Chapter 5

The Matching Adjustment

Introduction

"Where insurance and reinsurance undertakings hold bonds or other assets with similar cash flow characteristics to maturity, they are not exposed to the risk of changing spreads on those assets. In order to avoid changes of asset spreads from impacting on the amount of own funds of those undertakings, they should be allowed to adjust the relevant risk-free interest rate term structure for the calculation of the best estimate in line with the spread movements of their assets."[296]

The MA is a significant item of life insurance capital management in the UK, which can trace its origins back to historic concessions made by HM Treasury to the UK life and savings market. Although not included in the original Solvency II Directive when agreed upon in 2009, it was subsequently added to its scope in 2014 as a result of the efforts of UK negotiators, in turn representing sustained pressure from the very large UK life and savings market — the chief beneficiary of the MA regime.

Although a technical area, the capital benefits of the MA are very significant. In April 2018, the PRA reported that the MA was worth £66 billion to the UK insurance industry, a figure that is expected to be materially bigger today given the subsequent significant expansion of the life market, particularly through bulk purchase annuity transactions.

Following Brexit, the UK's reform efforts in this area have continued apace, resulting in an additional round of reforms designed to further streamline and update the MA. The PRA has explored avenues for creative application of the MA, both in terms of eligibility of underlying insurance liabilities and assets that may be included in an MA portfolio, while balancing these ambitions against the need for an appropriate degree of overall prudence in the sector. This innovative spirit, which has facilitated the use of MA assets ranging from gilts to equity release mortgage (ERM) portfolios, and beyond, has recently come to encompass more asset and liability classes through the PRA's latest set of MA reforms, which became effective in June 2024 (see Section 10 below).

For its part, the EU has also looked again at the MA as part of its 2020 review of the Solvency II Directive (2020 Review), but limited to narrow issues, such as the removal of the limitations to the diversification benefits between MA portfolios and other portfolios in the calculation of the SCR.[297] The Amendments (discussed in previous chapters) do not seek to overhaul the MA, with most proposed changes being tangential, arising from changes in related areas.

This chapter touches on the Solvency II foundations of the MA, but primarily focuses on the UK's implementation of the same, including in the current round of reforms.

1. What Is the Matching Adjustment?

Long-term insurance products that may not generally be lapsed, such as annuities, are typically backed by (re)insurers with long-term assets that match the cash flows closely (such as long-dated bonds) and are expected to be held to maturity.

[296] "Directive 2014/51/EU of the European Parliament and of the Council of 16 April 2014", amending Directives 2003/71/EC and 2009/138/EC and Regulations (EC) No 1060/2009, (EU) No 1094/2010 and (EU) No 1095/2010.

[297] The EIOPA, Consultation Paper on the Opinion on the 2020 Review of Solvency II (EIOPA-BoS-19/465).

In this context, where a (re)insurer holds, *e.g.*, a bond to maturity, it is exposed only to the default of the issuer in paying the coupon and/or redeeming the principal amount. In other words, the (re)insurer can effectively disregard changes to market value (other than those that reflect default risk) between acquisition and maturity of the asset. This is sometimes referred to as an "illiquidity premium". The MA is the mechanism that delivers the capital benefit of this illiquidity premium to (re)insurers.

The detail of this mechanism is highly technical in nature and revolves around how life (re)insurers calculate their insurance liabilities, otherwise known as technical provisions (which is the subject of Chapter 7: Technical Provisions). In short, a (re)insurer is required to hold assets equal to the present value of future net cash flows under the relevant policies. This involves applying a discount rate to those cash flows to account for the time value of money. The MA is an adjustment to that discount rate, allowing the (re)insurer to use a discount rate closer to the credit-adjusted market rate of return for the relevant liabilities instead of the risk-free interest rate (RFR) prescribed by Solvency II (see Section 5 below). This higher discount rate lowers the present value of liabilities and, consequently, lowers the technical provisions of the (re)insurer. In other words, the illiquidity premium is delivered by means of a synthetic reduction in a (re)insurer's capital requirements.[298]

2. The Matching Adjustment Regulatory Framework in the UK

Despite Brexit, the Solvency II regime, relating to the MA still remains relevant in the UK. The Solvency II regime was transposed into UK law in the Solvency 2 Regulations 2015. In addition, parts of the PRA Rulebook (including, the Technical Provisions, Conditions Governing Business and Reporting Parts of the PRA Rulebook) as well as each PRA SS below (as amended), are key to the application of the MA in the UK as follows:

- **Solvency II: Matching Adjustment (PRA SS7/18):**[299] The scope of this PRA SS includes the assessment of eligibility for assets and liabilities, demonstrating compliance with the matching conditions, calculation of the MA benefit, ongoing management and compliance of MA portfolios, applications for MA approval and subsequent changes to an MA portfolio, and the implication of changes to an MA portfolio that are outside the scope of an existing MA approval.
- **Solvency II: Internal Models — Modelling of the Matching Adjustment (PRA SS8/18)**:[300] This PRA SS sets out the PRA's expectations of (re)insurers regarding the application of the MA within the calculation of the SCR.
- **Solvency II: Illiquid Unrated Assets (PRA SS3/17)**:[301] This PRA SS sets out the PRA's expectations in respect of (re)insurers investing in illiquid, unrated assets within their MA portfolios and is relevant to life insurance and reinsurance undertakings holding or intending to hold unrated assets.

