



Financial Reporting Council

AS TM1: Statutory Money Purchase Illustrations

**Feedback statement and Impact
Assessment**

October 2022

The FRC does not accept any liability to any party for any loss, damage or costs howsoever arising, whether directly or indirectly, whether in contract, tort or otherwise from any action or decision taken (or not taken) as a result of any person relying on or otherwise using this document or arising from any omission from it.

© The Financial Reporting Council Limited 2022

The Financial Reporting Council Limited is a company limited by guarantee.
Registered in England number 2486368. Registered Office:
8th Floor, 125 London Wall, London EC2Y 5AS

Contents

	Page
1 Executive summary	3
2 Introduction	7
3 Summary of responses to the CP	8
4 Impact assessment	9
5. Analysis of Response to the Consultation	12
Appendix A – Summary of amendments to Exposure Draft of AS TM1 in response to feedback	39

1 Executive summary

- 1.1 The FRC received a wide-ranging response to our proposed changes to AS TM1, both in written feedback and through outreach activities with a wide range of stakeholders. This executive summary draws out the key areas we received feedback on and highlights the main amendments made to the exposure draft of AS TM1 v5.0.
- 1.2 Appendix A contains a full list of amendments to the exposure draft of AS TM1 v5.0 and the further information included in new AS TM1 guidance.

Accumulation rates: Volatility-based approach (sections 5.12 - 5.50)

- 1.3 The current AS TM1 allows a large degree of judgement by providers of SMPs to determine the accumulation rate assumption. To improve consistency across projections, the FRC proposed using a volatility-based approach to classify funds for the purpose of assigning a prescribed accumulation rate. This is an innovative method and a significant departure from the current standards. As a result, we anticipated a significant level of feedback from the industry.
- 1.4 Although stakeholders have challenged the use of a volatility-based approach, there is no clear consensus on a better alternative that would support the objective of providing stakeholders with consistent and reliable information, and we recognise that any approach to producing illustrations provides challenges.
- 1.5 The main alternative approaches suggested by respondents, as considered as part of our consultation, present their own challenges:
 - A single projection rate ignores the key factor determining expected returns, being the assets held within the defined contribution (DC) fund. Consistency would be achieved at the expense of the reliability of the projections produced.
 - Whilst a number of respondents suggested an asset-class approach as the preferred alternative, there is no consensus in their responses on the categorisation method under this approach. This suggests that an asset-class approach that allows some level of judgement would not achieve the required consistency between providers. To achieve the consistency required, the asset-class approach would likely need to be prescribed to such a degree that would make implementation complex and expensive for providers.
- 1.6 Recognising the concerns raised by industry on the proposed volatility-based approach, we have taken a number of actions to amend the proposed method to address implementation challenges or provide clarity on how the proposed method is intended to be implemented.
- 1.7 Some respondents (including most providers of Self Invested Personal Pensions (SIPPs) who responded) anticipated difficulties in implementing the proposed approach due to the complexity and individualisation of the funds involved. We have made amendments to the

approach to allow, in limited circumstances, funds to be classified as volatility group 3 where volatility cannot be reasonably or meaningfully determined. These circumstances are set out in the guidance.

- 1.8 A number of respondents raised concerns on the challenges of communication of the volatility approach to users of SMPs and pensions dashboards, citing the difficulty in explaining the concept of volatility to the public. While we recognise the challenges of communicating the mechanics of the calculation to users, we consider it sufficient and more effective to communicate the concept of the classification of funds (and thereby the prescribed accumulation rate) based on the level/categories of risks rather than the mechanics of the calculation, much akin to the communication on Synthetic Risk and Reward Indicator (SRRI) which is used to indicate the level of risk of a UCITS fund.
- 1.9 Further, we consider any projection approach where the accumulation rates reflects the characteristics of the underlying funds will raise communication challenges. An asset-class approach would also lead to similar questions of why a certain fund type has higher expected returns. These are not significantly greater when the expected returns are connected to the risk grouping of the fund under a volatility-based approach. We intend to work with the pension providers, and with the Pensions Dashboards Programme to support the communication of these changes to users. However, we believe that this approach will best support the objective of providing the public who will use pensions dashboards with consistent and reliable information.
- 1.10 Some respondents raised concerns around the need to change existing calculation systems to follow the calculation methodology set out in the standards. Paragraph A.1.2 of AS TM1 allows alternative approaches to be used where they produce materially similar results. We have made amendments to the exposure draft to clarify that this also applies to alternative methods for aggregating multiple pooled funds.

Accumulation rates: unquoted assets (sections 5.84 - 5.91)

- 1.11 In the consultation, we proposed a zero real growth rate (or 2.5% nominal growth rate) for unquoted assets as a pragmatic solution, and sought suggestions on how we could better reflect the value of unquoted assets fairly but robustly, with evidence to support such views.
- 1.12 Responses to the consultation generally disagreed the proposed zero real growth, suggesting that it was not reflective of the real growth potential of these investments and that it might limit aims to encourage future illiquid investment. However, only limited data was provided to evidence a higher growth assumption being reasonable, and only anecdotal information was provided on the types and mix of unquoted assets being held in DC pension funds.
- 1.13 However, our outreach has led us to the following:
- We understand a proportion of these unquoted assets are property, where there is clear consensus in the market that it will typically return a positive real rate of growth

in the long term. Our technical analysis also shows that returns on property funds have been broadly consistent with returns for funds falling in volatility group 3.

- Further information was made available to us that shows past returns which are significantly above inflation for a range of illiquid investments over a 20-year period.

1.14 On this basis, we have made amendments to the approach such that unquoted assets will be classified as volatility group 3 for the purpose of determining the accumulation rate. We consider this to be a simple approach that captures the return potential of many of the major unlisted asset types.

Accumulation rates: timing of annual review (sections 5.70 - 5.79)

1.15 In the consultation we proposed accumulation rates should be calculated annually as at 31 December. In finalising AS TM1 v5.0 we have amended the date for performing the calculations annually from 31 December to 30 September.

1.16 The FRC will annually review the appropriateness of accumulation rates and volatility group boundaries. To preserve the linkage between the date to which this analysis is performed and the date to which the providers calculate the volatility groups, the date has been brought forward. This allows sufficient time for FRC to complete the review and then for the FRC to consult and finalise any changes to the boundaries under AS TM1 as a result of the review.

