Prudential Practice Guide

APG 115 – Advanced Measurement Approaches to Operational Risk

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About this guide

Prudential Standard APS 115 Capital Adequacy: Advanced Measurement Approaches to Operational Risk (APS 115) sets out APRA's requirements of authorised deposit-taking institutions (ADIs) in relation to the management and measurement of operational risk under an advanced measurement approach (AMA). This prudential practice guide aims to assist ADIs in complying with those requirements.

Subject to the requirements of APS 115, ADIs have the flexibility to configure their operational risk management framework in the way most suited to achieving their business objectives.

Contents

Operational risk management framework	**5**
Model uncertainty	**5**
Prior period losses	**6**
Operational risk loss events that are related to market risk	**6**
Insurance	**7**
ADIs that are locally incorporated subsidiaries of foreign ADIs	**7**

Operational risk management framework

1. APS 115 requires periodic independent reviews of an ADI's operational risk management framework to ensure its continued integrity. In addition to compliance with the requirements of APS 115, the review is expected to include an assessment of:

   (a) the integrity and appropriateness of data flows into the operational risk regulatory capital (ORRC) calculation including an assessment of whether relevant data have been omitted from the calculation;

   (b) the integrity of the management information system, including the appropriateness and accuracy of management reports;

   (c) the appropriateness of model validation processes, including the adequacy of procedures and controls over changes in model inputs, assumptions and calculation methodologies and assessment of the operation of those processes;

   (d) the accuracy and adequacy of technical documentation supporting the quantitative aspects of the operational risk measurement system; and

   (e) the integration of the operational risk measurement system into daily operational risk management processes.

2. Paragraph 10 of Attachment A to APS 115 requires an ADI's operational risk management framework to be clearly documented. It is expected this would include documenting the ADI's process for ensuring compliance with its operational risk management framework. Such documentation would typically include:

   (a) descriptions of the process by which the Board of directors and senior management review the ADI's compliance with operational risk management objectives and controls;

   (b) policies, processes and procedures concerning the review, treatment and resolution of non-compliance issues; and

   (c) a system of documented approvals and authorisations to ensure accountability to an appropriate level of management.

Model uncertainty

3. Paragraph 25 of APS 115 requires, given the subjectivity and uncertainty of operational risk measurement modelling, an ADI to be conservative in the modelling choices and assumptions used and to give consideration to the results of sensitivity analysis.

4. APRA envisages that an ADI would have a formalised framework to manage the model risks inherent in its ORRC calculation. Such a framework would include the monitoring, mitigation and accounting for known uncertainties related to modelling choices, assumptions, parameters and input data. An assessment of the model uncertainties would typically be conducted at least once a year and involve the following steps:

   (a) acknowledging in the model documentation all assumptions, choices and parameters, implicit or explicit in the model, and their limitations to ensure that no implicit assumption or choice in the model is left unchallenged and consequently becomes a potential source of unmanaged model risk;

   (b) eliciting from academic research and industry practice a sufficiently comprehensive set of alternatives for each modelling choice, assumption and parameter. This includes the monitoring of academic research and industry practice on an ongoing basis for innovations in operational risk measurement approaches;

(c) supporting the criteria used for selecting the most appropriate alternative for each modelling choice, assumption and parameter, with peer-reviewed academic publications;

(d) identifying, assessing and documenting all residual model risks, as well as the corresponding sensitivity of the ORRC across the full range of uncertainty to a reasonably high level of confidence; and

(e) applying conservatism to the model inputs, outputs and/or calculation commensurate with the model risks and sensitivity as outlined in (d).

Prior period losses

5. This section provides further guidance on the treatment of prior period losses. Operational risk events that require adjustments to an ADI's prior period financial performance (e.g. a change to a prior period tax liability) are considered to be consistent with the scope and definition of operational risk defined in paragraph 5(c) of APS 115. In terms of paragraph 16 of Attachment B to APS 115, such events must be recorded within an ADI's operational risk loss database and incorporated into its ORRC calculation process. Such operational risk events include:

(a) adjustments related to conditions that existed during the period, potentially involving fraud, error or unintentional circumstances – for example, when tax/legal advice had been provided in good faith, according to internal policy and with no perceived breakdown in internal processes; and

(b) adjustments related to conditions that arose subsequent to the period – for example, as a consequence of an external event such as a retrospective change in law or accounting policy.