Additionally, many of the PRA's proposed reforms became effective on 30 June 2024, following PRA PS10/24, which published the PRA's final policy on the MA (for the time being). These reforms are discussed in Section 10 below.

[298] PRA CP19/23 (as amended by the PRA PS10/24).

[299] PRA SS7/18 (as amended by the PRA PS10/24).

[300] PRA SS8/18 (as amended by the PRA PS10/24).

[301] PRA SS3/17 (as amended by the PRA PS10/24).

3. Matching Adjustment-Eligible Liabilities

Solvency II

Only certain liabilities are eligible for MA treatment:[302]

- They must be life (re)insurance obligations, including annuities.
- The portfolio of (re)insurance obligations to which the MA is applied must be identified, organised and managed separately from the other obligations of the undertaking.
- The contracts underlying the (re)insurance obligations must not give rise to future premium payments.
- The only underwriting risks connected to the portfolio of (re)insurance obligations are longevity risk, expense risk, revision risk and mortality risk.
- The contracts underlying the portfolio of (re)insurance obligations include no surrender options for the policyholder or only a surrender option where the surrender value does not exceed the value of the assets, valued in accordance with Article 75 of the Solvency II Directive (transposed in the Valuation Part of the PRA Rulebook), covering the (re)insurance obligations at the time the surrender option is exercised.
- The (re)insurance obligations of a (re)insurance contract must not be split into different parts when composing the portfolio of (re)insurance obligations.

PRA Approach

In PRA SS7/18, the PRA set out its expectations in relation to the liability eligibility conditions in Article 77b of the Solvency II Directive and takes a view in respect of the following (amongst other things):[303]

Must not give rise to future premium payments

- **Deferred Premiums.** The PRA takes the view that insurance contracts that include an option for the premium to be paid as an initial sum followed by a series of further instalments are unlikely to satisfy the condition in Article 77b(1)(d).
- **Premium Adjustment Clauses.** The PRA takes the view that insurance contracts that include a premium adjustment clause that permits the initial premium to be adjusted post-contract inception are likely to satisfy the condition in Article 77b(1)(d) provided that the adjustment is made only to correct for an overpayment or underpayment of a defined premium and does not have the effect of varying the contract.

No policyholder options or only a surrender option

- **Surrender Options.** The PRA takes the view that, in the case of deferred annuity contracts that are subject to a right of surrender before the start of the annuity payments, the absence of a contract-level surrender basis does not necessarily disqualify the obligations for the purposes of Article 77b(1)(g).

See also the PRA reforms for extension of eligible liabilities summarised in Section 10 below.

[302] Article 77b of the Solvency II Directive (transposed in Paragraphs 6.1 to 6.4, Technical Provisions Part of the PRA Rulebook).

[303] PRA SS7/18 (as amended by the PRA PS10/24).

4. Matching Adjustment-Eligible Assets

Solvency II

The MA asset eligibility criteria are as follows:[304]

- The portfolio of assets assigned by the (re)insurer to cover the best estimate of the portfolio of (re)insurance obligations must consist of bonds and other assets with similar cash-flow characteristics over the lifetime of the obligations (except where the cash flows have materially changed).
- The assigned portfolio of assets must be identified, organised and managed separately from other assets of the undertaking.
- The expected cash flows of the assigned portfolio of assets must replicate each of the expected cash flows of the portfolio of (re)insurance obligations in the same currency and any mismatch must not give rise to risks that are material in relation to the risks inherent in the (re)insurance business to which the MA is applied.
- The cash flows of the assigned portfolio of assets must be fixed and cannot be changed by the issuers of the assets or any third parties, save that:
  - Inflation-linked assets are permitted provided that the assets replicate the cash flows of (re)insurance obligations which depend on inflation.
  - A right of the issuer or a third party to change the cash flows of an asset is permitted provided that the (re)insurer will receive sufficient compensation to allow it to obtain the same cash flows by reinvesting in assets of an equivalent or better credit quality.

PRA Approach

In PRA SS7/18, the PRA sets its expectations in relation to the asset eligibility conditions in Article 77b and takes a view in respect of the following (amongst other things):[305]

- **Bonds or Other Assets With Similar Cash Flow Characteristics:** The PRA takes the view that assets can be grouped into an MA asset portfolio, which in aggregate satisfies the requirement for “bonds or other assets with similar cash flow characteristics”. In this case, the PRA expects the relevant (re)insurer to indicate clearly where groups of assets need to be considered in aggregate to demonstrate these qualities.
- **Same Currency:** The PRA takes the view that, even if an individual asset in an MA asset portfolio is denominated in a currency different to the currency of the expected liability cash flows, this does not necessarily mean that such asset would fall short of satisfying the relevant condition in Article 77b(1)(c), provided that the MA asset portfolio in aggregate replicates the expected liability cash flows in the relevant currency. This includes, for instance, where a foreign currency bond with an appropriate currency swap is used in combination to generate a cash flow in the relevant currency.
- **Mixed Cash Flows:** The PRA takes the view that (re)insurers may potentially take into account an asset with both fixed and non-fixed cash flows (provided that the bond also meets the rest of the MA asset eligibility criteria). For instance, (reinsurers) may be able to demonstrate that the cash flows from callable bonds up to the first call date are fixed.