1.17 If the outcome of the annual review is such that the FRC identifies a need to revise AS TM1 because the accumulation rates and boundaries of the volatility groups are no longer appropriate, the FRC intends to publish a one-month consultation at the start of November. This will then allow the FRC to publish the revised AS TM1 by 15 February for application in the following financial year (6 April to 5 April). This timetable will apply from October 2023 alongside the effective date of AS TM1v5.0.

1.18 To ensure the accumulation rates and volatility group boundaries are appropriate for application from October 2023, the FRC will also perform an annual review in 2022/2023 with a possibility of revising these assumptions ahead of October 2023.

1.19 Proposals for any other changes to AS TM1 (in this or other areas) will continue to follow a longer consultation timeline.

Annuity basis (sections 5.100 - 5.139)

1.20 To achieve consistency in pension illustrations, it is necessary for AS TM1 v5.0 to prescribe the way in which a pension is converted into an income at retirement. There was general support for the annuity basis proposed by the FRC in consultation, except that a number of respondents argued for some allowance for pension increases in retirement.

1.21 Any single basis will have limitations, given the number of options available to members at retirement, and that practice is still evolving since the introduction of pension freedoms. We consider that an annuity basis currently is the most objective approach to follow while there

is no consensus on a sustainable drawdown rate, but also do recognise that drawdown is now more common than annuity purchase.

- 1.22 We consider the use of an increasing annuity basis would understate income relative to the much more common options of either drawdown or a level (non-increasing) annuity and therefore give an unbalanced picture of potential ERI. We therefore have finalised the form of annuitisation in AS TM1 v5.0 in line with the basis set out in the consultation paper. We intend, however, to keep this under review in future years, and work with industry to develop an acceptable model which may better reflect the decumulation options being taken in the future.
- 1.23 Some responses noted that the Exposure Draft did not mention an assumed guaranteed period for the annuity. We have amended the requirements to include a 5 year guarantee period.

Annuitisation within 2 years of retirement (sections 5.140 - 5.149)

- 1.24 A number of responses highlighted the challenges for some occupational pension schemes of obtaining market-based annuity rates in producing pension illustrations within 2 years of retirement. It was also highlighted that without personalising the annuity quote, this approach does not provide better information for users, the majority of whom will not buy an annuity.
- 1.25 We acknowledge that only a small proportion of individuals will take an annuity at retirement, and so there is little benefit for users in mandating such approach when this will create significant burden on providers. We have therefore removed the requirement to consider market-based annuity rates for illustrations produced within 2 years of retirement.

Guidance

- 1.26 Through the feedback to the consultation and outreach activities, respondents have asked for more detailed explanation and clarity on how the proposed changes would be applied in practice. The FRC has prepared guidance to sit alongside AS TM1 v5.0 to support providers in applying the revised standards.
- 1.27 Given the significance of the changes, the FRC intends to continue to engage with providers as providers implement the changes to AS TM1 ahead of the effective date. The FRC will continue to review this guidance in light of our findings through our engagement during the implementation period and will provide further guidance if other areas of uncertainty arise.

2 Introduction

Background

- 2.1 The Financial Reporting Council (“FRC”) is the UK's independent regulator responsible for promoting high quality corporate governance and reporting to foster investment. The FRC is responsible for setting technical actuarial standards in the UK.
- 2.2 Since 6 April 2003 money purchase pension arrangements have been required to provide members with Statutory Money Purchase Illustrations (“SMPIs”). These illustrations are governed by the [Occupational and Personal Pension Schemes \(Disclosure of Information\) Regulations 2013](#) as amended. Legislation requires that statutory illustrations are produced in accordance with guidance prepared by a prescribed body approved by the Secretary of State for Work and Pensions (“DWP”) and by the Department for Social Development in Northern Ireland.
- 2.3 The FRC has been the prescribed body since 6 April 2007 and fulfils its obligations through the publication of Actuarial Standard Technical Memorandum 1: Statutory Money Purchase Illustrations (“AS TM1”). AS TM1 specifies the assumptions and methods to be used in the calculation of statutory illustrations of money purchase pensions, also known as defined contribution (“DC”) pensions. The FRC reviews AS TM1 regularly.
- 2.4 Providers’ point of sale and ad hoc projections are subject to the assumptions set within Section 13 Annex 2 of the Conduct of Business Sourcebook (“CoBS13”) issued by the Financial Conduct Authority (“FCA”).
- 2.5 The DWP consulted on regulations in relation to the introduction of pensions dashboards in early 2022. This consultation proposed that Expected Retirement Incomes (ERI) and annualised accrued values illustrated on pensions dashboards for DC pensions should be calculated using the methodology and assumptions in AS TM1.

Purpose of this paper

- 2.6 In February 2022, the FRC issued a [Consultation Paper](#) (“CP”) titled ‘Proposed revision to AS TM1: Statutory Money Purchase Illustrations’. Consultation closed on 31 May 2022. This was supplemented by extensive outreach activities. This paper provides a summary of the feedback we have received and set out our response, including any material amendments made to the exposure draft. The final version of [AS TM1 v5.0](#) and its [guidance](#) is issued alongside this paper.
- 2.7 Section 3 of this paper provides a summary of who responded to the CP. Section 4 provides the impact assessment of the changes to AS TM1. Section 5 sets out the feedback on the CP in more detail and our response to the points raised. Appendix A provides a list of amendments made to the [exposure draft of AS TM1 v5.0](#) issued in February 2022.
- 2.8 AS TM1 v5.0 will be effective for all statutory illustrations issued on or after 1 October 2023.

3 Summary of responses to the CP

3.1 In total the FRC received 43 written responses, of which 38 responses were not confidential and have been published on the [FRC website](#). The table below summarises the number of responses by respondent type.

Respondent type	Number
Pension providers	19
Professional and industry bodies	9
Consultancies	7
Technology or data providers	5
Individuals	2
Pension schemes	1
Total	43

3.2 In addition, during and following the close of consultation we held 16 meetings with respondents, either in groups or individually, to discuss their comments in more detail. We also held a webinar on 7 July 2022 to discuss the volatility-based approach for determining accumulation rates to which all respondents to the consultation were invited.

4 Impact assessment

4.1 The FRC is a principles-based regulator and is committed to issuing proportionate Standards that support the provision of high-quality actuarial work. We have carefully considered the need for proportionality in finalising AS TM1 v5.0 and in our assessment of the impact on the pension industry.