6. Paragraph 21 of Attachment B to APS 115 requires the ADI to collect information on gross loss amounts and any recoveries. For prior period losses, this information would include the actual amount of the change or adjustment, any related legal costs, penalties, fines, punitive damages, interest charges, other prior period losses directly attributable to the change or other amounts consistent with the determination of operational risk losses. Any benefit that had been gained in prior periods may be netted back to the loss recorded.

Operational risk loss events that are related to market risk

7. This section provides further guidance on the treatment of operational risk events and losses that are related to market risk. Typically, finalisation of the loss amounts attributed to operational risk events related to market risk is unlikely to occur if the related positions remain open. Nonetheless, as with all operational risk events, APRA envisages these losses, once discovered, would be recorded in the operational risk loss database (database) in a timely manner (refer to paragraph 29 of Attachment B to APS 115) even if loss amounts are only estimates at the time of discovery. If a position remains open, depending on the materiality of the operational risk event and potential change in operational risk profile, there may be some overlapping (market, operational) regulatory capital treatment from the time of discovery of the operational risk event to the time the position is closed and the loss realised. Operational risk losses related to market risk are one of a number of loss event types that can impact on the operational risk profile and, through that, the ORRC calculation. Once the (market risk-related) operational risk loss event has been realised (e.g. the market risk position closed), the information in the database would be updated and the final loss treated as operational risk for the calculation of the ORRC accordingly.

Insurance

8. This section provides further guidance on the use of insurance as a risk mitigant by an ADI and how APRA envisages such insurance would be treated for the purposes of meeting the requirements in APS 115, particularly Attachment B. In order for insurance to be recognised for these purposes, ADIs may have to negotiate certain terms and conditions with their insurance providers, specifically for periods of insurance, restriction exclusions and the notification period for cancellation. Some clauses of APS 115 make provision for submissions to APRA for approval of wordings where ADIs consider a restriction is not detrimental to their operational risk.

9. In terms of the requirement in paragraph 47(d) of Attachment B to APS 115, APRA recognises that ADIs, or their captive insurers, will have either a deductible or a self-insured retention amount which, in effect, provides less than 100 per cent insurance by a third party. In such cases, an ADI could include this cover in its operational risk measurement model through the use of a haircut.

10. In capturing the characteristics of its insurance policies through haircuts to the amount of insurance recognition, an ADI would typically consider the ability and willingness of the insurer to pay claims in a timely manner. If the assessment concludes that there are concerns regarding the ability to pay in a timely manner, the ADI could determine an appropriate haircut to adjust the amount of insurance that is recognised.

11. Mismatches in the coverage of insurance policies can occur in many ways and may result from:
    (a) uninsurable events including errors and omissions;
    (b) differences in conditions between local and global programs;
    (c) differences between coverage on layered programs;
    (d) potential erosion of coverage on aggregate programs; and
    (e) deductibles, self-insured retentions and the like.

ADIs that are locally incorporated subsidiaries of foreign ADIs

12. Paragraphs 1 and 2 of Attachment C to APS 115 detail specific requirements that an ADI that is a locally incorporated subsidiary of a foreign ADI must satisfy if it is to use an allocation mechanism in determining its ORRC. One of the central principles is that the subsidiary provides APRA with information to assist APRA's understanding of the overall AMA methodology being implemented across the banking group. As a guide, the information provided typically includes:
    (a) information on the subsidiary's approach, or proposed approach, for measuring ORRC;
    (b) information on whether the operational risk management framework is centralised or decentralised, including information on the reporting structure of the operational risk management framework at the subsidiary level and the systems and processes surrounding the collection of operational risk data; and
    (c) information on the group-wide AMA, including relevant aspects of the AMA methodology, the allocation mechanism and any other pertinent operational risk data.

13. APS 115 states that APRA may determine that an ADI that is a locally incorporated subsidiary of a foreign ADI is 'significant', in which case it will be required to calculate its ORRC on a stand-alone basis. In making this determination, APRA will give consideration to the operational characteristics and risks of the subsidiary, and its size relative to the Australian financial market and within the banking group to which it belongs in terms of loans, deposits and revenue.

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