# Asia e-Alert



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# **Draft Risk-Based Capital 2 Framework for Thailand**

#### INTRODUCTION

Capital adequacy is a topical subject for many life insurers in Thailand at present given the unprecedented low levels of fixed interest yields and the impact on reserves and solvency capital. Against this backdrop, the Thai insurance regulator, the Office of Insurance Commission (OIC) released the latest draft Risk Based Capital 2 (RBC 2) framework in April 2016 following industry analysis and consultation stretching back to 2012.

The draft RBC 2 framework has been broadly based on principles and concepts surrounding consistency with the requirements of the ICP17 (Insurance Core Principles) Capital Adequacy standards with a desire to enhance the "quality" of capital, better reflect the risk profile of individual companies and eliminate double gearing capital.

Following the release of the draft framework, life insurance companies in Thailand are required to submit the results of a Quantitative Impact Study (QIS 1) early in the second half of 2016. According to the OIC's plan, the RBC 2 framework will be further fine-tuned following the outcome of the QIS 1 results. There will be a subsequent QIS 2 exercise before the official RBC 2 framework is finalised, although the timeline of the actual implementation is unclear at this stage.

In this e-Alert, we compare the key changes proposed in the latest draft with the existing RBC framework and comment on what these changes may mean for the Thai life insurance industry if adopted.

# **DRAFT RBC 2 FRAMEWORK**

# **TOTAL CAPITAL AVAILABLE (TCA)**

# **AVAILABLE CAPITAL**

Available capital is typically classified into several capital tiers based on asset quality. In the current RBC framework, the available capital is split into Tier 1 capital and Tier 2 capital. The OIC has proposed to refine the capital tiers by creating the following subcategories within Tier 1 capital:

- Common Equity Tier 1 (CET1) (higher quality Tier 1 assets)
- Additional Tier 1 (AT1) (remaining Tier 1 assets)

# **MINIMUM FLOORS**

The changes in capital tiers are typically considered in conjunction with limits on capital tiers. The OIC has proposed that CET1 is no less than 65% of the total capital required and that Tier 1 capital is no less than 80% of the total capital required.

# **COMPONENTS OF AVAILABLE CAPITAL**

The draft RBC 2 framework proposes to add some instruments that can be counted as AT1 capital:

- Capital received from issuing irredeemable and non-cumulative preference shares
- Capital received from issuing warrants on debt that is subordinated to policyholders, beneficiaries, common debt holders and holders of securities that fall under the Tier 2 category as specified by the OIC

#### **DEDUCTION ITEMS**

Deduction items have been prescribed in each capital level (i.e., CET1, AT1 and Tier 2 capital) rather than at the aggregate level. Among the newly introduced deduction items are equity cross-holdings between insurance companies (but excluding investments from reinsurers, brokers and fund management companies) and equity investment in other life or non-life insurance companies.

# **TOTAL CAPITAL REQUIRED (TCR)**

#### **COMPONENTS OF TCR**

The current RBC framework includes five risk charges:

- Insurance risk
- 2. Market risk
- 3. Credit risk
- Concentration risk
- 5. Surrender risk

The proposed RBC 2 framework will be built on the existing framework but with the addition of an explicit operational risk charge and the modification of deductions to TCA to cover group risk.

#### **CONFIDENCE LEVEL**

The current RBC framework uses a 95% confidence level under a 1-year Value at Risk (VaR) approach. QIS 1 will test three target confidence levels, namely 95%, 97.5% and 99%. The results are expected to facilitate a decision on the prescribed confidence level and the time allowed for transition from the current RBC regime to the RBC 2 framework.

#### **RESERVE CALCULATIONS**

#### **DISCOUNT RATE CHANGES**

The current RBC framework uses zero coupon yields on Thai government bonds as the discount rate to determine long-term liabilities with the maximum of current valuation date yields and the weighted average of 51% of the current valuation date and 7% each for yields applicable at the prior seven quarters.

Under the draft RBC 2 rules, in addition to performing the reserve calculations using discount rates in line with the current RBC framework, insurers are required to perform additional testing to assess the volatility of the Capital Adequacy Ratio (CAR) position under three different liability discount rate methods:

- 1. **Discount rate method 1:** The risk-free rate of return at the valuation date for 49 years and a yield equal to a fixed rate of return at year 50 and thereafter;
- 2. **Discount rate method 2:** The risk-free rate of return at the valuation date up to the "last liquid point" at year 20 and the moving average yield thereafter, calculated from the average of the risk-free rate of return from the most recent four quarters; and
- 3. **Discount rate method 3:** The risk-free rate of return at the valuation date up to the last liquid point at year 20 and moving to the Ultimate Forward Rate (UFR) in year 25 and thereafter, which is a rate prescribed by the OIC.

The final discount rate methodology will be decided by the OIC after receiving market test results and feedback from the industry.

# INTEREST RATE RISK CHARGE

Under the draft RBC 2 framework, the liability cash flows included in the assessment of the interest risk charge should be at the 75% target sufficiency level as opposed to the 50% level that is adopted in the current RBC rules.

The risk mitigating effects of derivatives (e.g., interest swaps) are allowed to be reflected in the assessment of the interest risk charge.

# **CREDIT RISK AND OTHER RISKS**

#### **CREDIT RISK CHARGE ON INVESTMENT ASSETS**

Under the draft RBC 2 framework, it is proposed that risk factors for credit risk charge on investment assets (i.e., debt securities, deposits) will be prescribed at a more granular level, differing by three groups of term to maturity:

- A period shorter than one year
- 2. A period of one year or more but no more than five years
- 3. A period of more than five years

This differs from the "long" and "short" tenor applicable under the current RBC regime.