[304] Article 77b of the Solvency II Directive (transposed in Paragraphs 6.1 to 6.4, Technical Provisions Part of the PRA Rulebook).

[305] PRA SS7/18 (as amended by the PRA PS10/24).

- **Redemption or Termination Rights:** The PRA takes the view that certain categories of redemption or termination rights are less likely to undermine "the need for predictability of cash flows", further noting that, this would apply in particular where (i) issuer or third-party rights of early redemption or termination are solely triggered by events that are outside the control of the issuer, (ii) they cannot be avoided by such issuer or third party and (iii) where such events would arguably change the nature or substance of the underlying contract. This includes instances where:
  - The issuer of a corporate bond has a right of early redemption in the event of a tax change that results in the issuer having to pay additional amounts under the bond contract.
  - The issuer of an index-linked bond has a right of early redemption in the event the relevant index is no longer available.
- **Sufficient Compensation:** With regard to the fixed cash-flow requirement, the PRA takes the view that (re)insurers may be able to satisfy the "sufficient compensation" requirement spelled out above on the basis of an adequate contractual compensation clause, provided that the relevant (re)insurance cash flows would continue to be matched out of the assets acquired with the compensation payable.
- **Reinsurance Assets:** The PRA takes the view that reinsurance assets (and any other assets whose cash flows vary with the underlying underwriting risks) may be MA-eligible provided (re)insurers can demonstrate that:
  - Any variation in timing, duration or quantum of cash flows from the reinsurance asset is solely attributable to and reflects the variation in the timing, duration or quantum of cash flows of the underlying (re)insurance obligations that are covered by the reinsurance asset.
  - The cash flows of the reinsurance asset replicate the cash flows of the underlying (re)insurance obligations covered without giving rise to material mismatch risk.
  - The (re)insurance obligations that are covered under the reinsurance asset satisfy the MA liability eligibility conditions.
  - The reinsurance asset satisfies all MA asset eligibility conditions (other than the condition in Article 77b(1)(h)), including that it is structured in such a way that it produces bond-like cash flows.
  - The inclusion of the reinsurance asset in an MA portfolio is consistent with the assumptions underlying the MA, including the assumption that insurance and reinsurance undertakings will hold the matching assets to maturity.
- **Asset Restructuring:** The PRA recognises that (re)insurers may undertake certain risk transformation transactions in order to produce a portfolio of MA-eligible assets, noting that (re)insurers that engage in such restructuring should discuss their plans with their supervisor at the earliest opportunity and should also be considering contingency options in case it is not possible to transform the asset cash flows in a way that meets the MA asset eligibility criteria. Accordingly, UK market participants have restructured a diverse range of income streams into the MA-grade assets often by means of quasi-securitisation-like structures. In this way, revenues from ERM portfolios (for example) with maturities similar to/matching the obligations to the insureds have been restructured by means of securitisation to meet the "fixed cash flow" requirement.

See also the PRA's reforms in relation to highly predictable and sub-investment grade (SIG) assets summarised in Section 10 below.

5. Calculation of the Matching Adjustment

General

Solvency II

The MA is calculated for each currency in accordance with the following principles:[306]

- The MA must be equal to the difference of:
  - The discount rate that, where applied to the cash flows of the portfolio of (re)insurance obligations, results in a value that is equal to the market value[307] of the portfolio of assigned assets.
  - The discount rate that, where applied to the cash flows of the portfolio of insurance and reinsurance obligations, results in a value that is equal to the value of the best estimate of the portfolio of (re)insurance obligations where the time value of money is taken into account using the basic RFR term structure (*i.e.*, the relevant RFR term structure without (i) an MA, (ii) a volatility adjustment (VA) or (iii) an RFR transitional measure).[308]
- The MA must not include the fundamental spread (FS) — discussed below — reflecting the risks retained by the (re)insurer.
- The FS must be increased to ensure that the MA for assets with SIG quality does not exceed the MA for assets of investment grade (IG) quality and the same duration and asset class.
- The use of external credit assessments in the calculation of the MA must be in accordance with Article 111(1)(n) of the Solvency II Directive.

In addition, the Level 2 Delegated Regulation provides that for the purpose of the calculation of the MA:[309]

- Insurance and reinsurance undertakings must only consider assets whose expected cash flows are required to replicate the cash flows of the (re)insurance obligations.
- The expected cash flows of the relevant assigned assets should be adjusted to allow for the probability of default element of the FS.
- The deduction of the FS in accordance with Article 77c(1)(b) of the Solvency II Directive must only include the portion of the FS not already reflected in the adjustment to the cash flows of the assigned portfolio of assets referred above.

Risk-Free Interest Rate

Solvency II

A (re)insurer must, in setting technical provisions under Article 77(1) of the Solvency II Directive, calculate its best estimate of the probability-weighted average of future cash flows, taking account of the time value of money (expected present value of future cash flows), using the relevant RFR.[310] This is calculated as follows:

[306] Article 77c(1) of the Solvency II Directive.

[307] Article 75, *ibid* (transposed in Paragraphs 2.1 and 2.2, Valuation Part of the PRA Rulebook).

[308] Article 1(36) of the Level 2 Delegated Regulation.

[309] Article 53, *ibid*.