Benefits

4.2 The requirements of AS TM1 v5.0 have been developed in response to inconsistency in the production of statutory illustrations under current requirements of AS TM1. With the introduction of pensions dashboards, users will see illustrations of their Expected Retirement Income, calculated following AS TM1, for multiple DC pension funds side by side.

4.3 The effectiveness of pensions dashboards is dependent on users having access to consistent and reliable ERI illustrations. Feedback provided to the Pensions Dashboards Programme (PDP) suggested that seeing the ERI is a key benefit that users would like from pensions dashboards.

4.4 It is important that for any illustrations on pensions dashboards individuals are able to understand:

- What they mean for the expected level of income and resulting standard of living that can be expected in retirement. This is needed to support decisions about future saving, the way income is taken at retirement and the timing of retirement; and
- The level of reliance they can place on the reasonableness of the estimates provided.

4.5 Without the changes proposed to AS TM1, users of pensions dashboards will not be able to have confidence in the illustrations provided due to the inconsistency between different providers. The benefits to users of these changes are, therefore, significant but difficult to quantify and will be captured within the overall benefit users will gain from pensions dashboards.

Costs

4.6 Through responses to our consultation (details can be found in section 5.162 to 5.165), and further discussions with providers, we understand that the costs in relation to these proposed changes are primarily one off in nature, relating to the implementation of the volatility-based approach in determining accumulation rate assumptions. Any additional ongoing costs are relatively minor in delivering what is expected to be a broadly mechanical process.

4.7 In the CP, we anticipated an ongoing saving for providers in not having to individually estimate their own accumulation rates for each fund offered. Respondents to the consultation were unable to directly quantify the level of saving this may lead to, although

we understand it may be small relative to the initial costs of implementing the change to a volatility approach.

- 4.8 Having consulted with the industry, we have made a number of amendments to the proposed changes in the CP, which are expected to significantly reduce implementation costs:
- Allow volatility group 3 to be used in certain cases where volatility cannot be reliably determined (Question 3). This mitigates expected costs for providers of more individualised SPPs in calculating volatilities on a policy-by-policy basis.
 - Clarify that alternative methods to allow for de-risking (Question 5) or multiple pooled funds (Question 9) may be used where they produce materially similar results. This avoids costs of changing existing calculation systems where it is not expected to increase the accuracy of any illustrations.
 - Remove the requirements to obtain open market quotations for illustrations within 2 years of retirement (Question 11). This avoids generating additional costs for occupational pension schemes in obtaining annuity quotations, where these are expected to add little value for users.
- 4.9 We are also in discussion with fund managers to determine the most suitable way for historical return and volatility data to be delivered to providers.
- 4.10 Allowing for the amendments to the exposure draft of AS TM1 v5.0 as set out in this paper and following the feedback received on costs, we understand that the main costs in relation to implementing the changes relating to the volatility approach to accumulation rates fall into three broad areas:
- Building systems and processes to obtain the 5-year return history for each fund (recognising for platform providers there may be many funds and investment managers involved).
 - Building calculation routines to determine volatility and the volatility group for each fund.
 - Updating communications to reflect the change in how accumulation rates are set. This includes changes to annual SMPI statements, and any potential one-off exercise in explaining the change to users.
- 4.11 In addition to consulting on the impact assessment during the consultation, we have held discussions with a number of providers to quantify these costs. Providers cited that their ability to make estimates were limited before the standard was finalised. It was also noted that any costs are likely to be a part of wider changes to meet the requirements of pensions dashboards. As such, we have received no reasonably robust estimates on which to calculate the overall cost of delivering these changes.
- 4.12 We also considered the impact of alternative approaches to determining the accumulation rates (as discussed under Question 3 in Section 5 below).

-
- Through our engagement with pension providers, we understand that a simpler 'fixed-rate' approach would give lower implementation costs, but as discussed may undermine the value of ERI illustrations produced.
 - An asset-class approach, if applied in a consistent basis across the industry, would lead to significant cost to implement. This is because the prescribed approach in the standards would differ from the current range of approaches used by providers, and would have higher ongoing cost to maintain. As a result, we do not consider this would give significant cost benefits relative to our proposal.

Conclusion

- 4.13 The FRC concluded that these revisions are necessary as the risks to members' interests of not having a consistent methodology in producing illustrations are significant. Not making these changes could impact the value of pensions dashboards.
- 4.14 Any potential costs in relation to these proposals should therefore be considered relative to the expected costs of delivering the overall PDP.

5. Analysis of Response to the Consultation

- 5.1 In this section we summarise and comment on the points raised in the written submission responses to questions in the consultation.

QUESTION 1:

How supportive are you of the approach to prescribe the accumulation rate and form of annuitisation more precisely, in order to improve consistency across projections from different providers? In particular, do you have any concerns arising from the loss of independence and judgement allowed to providers to set these terms?

- 5.2 Most respondents answered this question and the great majority supported the need to increase consistency in setting accumulation rates. A number of respondents highlighted the large range of accumulation rates used by different providers for very similar funds under the current application of AS TM1.
- 5.3 Those responses disagreeing the need for consistency in accumulation rates expressed concerns that prescribing an approach to setting accumulation rates would limit the ability of providers to apply their own judgement in providing illustrations that would be more appropriate for customers.
- 5.4 All but one of the respondents answering this question supported the need to increase consistency in the form of annuitisation.

FRC response

- 5.5 We have finalised AS TM1 v5.0 with a prescribed approach for both accumulation and annuitisation rates.

QUESTION 2:

What are your views on the proposed effective date of 1 October 2023?

- 5.6 Most respondents answering this question were comfortable with the proposed effective date, on the basis that a revised version of AS TM1 would be issued in October 2022, with many suggesting that any delay in issuing AS TM1 should delay the effective date. Some respondents also highlighted challenges due to the potential scale of change required under these proposals, alongside the level of other changes required to meet pensions dashboards regulations.
- 5.7 Many highlighted a need to align the timing of AS TM1 v5.0's effective date with the timing of implementation of ERIs on pensions dashboards, although there was not a clear

consensus of whether this should connect to staging dates, or the Dashboard Available Point (which is not currently specified).

- 5.8 Some other responses also suggested April 2024 as an effective date, which would tie to FRC's current annual review cycle.
- 5.9 Some respondents queried whether AS TM1 v5.0 would apply either to statements issued on or after 1 October 2023 or to statements with a calculation date on or after 1 October 2023.