In addition, some risk factors have been revised in the draft new rules. A new spread risk is proposed to be included that aims to capture the risks associated with changes in bond credit spreads, i.e., the potential decrease in market value of an asset due to increases in credit spreads.

#### REINSURANCE CREDIT RISK CHARGES

Credit risk charges for reinsurers are currently determined based on the risk levels of the reinsurer. For offshore reinsurers, the risk levels differ by credit ratings given by various rating agencies. For local reinsurers, the credit risk levels differ by the solvency capital ratio of the reinsurers as shown in the table below.

# RISK LEVEL OF LOCAL REINSURERS (DETERMINED BY CAR LEVEL)

Risk Level	Current RBC	Proposed RBC 2	
1	CAR ≥ 300%	CAR ≥ 400%	
2	200% <car 300%<="" td="" ≤=""><td>330% <car 400%<="" td="" ≤=""><td></td></car></td></car>	330% <car 400%<="" td="" ≤=""><td></td></car>	
3	150% <car 200%<="" td="" ≤=""><td>250% <car 330%<="" td="" ≤=""><td></td></car></td></car>	250% <car 330%<="" td="" ≤=""><td></td></car>	
4	CAR ≤ 150%	170% <car 250%<="" td="" ≤=""><td></td></car>	
5	-	135% <car 170%<="" td="" ≤=""><td></td></car>	
6	-	100% <car 135%<="" td="" ≤=""><td></td></car>	
7	-	CAR ≤ 100%	

In the draft RBC framework, the reinsurance credit risk charges have been refined by using more granular risk levels.

# PROPOSED REINSURANCE CREDIT RISK CHARGES (OFFSHORE AND LOCAL REINSURERS)

Risk level	Current RBC	Proposed RBC 2
1	1.6%	1.6%
2	2.8%	2.8%
3	4.0%	4.0%
4	8.0%	8.0%
5	12.0%	15.0%
6	-	25.0%
7	-	48.5%/100%*

<sup>\*48.5%</sup> for offshore reinsurers; 100% for local reinsurers

#### DIVERSIFICATION ALLOWANCE ACROSS ASSET AND LIABILITY RISK CHARGES

Under the draft RBC 2 framework, the following correlation matrix between asset risk and insurance risk is proposed for market testing for all target sufficiency levels:

	Asset risk *	Insurance risk
Asset risk *	100%	75%
Insurance risk	75%	100%

<sup>\*</sup> Comprises market risk and credit risk

# **INSURANCE RISK CHARGE**

The insurance risk charge on the premium reserve risk component for short-term business has been simplified to remove the excess of the Unearned Premium Reserve (UPR) over the fair value of Unexpired Risk Reserve (URR) from the calculation and to instead base the calculation on the URR component only.

# SURRENDER RISK CHARGE

Under the current RBC requirements, an explicit surrender value capital risk charge has been included based on a comparison of the surrender value to total encumbered capital (i.e., the sum of all risk charges plus Gross Premium Valuation (GPV) reserves). This is consistent with the cash surrender value (CSV) treatment under the Malaysia and Singapore RBC frameworks. The same approach is proposed in the Thai RBC 2 framework.

# **OPERATIONAL RISK CHARGE**

An explicit operational risk charge is included in the draft RBC 2 framework, expressed as the maximum of X% of gross earned premium during the 12 months prior to the valuation date and Y% of GPV reserves, where X and Y vary by confidence level as follows:

# **OPERATIONAL RISK CHARGE**

	Confidence level		
Parameter	95%	97.5%	99.5%
X	1.40%	2.40%	4.00%
Υ	0.16%	0.27%	0.45%

#### **GROUP RISK**

Group risk is covered through the introduction of equity cross-holdings between insurance companies and equity investment in other life and non-life insurance companies within the TCA deduction items.

# **COMMENTS**

The draft RBC 2 framework represents an enhancement to the current regime in a number of aspects, in particular:

- More classification of different capital tiers
- Allowance for diversification across different risk charges, e.g., the new diversification factors between asset risk and insurance risk
- Revision of the confidence level used for the interest risk charge in the GPV calculation from 50% to 75% to be consistent with the confidence level used for the insurance risk charge
- Inclusion of an explicit operational risk charge is in line with the more advanced solvency frameworks such as Solvency II.

However, the draft RBC 2 rules may introduce more stringent requirements in some areas, especially:

- The impact of potential adoption of a higher confidence level, e.g., 97.5% or 99% compared to the 95% level used in the current RBC framework
- Consideration to use lower discount rates for GPV reserve calculations under all three discount rate methods being tested compared to the current discounting approach

Several life insurers in Thailand have seen deteriorating solvency positions and reserve deficiency issues recently as Thai Government Bond yields have remained depressed during the course of the first half of 2016.

We understand that the OIC intends to carry out more robust industry market testing before finalising the new rules and may allow a gradual increase in the capital requirement or specify a timeframe in which the insurers have to adopt the new framework, e.g., five years. That approach seems sensible, considering the industry may need time to adapt to any increase in capital requirements, especially under current market conditions.

Suthida Supantamart, who joined Milliman recently from the local industry to further strengthen Milliman's Thailand capabilities, foresees practical challenges in implementing the associated model changes for some companies when carrying out various parallel reporting on the current basis and for RBC 2 QIS purposes.

The details of the final RBC 2 rules are eagerly expected. It is likely the changes will further highlight the importance for life insurers in Thailand to look closely at their existing product strategy and capital and risk management plans and determine whether these are fit-for-purpose to achieve the company's strategic objectives.

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