[310] Article 77(2) of the Solvency II Directive (transposed in Paragraph 3.1, Technical Provisions Part of the PRA Rulebook).

- The EIOPA is required to publish for each relevant currency on a quarterly basis a relevant RFR term structure for these purposes.[311]
- The EIOPA is to derive the basic RFR for each currency and maturity on the basis of interest swap rates for interest rates of that currency, adjusted to take account of credit risk.[312]
- For maturities where interest swap rates are not available from "deep, liquid and transparent"[313] financial markets, the EIOPA must derive the basic RFR, for each currency, on the basis of the rates of government bonds issued in that currency, adjusted to take account of the credit risk of the government bonds, provided that such government bond rates are available from "deep, liquid and transparent" financial markets.

PRA Approach

In the UK, the PRA is similarly responsible for calculating and publishing the relevant RFR term structure.[314]

Fundamental Spread

The FS captures the credit spread corresponding to (i) the probability of default and (ii) the expected loss resulting from the downgrading of MA assets, and operates to restrict the scope of the MA.

Solvency II

The EIOPA is responsible for publishing each relevant duration, credit quality and asset class of an FS for the calculation of the MA. In addition, the Level 2 Delegated Regulation provides that for the purpose of the calculation of the FS:[315]

- The FS must be calculated in a "transparent, prudent, reliable and objective" manner that is consistent over time, based on relevant indices where available.
- The calculation of the credit spread referred to in Article 77c(2)(a)(i) of the Solvency II Directive shall be based on the assumption that in case of default 30% of the market value can be recovered.
- The long-term average referred to in Article 77c(2)(b) and (c) of the Solvency II Directive must be based on data relating to the last 30 years, and where such data is not available, constructed data based on prudent assumptions.
- The expected loss referred to in Article 77c(2)(a)(ii) of the Solvency II Directive must correspond to the probability-weighted loss the (re)insurer incurs where the asset is downgraded to a lower credit quality step and is replaced immediately afterward (assuming that the replacing asset (i) has the same cash flow patterns as the replaced asset before downgrade, (ii) belongs to the same asset class as the replaced asset and (iii) has the same credit quality step as the replaced asset before downgrade or a higher one).

[311] Article 77e(1)(a), *ibid.*

[312] Article 44(1) of the Level 2 Delegated Regulation.

[313] Article 44(1), *ibid.*

[314] Regulation 3 of the Insurance and Reinsurance Undertakings (Prudential Requirement) Regulations 2023.

[315] Article 54(1) of the Level 2 Delegated Regulation.

PRA Approach

The PRA is responsible for calculating and publishing the FS in the UK.[316] The FS must be:[317]

- Equal to the sum of:
  - The credit spread corresponding to the probability of default of the assets.
  - The credit spread corresponding to the expected loss resulting from downgrading of the assets.
- For exposures to the UK's central government and central bank, no lower than 30% of the long-term average of the spread over the RFR of assets of the same duration, credit quality and asset class, as observed in financial markets.
- For assets other than exposures to the UK's central government and central bank, no lower than 35% of the long-term average of the spread over the RFR of assets of the same duration, credit quality and asset class, as observed in financial markets.

The probability of default referred to above shall be based on long-term default statistics that are relevant for the asset in relation to its duration, credit quality and asset class.

Where no reliable credit spread can be derived from the default statistics, the FS shall be equal to the portion of the long-term average of the spread over the RFR.

The PRA has recently reformed the FS in the UK as part of its Solvency UK project, to make the FS more sensitive and tailored so that it better measures credit risk (see Section 10 below).

6. Management of a Matching Adjustment Portfolio

Solvency II

The portfolio of (re)insurance obligations to which the MA is applied and the assigned portfolio of assets must be "identified, organised and managed" separately from other activities of the undertakings, and the assigned portfolio of assets cannot be used to cover losses arising from other activities of the undertakings.[318]

A portfolio of assets must be assigned to cover the relevant liabilities with such assignment being maintained over the lifetime of the obligations, except for the purpose of maintaining the replication of expected cash flows where the cash flows have materially changed.[319]

PRA Approach

In PRA SS7/18, the PRA sets its expectations in relation to the management of an MA portfolio as follows (amongst other things):

[316] Regulation 3 of the Insurance and Reinsurance Undertakings (Prudential Requirement) Regulations 2023.

[317] Article 77c(2) of the Solvency II Directive.

[318] Article 77b(1)(b), *ibid.*

[319] Article 77b(1)(a), *ibid.*

Identified, organised and managed separately

- All (re)insurers must demonstrate that separate processes have been put in place relating to accounting systems, investment policy and mandates, processes and controls (including controls to ensure that assets within the portfolio will not be used to cover losses arising elsewhere), governance and management information.
- The notional splitting of assets (*e.g.*, individual derivative contracts) between MA and non-MA portfolios, as well as the management of derivatives forming part of an MA portfolio at a level higher than the level of that MA portfolio is unlikely to be consistent with Article 77b(1)(b) of the Solvency II Directive.

Maintained over the lifetime of the obligations except for replication purposes

- The investment policy for the assets in an MA portfolio must principally be based on a buy-to-hold strategy, and any asset rebalancing in an MA portfolio is for the purposes of good risk management (*e.g.*, changes in expectations of future asset cash flows).
- (Re)insurers must (i) in their applications for MA treatment explain the process by which they will maintain an MA portfolio on an ongoing basis, and (ii) have a robust governance process around any extraction of surplus.