FRC response

- 5.10 An effective date of 1 October 2023 allows a lead time of broadly 12 months from publication of the final version of AS TM1 v5.0 and is in line with the requirements of pensions dashboards to show ERIs only after the first SMPI statement is issued after 1 October 2023.
- 5.11 The feedback and subsequent discussions with providers suggest this 12-month lead in time is deliverable, although we recognise this is within an existing environment of multiple system changes, including those required by pensions dashboards. As per the consultation we have therefore finalised AS TM1 v5.0 to be effective for statements issued on or after 1 October 2023.

QUESTION 3:

What are your views on the proposed volatility-based approach for determining the accumulation rate?

- 5.12 Most respondents answered this question. Of these around a quarter supported the proposal and the remainder were not supportive. The level of support for the proposal varied between different types of respondents. Providers of Self Invested Personal Pensions (SIPPs) were most strongly opposed to the proposals. Other pension providers and pension consultancies were more mixed in their views, but the majority were still not supportive of the proposals.
- 5.13 Concerns of respondents with the proposed volatility-based approach, in order of frequency were:
- Concerns over the ability of users of SMPIs or pensions dashboards to understand the concept of volatility and how this has been used to determine projections of their own pension funds. Tied to this was a concern over the level and depth of explanatory notes that would be needed for users, and the number of customer queries they could lead to. [see 5.36 to 5.41]
 - The complexity to implement the changes within existing systems. This issue was especially a concern for SIPP and platform providers where it was felt that the number of funds offered, or the bespoke nature of many member's pension arrangements would make it impractical to determine volatility. There was also a concern that fund

managers may not provide the necessary fund price history data to enable calculation of volatility groups to be carried out. [see 5.34]

- Some respondents, including pension consultancies, highlighted inconsistencies that resulted from using volatility to determine forward-looking rates of return for some fund types. It was highlighted that index-linked gilt funds had a high level of volatility but would generally be considered low risk and not be expected to have very high future returns. [see 5.42 to 5.47]
- Some insurance companies raised a concern that the underlying principle of a relationship between past volatility and potential future returns was contradictory to messaging required by the FCA that past performance is not a reliable indicator of future returns, and that this could cause confusion for users. [See 5.40]
- Some respondents raised the concern that a fund which is better managed to reduce volatility would be penalised under the proposal with a lower accumulation rate. [see 5.45]
- Some respondents raised concerns that the volatility approach would potentially encourage risk seeking behaviour, either from users seeking to consolidate pensions to higher risk funds, or fund managers moving to more risky assets to be able to move their fund into a higher volatility group and so show higher expected returns. [see 5.48 to 5.50]
- Some respondents also felt it was inappropriate to show higher returns for higher risk funds without also showing the higher potential variability in future outcomes. This was based on the current structure of SMPI and pensions dashboards only showing a single statutory illustration figure rather than a range of results. [see 5.41]

5.14 Three main alternatives to the volatility approach were put forward by respondents:

- The most common proposal was an 'asset-class' approach whereby AS TM1 specifies a rate of return to be used for a number of broad asset classes, and that providers would base their accumulation rate on the asset types held within a fund.
- Some respondents favoured using a single rate of return across all investments, regardless of their type.
- A small number suggested allowing providers to continue to use their own judgment in setting accumulation rates.

FRC response

5.15 There is no single approach to determining accumulation rates that can satisfy all of the criteria we set out in paragraph 3.4 of the CP. The feedback provided raised a number of challenges that we had considered in developing the proposed volatility-based approach, and in evaluating this against other available approaches. The feedback did not provide any alternative approaches to accumulation rates that we had not already considered in developing proposals or provide evidence that any alternative could provide better

outcomes across all the criteria we have set out. As a result, we intend to introduce the proposed volatility-based approach in AS TM1 v5.0.

- 5.16 We do, however, recognise that there are specific challenges in implementing the volatility approach for some types of funds, especially for SIPPs, which we had not fully reflected in our initial proposals. For that reason, we are proposing a simplified method for funds where volatility cannot be reliably calculated.

Asset-class approach

- 5.17 Currently, most providers follow some form of asset-class approach to producing illustrations under AS TM1. Under such an approach, funds are placed in an asset class, and accumulation rates are based on their view of expected returns on that asset class. Where a fund invests in multiple asset classes, many providers use a weighted average of the rates for each class.
- 5.18 Respondents proposing AS TM1 v5.0 follow an asset-class approach suggested we reduce the inconsistency between providers by mandating the returns to be used for each asset class.
- 5.19 Feedback received through the consultation process and subsequent outreach indicated a large variety in the detail of the asset-class approaches currently used by providers. Different providers have developed different ranges of asset classes which they classify their funds into. There was also no consistently applied definition of the asset classes to be used or how funds are placed in a specific class, which we understand is often based on judgement of the provider.
- 5.20 To apply an asset-class approach consistently across the industry it would be necessary to define a single range of asset classes to be used (with an attaching accumulation rate for each asset class) and with clear definitions of each class. We are concerned about the risk of consistency between providers if we maintain the current level of judgement in determining the asset class of each fund.
- 5.21 Any such consistent asset-class approach would create its own challenges which we believe are larger than the challenges to a volatility approach:
- Most respondents suggested a limited number of broad asset classes, such as a single 'equity' asset class. This fails to capture the large variety of funds used in practice, where risk and expected returns can vary significantly depending on the fund nature, as reflected by the broad range of indices considered within any single asset class. Capturing this variety would require consideration of a variety of factors, such as (but not limited to) active vs passive management, global vs regional vs country specific funds, currency hedging or not, weighting by capitalisation or other characteristics.
 - While many investment funds simply hold underlying assets, many are structured as 'strategies' through use of leverage, derivatives or hedging. These can have a significant impact on the expected return of a fund. Capturing the impact of these strategies would be very challenging under an asset-class approach.

-
- Increasingly funds will not fit into neat categories. Many respondents suggested diversified growth funds could be considered as a single group, whereas in practice these cover a significant range of different strategies having very different risk and return characteristics. In a very simplified example, it would not be right for a multi-asset fund that leans heavily towards bonds to be treated in the same way as a fund that leans heavily towards equities. We do not believe it would be practical for all providers to look through to the underlying split of investment types.

5.22 We examined the approach the Investment Association¹ has taken to classifying fund types. In addressing some of the above concerns, and considering the large variety of funds potentially available, they have developed over 50 fund classifications with specific guidance for how these are applied.

