacity of technical provisions and deferred taxes (CP54)

Each sub-module of the SCR is calculated gross of the effect of any assumed changes to future discretionary benefits. CP54 sets out two possible definitions of this gross amount for feedback.

The adjustment for loss-absorbency of technical provisions is calculated as the difference between the total SCR gross and net of the effect of assumed changes to future discretionary benefits. CP54 sets out two possible options for this calculation – either a modular approach or a single equivalent scenario.

The second approach offers practical advantages in terms of a reduced number of calculations and more obvious avoidance of double counting of the risk mitigation effects, but was not fully tested in QIS4 due to limited understanding. CEIOPS plans to provide a spreadsheet to allow the single equivalent scenario to be determined.

Minimum Capital Requirement ('MCR') (CP55)

The mechanism for evaluation of the MCR has now been finalised as a simple percentage of the SCR (based on standard formula or approved internal model) subject to a maximum (45% known as the 'cap') and a minimum (25% known as the 'floor'), together referred to as the 'corridor'. Calculations of the MCR and supporting own funds are required quarterly. Consequently, firms need to estimate the SCR quarterly to establish the corridor, though CEIOPS proposes that this would be a proportionate calculation.

If you would like to discuss any of the areas covered in this paper, as well as the implications for yourself and your firm, please contact one of our experts:

James McPherson
PricewaterhouseCoopers (UK)
44 20 7213 4462
james.mcpherson@uk.pwc.com

Gauri Shah
PricewaterhouseCoopers (UK)
44 20 7212 2638
gauri.n.shah@uk.pwc.com

Mark Train
PricewaterhouseCoopers (UK)
44 20 7804 6279
mark.train@uk.pwc.com

Ainsley Normand
PricewaterhouseCoopers (UK)
44 0 131 260 4233
ainsley.m.normand@uk.pwc.com

www.pwc.co.uk/solvencyII