Ongoing MA compliance and changes to the MA portfolio

- (Re)insurers must have robust processes in place to ensure that their existing approved MA portfolios satisfy the MA criteria on an ongoing basis. The PRA provides the following examples where (re)insurers must consider whether a new MA application is required, noting that in the first instance this should be a judgement made by the (re)insurer itself:
  - Restructuring, mergers or disposals.
  - The entry into new, or changes to existing, reinsurance and other risk transfer arrangements.
  - Changes to the way a (re)reinsurer maintains and manages its MA portfolio.
  - Changes to the scope of an MA portfolio, including the addition or removal of MA assets or liabilities and changes to the features of any MA asset or liability covered by the original application.

7. Noncompliance With the Matching Adjustment Criteria

Solvency II

Where a (re)insurer:[320]

- That applies the MA is no longer able to comply with the MA criteria, it must “immediately” (i) inform the regulator and (ii) take any necessary measures to restore compliance with the MA criteria as soon as possible.
- Is not able to restore compliance with the MA criteria within two months of the date of noncompliance:
  - It must cease to apply the MA and must not apply the MA for a period of a further 24 months.
  - The regulator must revoke the MA approval granted to that (re)insurer.

[320]Article 77b(2), *ibid.*

PRA Approach

In PRA SS7/18,[321] the PRA sets its expectations in relation to a possible breach of the MA criteria and takes a view in respect of the following:

- (Re)insurers must have appropriate processes in place to identify and investigate any potential breaches of the MA criteria "on a timely basis" and engage with the PRA as soon as possible where there is a risk that the MA criteria will be breached.
- In cases where a breach is reasonably only determined after the date it has occurred (whether identified by the (re)insurer or notified to the (re)insurer by the PRA), the two-month period to restore compliance starts from the point at which the breach is detected or confirmed to have happened.

Please also see Section 10 below.

8. Internal Models — Modelling of the Matching Adjustment

PRA Approach

In PRA SS8/18, the PRA set out its expectations of (re)insurers using full or partial IMs regarding the application of the MA within the calculation of the SCR. The PRA's starting point in this analysis is that a (re)insurer's SCR must capture all material and quantifiable risks to which that (re)insurer is exposed and, therefore, the calculation of the SCR must allow for any changes to the FS (and therefore the MA) following a stress event. The PRA further notes that (re)insurers must:

- Determine the risks to which their MA portfolio is exposed and how these risks could affect the FS (and therefore the MA).
- Assess how this impact is captured within their SCR calculation.
- Ensure that their modelling approach results in an SCR that covers risks that have been retained within their MA portfolio at the 99.5% confidence level.

To assist (re)insurers in exhibiting and validating that their modelling approach covers all material and quantifiable risks to which their MA portfolio is exposed, the PRA has developed a framework that sets out how the MA could be considered in the context of the SCR calculation, noting that it would be "good practice" for (re)insurers to reconcile their approach with the steps in the framework in their IM documentation. The following five steps comprise the PRA's relevant framework:

- **Step 1:** Revalue the MA portfolio assets under a one-year stress.
- **Step 2:** Calculate updated FS values, reflecting the stress-modelled economic environment.
- **Step 3:** Verify whether the MA criteria are still met (allowing also for any changes in liability cash flows/values).
- **Step 4:** If Step 3 has failed then the cost of reestablishing an MA-compliant positing must be estimated.
- **Step 5:** Recalculate the MA (this may need to be based on a rebalanced MA asset portfolio).

In addition to the above, PRA SS8/18 also contains the PRA's more detailed expectations as to how the MA should be reflected within the SCR calculation grouped under the following three sub-headings:

[321] PRA SS8/18 (as amended by the PRA PS10/24).

- Impact of a one-year stress on the MA.
- Maintaining compliance with the MA requirements in stress conditions.
- Validation of the amount of MA assumed in the SCR calculation.

9. Illiquid Unrated Assets

PRA Approach

In PRA SS3/17 the PRA set out its expectations in respect of illiquid, unrated assets (including restructured ERMs) within (re)insurers' MA portfolios. The PRA's starting point in this analysis is that (re)insurers applying for MA treatment are required as part of their MA applications to explain how they will categorise the assets in their MA portfolios in terms of credit quality step, asset class and duration for the purpose of determining the FS (and therefore the size of the MA claimed), appreciating that (re)insurers' judgements in respect of such grouping of assets will be more important, given the degree of discretion involved, for internally rated assets (*i.e.*, assets without credit ratings assigned to them by external credit assessment institutions) as opposed to externally rated assets (*i.e*., assets with credit ratings assigned to them by external credit assessment institutions).