5.23 This gives an indication of the complexity required to achieve consistency in an asset-class approach in practice. Such classification as set out by the Investment Association could be too complex for the purpose of AS TM1 and there is also a trade-off in implementing a simplified classification and creating and maintaining a further system of fund classification.

5.24 The effort required by providers, especially those with many fund options available to members, of continually monitoring funds (whose nature or underlying investments may vary over time) against clear definitions of boundaries between asset classes (which themselves may have the potential to be varied based on market changes) would appear to be a more onerous burden on providers than following the volatility-based approach.

Single fixed rate

5.25 A single fixed accumulation rate across all funds would be the simplest to explain to users of SMPs or of pensions dashboards. It would also be simpler to deliver for providers, as there would no longer be a need to classify funds by type (either based on asset class or volatility) or apply different accumulation rates to these.

5.26 However, based on our [technical analysis](#), we do observe a correlation over the long term between levels of investment risk (as measured by volatility of returns in our analysis) and expected future returns. This connection is currently reflected in SMPs by using different accumulation rates based on different expectations of returns for different asset classes.

5.27 For many users, especially those further from retirement, the accumulation rate is the assumption that has the greatest impact on the statutory illustration. In moving to a single rate, we would be requiring illustrations without any reference to the actual investments held. We believe this would be a backwards step in terms of the reliability of information provided to users. For funds held in cash, the return on these cash funds is unlikely to achieve the assumed fixed rate in the long term. This could lead to an illustrated ERI that is significantly higher than could be reasonably expected. The impact of a move to lower risk investments not affecting the ERI shown, may be to encourage members to take too little investment risk, which may limit their potential to benefit from investment growth in the long term.

¹ <https://www.theia.org/industry-data/fund-sectors>

-
- 5.28 Over time, as user expectations from dashboards are expected to increase, we believe it would be unsustainable to produce statutory illustrations that do not reflect the assets held. As such, we believe that if a single rate were introduced now (needing some level of system development) there is a strong possibility it would need to be amended again in the future to keep pace with the development of pensions dashboards.
- 5.29 Using a single accumulation rate for AS TM1 implies that there is no connection between how a fund is invested and the potential returns on that fund. This would create a gap that firms will seek to fill to provide their clients with additional more tailored illustrations, which goes counter to the aim of pensions dashboards to allow people to see their various pensions in one accessible place.
- 5.30 A number of respondents highlighted that as the majority of DC investments are in default funds with relatively similar characteristics, a single rate would not be significantly less accurate than investment specific rates. This was particularly suggested given the level of uncertainty inherent in any illustrations.
- 5.31 In practice, there are a variety of potential differences in the composition of default funds, during both the accumulation and de-risking phases. Appropriate rates would also vary by age after allowing for de-risking closer to retirement. These differences mean a single rate may vary significantly from rates specific to the investments held by an individual.
- 5.32 We also considered adapting a single rate to be 'age dependant'- such that a different fixed rate is used depending on the member's age. This could address the effect of de-risking closer to retirement in default funds. We concluded that this approach would add unnecessary complication, and would give a false impression of accuracy if it still does not consider the actual investments held by the individual.

Volatility approach

- 5.33 Although all potential approaches to setting accumulation rates have limitations, in the consultation we proposed a volatility-based approach as it provides a number of advantages over other potential approaches:
- It can be applied objectively and consistently across the majority of DC pension investments, such that any two providers considering the same funds would produce the same volatility figure, and so the same accumulation rates.
 - It makes allowance for the way in which the DC pension is invested, as this is one of the main drivers of future outcomes.
 - Once systems are set up to incorporate the volatility calculation approach (the cost of which we consider in our impact assessment in section 4), it would then be a mechanical process for providers to apply.
- 5.34 The concerns raised by respondents on the volatility approach have been considered in detail, including through follow up meetings with a number of respondents. We made amendments to the exposure draft to address some of these concerns as follows:

- In the CP we proposed a separate treatment for unquoted assets, as the volatility approach could not be applied effectively for them. Our initial proposals were that unquoted assets be projected with 0% real returns. Based on the feedback received, we have amended AS TM1 v5.0 to require such assets to be included in volatility group 3 (the second highest group), which we consider better reflects the potential for real returns that may be achieved by the types of unquoted assets typically held.
- Beyond unquoted assets, there are a small number of investment types held for DC pensions (particularly in more bespoke SIPPs which are a relatively small part of the market) where volatility cannot be meaningfully or reliably measured. We have amended AS TM1 v5.0 to acknowledge these circumstances and require that these also be mapped to volatility group 3 for the purpose of determining the accumulation rate assumption. Predominantly the investments that would meet this criteria are held to deliver long term real returns, but outside of a typical pooled fund structure. As a result, we believe that assuming returns in volatility group 3 would not be unreasonable.
- We have provided guidance alongside AS TM1 v5.0 of those circumstances where we expect such an exception to apply. These include investments in individually selected stocks (as opposed to pooled funds) and with an external discretionary fund manager. Feedback suggests that this will apply to a relatively small number of SMPI illustrations, primarily investors in Self Invested Personal Pensions (SIPPs).
- We intend to observe the use of these exemptions through our annual AS TM1 survey, and intend to work with providers and fund managers to minimise use of these over time, where this can be done without placing undue burden on pension providers.

5.35 We are not proposing to change from the overall volatility approach based on other items of feedback, but our comments on these are set out below:

Communication challenges

5.36 Appropriate communication of accumulation rates in SMPI statements and pensions dashboards is crucial for users to have trust in their pension illustrations. We intend to work with the Pensions Dashboards Programme (PDP) on the wording and risk warnings as dashboards are communicated. We are mindful, however, that useful communication of the volatility approach would focus on the principle of connecting a higher risk fund to higher expected returns over the long term, rather than addressing the technicalities of volatility calculations. Such communication can be similar to current communication of higher accumulation rates for asset classes such as equities.

5.37 We also acknowledge feedback given in our engagement sessions that there will be an investment in time required by providers to themselves fully understand and apply the volatility formula, and in limited cases to be able to explain this to customers who seek detail of the specific volatility calculation.