Internal credit assessments used as part of determining the FS

The PRA provides an indicative list of areas to be implemented and documented by (re)insurers to evidence the robustness of their internal credit assessment processes[322]:

- **Risk Identification:** Identifying the risks affecting an asset and assessing how the (re)insurer has satisfied itself that it has considered all potential sources of risk (both systemic and idiosyncratic) in its internal credit assessment must at a minimum include consideration of the following factors:
  - External market factors.
  - Cash-flow predictability.
  - Collateral.
  - Loan characteristics (*e.g.*, refinancing risk).
  - Legal, political and regulatory risks.
  - Potential future risks (*e.g.*, impacts arising from climate change risks).
- **Internal Credit Assessment Methodology Criteria:** The (re)insurer's internal credit assessment methodology and criteria must:
  - Set out the overall credit assessment philosophy and the ratings process.
  - Set out the scope of types of loans or entities the methodology applies to.
  - Set out the scope of risks covered and define the credit and other relevant risks being measured.
  - Where an external credit assessment institution has a published credit rating methodology for an asset class, have in scope at least the same range of risks, qualitative and quantitative factors and risk mitigating considerations or justify any difference in the scope.
  - Describe how different loan features, risks and other relevant factors are assessed.

[322] PRA SS3/17.

  - Set out the key assumptions and judgements underlying the assessment, including the treatment of assumed risk mitigating actions which rely on the (re)insurer's own or outsourced processes involved in managing assets through their life cycles.
  - Define whether the credit assessment is calibrated to a point in time or through the cycle.
  - Use both qualitative and quantitative factors.
  - Explain the limitations of the internal credit assessment (*e.g.*, risks that are not covered) and when it would not be appropriate to allow for these limitations by overriding judgements.
- **Data:** (Re)insurers must consider the availability, appropriateness and quality of data over the credit cycle on which their internal risk assessments and calibrations are based, as well as document how they allowed for any incomplete or missing data in their internal credit assessments.
- **Expert Judgements:** Expert judgements made in the determination of the internal credit assessment and credit quality step mappings must be transparent, justified and well documented.
- **Expertise and Potential Conflicts of Interest:** The credit rating methodology and criteria development and approval, credit assessment and credit quality step mappings must be performed by individuals (whether internal or external to the (re)insurer) with relevant asset-specific credit risk expertise and competency who are independent and with minimised conflicts of interest.
- **Validation:** (Re)insurers must undertake validation of the internal credit assessment methodology and criteria (including how they have identified and allowed for all sources of credit risk).
- **Ongoing Appropriateness:** (Re)insurers must have a robust process for the ongoing review of the credit assessments and credit quality step mappings (including how they have satisfied themselves that these will remain appropriate over the lifetime of the assets and operate robustly under a range of different market conditions and operating experience).
- **Process Improvements:** (Re)insurers must identify potential refinements needed to their methodology by monitoring their own credit experience against the internal credit assessments and changes made by external credit assessment institutions.

Internal credit assessment processes for restructured assets (including ERMs)

In addition to the above, the PRA sets its expectations in respect of internal credit assessment processes for restructured assets (including ERMs), noting the following (amongst other things):

- Internal credit assessments for restructured assets must be anchored on a risk analysis of the legal documentation among all parties concerned (*e.g.*, in the case of restructured ERMs, this must include a risk analysis of the original loan agreement between the borrower and the lender, the contract between the originator and the insurance (re)insurers and the legal structure of the notes issued by the SPV as applicable).
- In respect of ERMs, (re)insurers must explicitly consider the following quantitative features:
  - Underwriting terms of the underlying ERMs (*e.g.*, prepayment terms, interest rate at which the loan will accrue, conditions attaching to the borrowers and conditions attaching to the property).
  - Exposures (*e.g.*, loan-to-value ratios, ages of borrowers and health of borrowers).
  - Strength of security (*e.g.*, location, state and concentration of the properties used as collateral and rights of the SPV to substitute underlying ERMs).

- Leverage, including a full analysis of the cash flow waterfall between the loan receivables and the cash flows paid to the senior noteholder.
- Stress and scenario testing of the amount and timing of receivables, for instance as a result of (i) changes in the value of the properties that collateralise the ERMs, both in the immediate and longer term, including allowance for additional costs (*e.g.*, dilapidation costs and transaction costs relating to sales), (ii) demographic risks relating to the borrowers under the ERMs (*e.g.*, longevity trend and volatility, and morbidity) and (iii) prepayment risk.

- Where a (re)insurer has restructured an asset into a range of tranches, the spread on a given tranche must be commensurate with the level of risk to which that tranche is exposed.
- (Re)insurers must carefully justify any reliance on credit-enhancing or liquidity-enhancing features, taking into account the availability of these facilities over the expected lifetime of the SPV.

10. PRA Reforms to the Matching Adjustment

On 27 September 2023, the PRA issued its first substantive consultation, PRA CP19/23, on the detail of its proposed changes to the MA. The wide-ranging proposals contain therein marked a substantial relaxation of the Solvency II Directive's requirements around which (fixed) assets are eligible for inclusion in an MA portfolio, and the (narrow) scope of liabilities that they can be held against. Such proposals were tempered, however, by increased governance on the part of (re)insurers, including principles-based judgements, as well as a hard attestation from the (re)insurer's chief financial officer (or other senior officer) that they have a "high degree of confidence" that the MA assets will deliver the intended result.

The consultation closed on 5 January 2024. Subsequently, on 6 June 2024, the PRA published PRA PS10/24, in which it affirmed or amended many of the most consequential proposals laid out in PRA CP19/23 and in the aforementioned PRA SSs. As of 30 June 2024, these final policies are effective and can be leveraged by (re)insurers using the MA, whilst all other changes related to the Solvency II review will take effect on 31 December 2024. The key new elements of the regime are summarised below.