-
- 5.38 Where funds move between volatility groups, there may be a step change in the illustrations seen by dashboard users. We are aware these cases may raise additional questions to providers. To help ease this burden, the design of the volatility approach, including using a corridor and annual review by the FRC of the boundaries between volatility groups, is intended to limit the movements of an individual fund between volatility groups to genuine and sustained changes in the risk profile of a fund.
- 5.39 We also note that in practice, many other movements (such as changes in the accrued fund value or in gilt yields) will also result in changes to illustrations from year to year. In practice reconciliation of year-to-year movements in projections under any accumulation rate approach will be challenging.
- 5.40 We are aware of the concern raised about the volatility approach linking past returns to future events, and how this would be communicated to members. Importantly though, volatility approach does not directly link past returns to future returns - it is a practical approach to connect risk (which we can measure by volatility of returns) to future expected returns and that this connection is supported by the technical analysis we have carried out. Connecting risk to return is no different in concept to the current approach of many providers to assign higher returns (in part based on past experience) to some asset classes, e.g. equities.
- 5.41 We also agree the concerns in recognising higher expected returns for higher risk investments, without showing the higher potential downside. We believe this is an inherent challenge of any projection methodology that projects a single figure. It is an issue under current SMPI illustrations and would be a similar issue if we set a prescribed asset-class approach going forwards. We do not consider, however, that this limitation is sufficient justification to adopt a single fixed accumulation rate. We intend to engage with future developments of pensions dashboards to consider how risk can be incorporated.

Technical challenges

- 5.42 Our analysis has shown that the correlation between backward looking volatility and forward-looking returns increases over time², and we see a clear relationship between 5 year past volatility and forward looking 15 year returns. The time periods used in this analysis considered the long investment horizons in DC schemes.
- 5.43 Many respondents who questioned this analysis compared returns and volatility in the same period and over a relatively short timespan of 1 to 5 years, where we expect less correlation between returns and volatility. Although the volatility approach becomes less reliable for a saver with a shorter period to retirement, in these situations the accumulation rate becomes a less significant assumption, compared to the rate at which a fund is converted to income. We therefore believe it is right to pay more attention to time periods of at least 10-15 years when assessing how to structure the accumulation rates.

² Our analysis considered the return volatility of the 60 months up to a point in time and considered the correlation with returns over a 15 or 20 year period from that point in time. Hence the connection we see between backward looking volatility and forward - looking returns.

-
- 5.44 We acknowledge that index-linked gilts may have a weaker connection between volatility of monthly returns and expected future returns. This results from long-dated index-linked gilts potentially having a volatile nominal price (as their long duration makes them sensitive to long term real interest rate movements) but being low risk (as they are held as a match for long term real interest rates). From discussion, we understand index-linked gilt holdings are a relatively small proportion of DC fund investment, as their main benefit is matching the price of inflation-linked annuities.
- 5.45 We also acknowledge concerns that fund managers might be penalised by being placed in a lower volatility group (and so have lower attaching projected returns) as a result of better managing volatility within their funds. An equivalent argument could be made that this does not reflect the additional value that may be derived from active equity management. Over time the actual return on all funds will vary from the projections made, with some performing better and some worse than implied by their volatility group. As for any investment, it is difficult to identify ahead of time those that will outperform and so do not consider it is appropriate to make allowance for this. Any outperformance that is achieved by fund managers will be seen over time in the higher accumulated fund values this generates.
- 5.46 It has also been highlighted that there could be inconsistencies in the application of the volatility approach depending on how investments are structured. We accept in principle the approach could give different accumulation rates if you held the same assets in either one pooled fund (projected at one rate) or multiple pooled funds (each projected at their own rates).
- 5.47 Our analysis shows a broad correlation between volatility and return at a market level, although we do see, as would be expected, some counterexamples in any time-period considered. These counter examples are more common when shorter time periods (especially less than 5 years) are considered. Given the level of overall correlation between volatility and long-term returns seen in our analysis, we do not consider the examples raised invalidate this broad approach.

Behavioural impacts

- 5.48 We recognise the concerns raised about the potential for the proposed volatility approach leading to excessive or inappropriate risk taking by either users or providers.
- 5.49 We do not, however, believe that alternative approaches to accumulation rates avoid the possibility of inappropriate consumer behaviour. An asset-class approach has similar issues of potentially leading investors to move to asset classes projecting higher returns without also considering the downside risk from these.
- 5.50 Under a single rate approach, as described in paragraph 5.25 above, there is risk of providers continuing to use a variety of bespoke projection models to reflect the actual investments held by individuals in their DC pension. Such a variety of approaches may risk consumers being driven toward consolidating their DC funds at providers with the most optimistic models for such illustrations.

QUESTION 4:

Based on an assumed CPI of 2.5% do you find the accumulation rates proposed for the various volatility groups to be reasonable and suitably prudent?

Accumulation rates

- 5.51 Most respondents answered this question. Half of these responses agreed that the rates proposed were reasonable.
- 5.52 Around a third of respondents suggested that the proposed rates were too high. However,
- In two of these responses, the respondent was assuming the proposed rates as set out in the exposure draft were in excess of inflation e.g. for volatility group 4 these two respondents has assumed the proposed nominal return was 9.5% rather than a proposed nominal return of 7%.
 - Two responses also suggested that the proposed returns would be excessive for index-linked gilts which they believed would fall into a higher volatility group based on their historical volatility.
- 5.53 A number of respondents suggested that the proposed rates would in many cases result in accumulation rates higher than currently being used under AS TM1.
- 5.54 One respondent believed the rates were too low, and another suggested the rates as proposed should be maximums rather than prescriptive rates.
- 5.55 A number of respondents also questioned whether it was appropriate to include a downward adjustment to historical observed returns to allow for prudence, although one respondent also specifically agreed making an allowance for prudence to reduce the risk of shortfalls in member's retirement savings.

Inflation rate

- 5.56 Three respondents also commented on the proposed inflation assumption of 2.5% and suggested this should be aligned with the assumption of 2% currently used for FCA projections under CoBS13. One response suggested that we keep this under review, given the current high levels of inflation.

FRC response

- 5.57 The FRC expected a range of responses given the inherent uncertainty in the expected long-term returns. We also expected the rate we had proposed would be higher than some respondents currently use, based on information provided to us in our AS TM1 survey in 2020. Alongside this feedback response we have published the technical analysis underlying the accumulation rates in AS TM1 v5.0. This technical analysis considers the rates proposed relative to those rates seen in the AS TM1 survey in 2020.