Matching Adjustment Asset Eligibility for Assets That Are Highly Predictable

The new framework moves away from a requirement for the MA to be applied only to fixed income assets to allow for the limited inclusion within an MA portfolio of assets with HP cash flows (*i.e.*, with cash flows that are capable of being changed by the issuers of the assets or third parties) provided such assets do not represent more than 10% of the total MA benefit claimed by the relevant (re)insurer. Such HP assets must:

- Be contractually bound as to timing and amount of cash flows (with failure to pay constituting a default event).
- Be "bonds or other assets with similar cash flow characteristics".
- Have a credit quality capable of assessment through a credit rating or internal credit assessment of comparable standard.

Where the relevant contracts do not specify an upper limit on the cash-flow amounts (*e.g.*, leases with "upward only rent increases"), the PRA considers that the upper bounding of cash-flow amounts may be determined through appropriate assumptions for the rate of any future escalation.

The PRA recognises that it will not always be clear whether an asset should be classified as having fixed or HP cash flows. In these cases, (re)insurers are prohibited from "decomposing" any asset within the MA portfolio into distinct fixed and HP cash flow components. Instead, as a whole the PRA provides that it may be reasonable for (re)insurers to change the classification of their assets, as a whole, from having fixed cash flows to having HP cash flows and vice versa where:

- The (re)insurer has permission from the PRA to apply the new treatment for the given assets and manages the assets in accordance with that permission (including applying an FS addition where moving an asset from fixed cash flows to HP cash flows and considering attestation implications of the move).
- Movements from one classification to the other are subject to the (re)insurer's policies on managing the MA portfolio such that they are subject to an appropriate level of governance and oversight by the (re)insurer.
- The (re)insurer justifies any frequent movements in classification.
- The (re)insurer carefully considers the operational implications of effecting different movements in classifications to distinct holdings of the same asset, before effecting such movements.

The PRA will continue to permit certain non-fixed cash-flows to be treated as "fixed" (rather than HP), and hence will continue to allow changes related to inflation indices and changes to cash flows for which suitable compensation is paid (*i.e.*, leaving available the 10% allowance for HP assets). The PRA does, however, foresee that assets that were restructured to meet current MA requirements may be "unrestructured" to fall within the looser HP regime (albeit still requiring approval), and indeed reiterates its expectation (from PRA SS7/18) that such assets should be included "directly" where possible. Even if the assets remain in "securitised" form, the value of any residual interest should not be greater than what would have applied to the underlying assets in "unsecuritised" form.

In any case, the PRA expects (re)insurers to include MA eligible assets, regardless of whether they are classified as having fixed or HP cash flows, in MA portfolios without restructuring. Where (re)insurers do restructure their assets to ensure MA compliance, the aggregate value of the restructuring arrangements — including any MA benefit arising therefrom — should not generally exceed the value that would otherwise have been created if (re)insurers included the assets directly in their MA portfolios without restructuring. Furthermore, (re)insurers who adopt restructuring arrangements must explain the rationale for restructuring their assets, how any resulting MA benefit has arisen and how they are satisfied that the resulting MA benefit is appropriate, and demonstrate that any such benefit has been created on an arm's-length basis.[323]

For HP assets, the PRA builds on the matching tests set out in PRA SS7/18, to deal with the new risks introduced by inclusion of HP assets, for example, as follows:

- Cash flows being received earlier (or later) than expected, for example where a callable bond is redeemed earlier (or later) than expected.
- Cash flows of a different amount being received than what was expected, for example where coupons are linked to the achievement of environmental impact targets.
- Future contractual payments to the borrower being of different amounts and/or timing than expected, for example from a lease related to the completion of a construction project.

[323] Paragraph 2.55B of the PRA SS7/18 (as inserted by the PRA PS10/24).

The decision on whether to take a deterministic or statistical approach when projecting HP cash flows may not always be clear cut, and the PRA has given examples of scenarios where it could be appropriate to take a deterministic approach:

- An infrastructure project where the project sponsor can prepay in the event of construction failure.
- Limited holdings of callable bonds where the option is significantly in (or out of) the money and a "yield to worst" approach has been taken.

(Re)insurers should make proposals for management of the aforementioned risks in their MA applications to the PRA, including ideally modelled distribution of losses arising from HP assets. It will also provide substantial guidance to assist (re)insurers in this. The PRA will launch a verification process for MA applications ensuring (re)insurers are held responsible for their MA, backed by an FS that aligns with their MA portfolio's inherent risks.

For HP assets, the PRA proposes a "yield to worst" projection, and where the asset can be repaid early, with a typical worst-case outcome being a minimum MA benefit of zero, but subject to a consideration of the prevailing operating conditions.

The FS should reflect all risks retained by (re)insurers under the MA, principally credit risk but also the repayment, reinvestment and liquidity risk that results from an HP approach, for which the PRA proposes a minimum level of 10 basis points.[324] It also makes clear that the additional risks due to a lack of "fixity" should not give rise to an MA benefit; rather, that part of the spread that arises from lack of fixity should be part of the FS.[325]

The PRA has also incorporated a criterion for MA eligibility that mandates (re)insurers to showcase their adherence to the Solvency II prudent person principle (PPP). Compliance with the PPP means that (re)insurers will need to determine internal quantitative investment limits for types of assets in which they are proposing to assets to invest.