-
- 5.58 We acknowledge that there is no single right answer for the accumulation rates to be used for each volatility group. In the feedback, a number of respondents argued that the rates may be too high. However, others implied rates were too low given we had made an explicit downward adjustment for prudence in setting the proposed rate. Given the balance of responses in both directions, the FRC finalised the accumulation rates as proposed in the consultation.
- 5.59 We will review these proposed accumulation rates prior to the effective date of AS TM1 v5.0 (as discussed in our response to question 6), to reflect market conditions closer to October 2023. We intend this review will follow similar methodology to that set out in our technical analysis.
- 5.60 The majority of respondents did not object retaining the long-term inflation assumption at 2.5%. Whilst we see the benefit from the provider's perspective of alignment between CoBS and AS TM1, we do not consider it a sufficiently strong rationale to adopt a lower long-term inflation assumption than the current 2.5% in light of current economic conditions. We will continue to monitor economic conditions as part of annual review of AS TM1.

QUESTION 5:

What are your views on the proposed approach to reflect de-risking when calculating the accumulation rate assumptions?

- 5.61 Most respondents answered this question. The majority of respondents supported the proposal and there were comments that this closely followed the approach currently taken in many cases.
- 5.62 Some respondents suggested that further detail was needed on how the proposals would be implemented in practice, including clarification on which circumstances would be considered a 'programmatic' approach to de-risking. One respondent asked for clarification on whether lifestyling assumptions should only be applied on a programmatic basis.
- 5.63 Concerns were raised by some respondents that the proposed approach may be complex to administer for some providers, and it was suggested that it may be appropriate to ask providers to use 'best endeavours' to apply this approach or use an approximate approach giving a broadly equivalent outcome.
- 5.64 Some respondents disagreed with the proposed approach to de-risking based on their opposition to the overall volatility approach for setting accumulation rates, suggesting that de-risking would not be adequately allowed for if the underlying accumulation rates were inappropriate.
- 5.65 One respondent suggested that allowance for de-risking would be more simply achieved if a single accumulation rate was used for all investment funds prior to de-risking.

FRC response

- 5.66 The FRC finalised AS TM1 v5.0 following the approach to programmatic de-risking as set out in the CP.
- 5.67 In light of the feedback received, we have also published [guidance](#) on the application of AS TM1 to support providers as they develop systems to deliver these changes. This includes guidance on which arrangements we see as being a programmatic approach, and how these proposals could be applied to target date funds.
- 5.68 We also refer providers to paragraph A.1.2 of AS TM1 v5.0:
- ‘Providers may adopt a different approach from that specified in AS TM1 if it does not materially affect the result of the calculation of the statutory illustration. For example, this may apply to the order in which the calculations are carried out...’
- 5.69 If providers adopt a different approach to making allowance for programmatic de-risking of DC investments over time that gives a materially similar result to the prescribed method, then this can be adopted. In these cases, we would expect providers to have carried out sufficient analysis to confirm their approach does give a materially similar outcome.

QUESTION 6:

What are your views on the proposals that the recalculation of volatility indicator should be annually as at 31 December with a 0.5% corridor?

- 5.70 Most respondents answered this question. More than three quarters of respondents supported the overall proposal although a number of reservations were expressed:
- Many respondents believed that the proposed corridor highlighted the complexity underlying the volatility grouping approach for setting accumulation rates. A number of these did, however, agree that if volatility groups were used that they were supportive of using a corridor.
 - Some respondents agreed the principle of a corridor but suggested that a 1% corridor would be more appropriate, and one suggested that two breaches of group boundaries could be required before a fund moves group.
 - Some respondents highlighted the potential for inconsistent treatment if the same fund were held by different providers. There was a concern if the providers had held the funds for different amounts of time, they may be in different volatility groups due to the effect of the corridor.
 - Some respondents also suggested some judgement could be applied in the application of the corridor to ensure funds remained in appropriate volatility groups.
- 5.71 One respondent asked for further clarity on the timing of the implementation of the corridor approach, particular in the first year of operation.

-
- 5.72 One respondent suggested that a time limit be applied to how long the corridor could hold an investment outside of the volatility group implied by its historical volatility.
 - 5.73 One respondent suggested that corridors should scale with the size of the group.
 - 5.74 One respondent suggested that 31 December calculations may not leave enough time for providers to obtain the necessary data before they are applied the following April.
 - 5.75 A minority of respondents disagreed the proposal for a corridor, mainly due to the complexity when considered alongside the overall volatility group approach to setting accumulation rates.

FRC response

- 5.76 Respondents broadly support the proposed corridor approach. We considered the alternatives suggested by respondents, but we consider it undesirable to add further complications to this mechanism to allow for more breaches or time limits, or to allow more judgement in a system designed to provide greater consistency. We have finalised AS TM1 v5.0 retaining a 0.5% corridor as per the CP. We intend to include additional guidance for users of how the corridor should be applied.
- 5.77 In finalising AS TM1 v5.0 we have amended the date for performing the calculations annually from 31 December to 30 September. The resulting accumulation rates and volatility groups, if changed, would be used for all illustrations produced in the following financial year (6 April to 5 April).
- 5.78 The FRC considers it important to align the date to which the analysis is performed in reviewing the appropriateness of accumulation rates and volatility group boundaries with the date to which the providers calculate the volatility groups. We have made this change with this approach in mind to allow sufficient time for FRC to complete the review and then for the FRC to consult and finalise any changes to the AS TM1 as a result of the review.
- 5.79 If the outcome of the annual review is such that the FRC identifies a need to revise AS TM1 because the accumulation rates and boundaries of the volatility groups are no longer appropriate, the FRC intends to publish a one-month consultation at the start of November. This will then allow the FRC to aim to publish the revised AS TM1 by 15 February for application in the following financial year.

QUESTION 7:

What are your views on the proposed approach for with-profits fund projections?

- 5.80 Around half of respondents answered this question. The majority of responses supported the proposal, but there were a number of areas of opposition raised:
- Some respondents were concerned that the approach would not capture the potential for higher returns in with-profits funds with underlying strategies targeting low volatility while maintaining future outperformance.
 - Clarity was requested over how any guaranteed growth rates underlying with-profits funds should be allowed for.
 - One respondent recommended allowing only for smoothed returns in calculating volatility as this would introduce a measure of prudence in the calculations. Another also suggested smoothing of returns for members who were closer to retirement.
 - Some respondents suggested potential challenges in obtaining the necessary data, especially if a with-profits fund were hosted on a platform by a provider other than the underlying with-profits fund manager.
 - One respondent argued that having very different growth rates used for the calculation of bonuses, and the calculation of statutory illustrations, would potentially cause confusion for with-profits policyholders.