Sub-Investment Grade Assets

The PRA has increased the allowance of SIG assets in an MA portfolio by removing the current cap and modifying expectations around the management and modelling of SIG assets. These adjustments aim to promote investments that hover around the threshold between IG and SIG assets. That said, the PRA expects that any investment in SIG assets will remain limited given that annuity policyholders do not necessarily benefit from the higher yield on these products, and states that these should remain at prudent levels. (Re)insurers will be required to account for the risk of market conditions downgrading investment asset holdings from IG to SIG. In line with the PPP, the PRA also considers that (re)insurers should only invest in SIG assets to the extent that they have an effective risk management system for the risks particular to these assets.

Extension of the Categories of Insurance Liabilities Eligible for Matching Adjustment

The PRA's reforms also expand the scope of liability portfolios that may benefit from the MA. These now include in-payment income protection claims, including recovery time risk (*i.e.*, the risk that income protection policyholders take longer to recover from sickness than the (re)insurer's best estimate

[324] Paragraph 5.20 of the PRA SS7/18 (as amended by the PRA PS10/24).

[325] Paragraph 2.44 of the PRA CP19/23 (as affirmed by the PRA PS10/24).

projection). This is a significant extension of the MA to a new business line, which may produce significant capital benefits in the relevant market. The extension also now permits the guaranteed components of with-profits annuities to be included in an MA portfolio, (but with the non-guaranteed elements remaining outside). Although unlikely to have a significant impact on the market overall, this will likely assist the limited number of providers of these specialised products.

Implementing a More Efficient Matching Adjustment Application Procedure Tailored to Specific Assets

The PRA has also optimised its MA application processes to help (re)insurers respond to investment opportunities more swiftly. Specifically, the PRA has set itself a target of six months for decisions on MA applications, and intends to develop another timeline for the completion of streamlined reviews,[326] which the PRA expects to be shorter than the aforementioned six-month timeline.[327]

A More Balanced Approach to Matching Adjustment Condition Breaches

The PRA has retained the two-month compliance restoration period (noting that minor breaches should not necessarily impose a restriction on the MA's application).[328] However, to promote flexibility, where compliance is not restored within this window, (re)insurers may reduce the MA in a staggered fashion, rather than face immediate termination of their MA permission (as the previous framework required). The PRA has set out that this reduction should be at least 10% of the unadjusted MA, increasing by 10% for each month of noncompliance following the two-month window. Where the MA has been reduced to zero, the PRA expects to revoke the permission to apply the MA. Were the (re)insurer to restore compliance during the reduction period the restriction would be rescinded, subject to PRA confirmation. Additionally, a (re)insurer that applies such reductions as a result of a breach of the MA eligibility conditions is not expected by the PRA to recalculate the SCR to reflect the reductions.[329]

Matching Adjustment Attestation

The PRA requires the following formal statement be made on an annual basis by the chief financial officer (or other relevant senior manager) of a (re)insurer: "*The fundamental spread used by the firm [(re)insurer] in calculating the matching adjustment reflects compensation for all retained risks, and the matching adjustment can be earned with a high degree of confidence from the assets held in the relevant portfolio of assets*."[330]

The attestation must be given, for each MA portfolio within the (re)insurer, annually, with the effective date aligned to the (re)insurer's solvency and financial condition report (SFCR), and upon any material change in the (re)insurer's risk profile. The PRA notes that the reference to "compensation" refers not just to the illiquidity premium, but also higher spread related to barriers to entry, or specialist skills in sourcing and developing a relevant asset.[331] The PRA considers that the reference to "high degree of confidence" requires the MA to be materially more certain than a 50% percentile or best estimate basis.[332]

[326] Paragraph 5.9 of the PRA PS10/24.

[327] Paragraph 4.2 of the PRA SS7/18.

[328] Paragraph 8.1B, *ibid* (as inserted by the PRA PS10/24).

[329] Paragraph 8.1G, *ibid.*

[330] Paragraph 6.15 of the PRA CP19/23 (as affirmed by the PRA PS10/24).

[331] Paragraph 6.17, *ibid.*

[332] Paragraph 6.20, *ibid.*

A new senior management function holder will have prescribed responsibility for the (re)insurer's financial information and regulatory reporting and must be responsible for the attestation.[333] A policy on providing the attestation must be established and maintained by (re)insurers, as well as appropriate internal processes. This statement will arguably generate much attention within a (re)insurer, with the relevant individual looking to bolster their position, likely with the support of actuarial advisers. This may lead to interesting discussions as to whether the related liability provisions operate to mitigate impact of potential regulatory sanctions. The PRA does, however, acknowledge that responsibility for different elements of the statement may be delegated, and that ultimate responsibility for the attestation may be shared by two or more senior individuals.

Matching Adjustment Asset and Liability Information Return

The PRA also set out a new annual reporting requirement requiring (re)insurers to provide portfolio metrics and detailed information on the assets and liabilities held in their MA portfolios, standardising the data that (re)insurers provide to the PRA concerning their MA portfolio's assets and liabilities.

[333] Paragraph 6.25 of the PRA SS7/18 (as affirmed by the PRA PS10/24).