FRC response

- 5.81 We finalised AS TM1 v5.0 with the approach to setting accumulation rates for with-profits funds as set out in the CP.
- 5.82 We acknowledge, however, that there are a number of different approaches to with-profits policies followed by different providers, either in the guarantees provided, or in the way any bonuses or smoothing is applied. We refer providers to paragraph A.1.4 and B.4.1 of AS TM1 v5.0 regarding the approach to with-profits funds. Providers should consider the most appropriate way to reflect the structure of their own policies in producing statutory illustrations. We have included within the guidance examples of factors to consider in applying the volatility approach to with-profits policies.
- 5.83 We acknowledge that using different growth rates for illustrations and bonus calculations could create some communication challenges for providers. However, this is a consequence of standardising accumulation rates for statutory illustrations, since assumed rates used for bonus calculations will inevitably vary across different providers.

QUESTION 8:

Do you have experience of unquoted assets held in pension portfolios and what are your views of the proposed approach for unquoted assets? In particular do you regard a zero real rate of growth to be acceptable and if not please provide suggested alternatives with evidence to support your views?

- 5.84 Most respondents provided an answer to this question. From these there was relatively limited support for the proposed 0% real return (i.e. 2.5% nominal return) on unquoted assets. Of those supporting, some based this on there being no better alternative readily available.
- 5.85 Objections to the proposals related to a number of different concerns:
- A 0% return does not reflect the risk or the return potential of typical illiquid investments, particularly given there is an expectation that there would be a higher return to compensate for illiquidity (i.e. an illiquidity premium). A number of respondents particularly mentioned that illiquid investments could include property where a 0% real return is below typical expectations.
 - A 0% return could act as a deterrent to investing in illiquid assets and so act against the government's attempts to reduce barriers to illiquid investments.
 - Some respondents incorrectly believed the proposal to be a 0% nominal return (i.e. a negative return after allowing for the impact of inflation) in stating their opposition to the proposal.
- 5.86 Where alternatives were proposed, these were either to allow a provider to use their own judgement in setting the volatility group for illiquid investments, or to assign these to one of the other proposed volatility groups - typically group 3 or 4. No evidence was provided of past returns on illiquid assets to support which alternative volatility group they could be included with.

FRC response

- 5.87 As set out in the consultation paper, we proposed a zero real rate of growth as a pragmatic solution given the complexity of typical unquoted assets. We sought any suggestions that respondents had on how we could better reflect the value of unquoted assets fairly but robustly, with evidence to support such views.
- 5.88 We recognise the concerns raised on the appropriateness of a 0% assumption for assets of this type, and how this could negatively impact future development of investment in unquoted or illiquid assets. This was supported by further conversations with respondents and other interested bodies. Whilst there is a general acceptance that illiquid assets will return a positive real rate of growth, there was no clear evidence presented by respondents to support this, or consensus on what such a rate should be. Insufficient information was provided to us by respondents to build up a clear picture of the distribution of illiquid assets held within DC funds.

-
- 5.89 We understand a proportion of these unquoted assets are property, where there is clear consensus in the market that it will typically return a positive real rate of growth in the long term. Our technical analysis shows that returns on property funds have been broadly consistent with returns for funds falling in volatility group 3.
- 5.90 We are aware that a wide variety of other illiquid asset types may increasingly be used within DC investment in the future. Although there is less data available on historical returns for funds of these types, looking over a 20 year period, we have seen returns significantly above inflation for a range of illiquid investments³.
- 5.91 Given uncertainty in both the types and mix of unquoted assets being invested in by pension funds, and in the absence of any robust data or analysis we can access to determine a reasonable growth rate for such assets, we have finalised the AS TM1 with the amendment to require use of volatility group 3 for unquoted assets. We consider this approach to be simple and pragmatic.

QUESTION 9:

What are your views on the proposed approach to determine the accumulation rate assumption across multiple pooled funds?

- 5.92 Most respondents answered this question. The majority were supportive of the proposed approach. A number of these respondents reiterated they do not support the overall volatility group approach, but if this volatility approach were followed, they then support the proposals for multiple pooled funds.
- 5.93 One respondent raised a concern that the proposed approach would not be suitable for a portfolio of assets being managed instead by an investment manager, which may be more common for Self-Invested Personal Pensions (SIPPs).
- 5.94 Some respondents referenced that this proposal highlights the complexity of volatility group approach to setting accumulation rates and commented that it may be a complex change for some systems (depending on how they are currently set up). Some suggested this complexity could be reduced by allowing more discretion to providers in how multiple funds are treated.
- 5.95 Some respondents suggested this approach creates a risk of inconsistencies, from:
- How this is applied by different providers.
 - Circumstances where the same underlying investments could be assigned different accumulation rates depending on whether they were held in a single fund or across multiple funds.

³ See for example, [this McKinsey report](#).

FRC response

- 5.96 The FRC have finalised AS TM1 v5.0 in line with the approach outlined in the CP, as the approach proposed in the CP continues to be the most appropriate way of dealing with multiple pooled funds under a volatility group approach to setting accumulation rates.
- 5.97 During the outreach activities, some providers have explained that the current systems are set up with calculation approach which is different to the prescribed method in aggregating the multiple pooled funds as set out in the proposals, but does not materially affect the result of the calculation. Providers have asked whether clause A.1.2 can be applied in such circumstances.
- 5.98 The FRC confirms this is the case, and in such cases, we expect providers to have carried out sufficient analysis to confirm their approach gives a materially similar outcome.
- 5.99 To clarify, we have expanded paragraph A.1.2 of AS TM1 v5.0 to make it clear that this clause applies to how multiple pooled funds are aggregated:

‘Providers may adopt a different approach from that specified in AS TM1 if it does not materially affect the result of the calculation of the statutory illustration. For example, this may apply to the order in which the calculations are carried out OR THE WAY IN WHICH MULTIPLE POOLED FUNDS ARE AGGREGATED.’

QUESTION 10:

What are your views on the proposed prescribed form of annuitisation and treatment of lump sum at retirement? In particular, does the recommendation to illustrate a level pension without attaching spouse annuity cause you any concerns in relation to gender equality or anticipated behavioural impacts?

- 5.100 Most respondents provided an answer to this question. It was commented frequently that there is no simple single answer given the range of different individual choices in how to provide a retirement income. As a result, some respondents suggested that it would be appropriate to produce illustrations under more than one option. Comments on specific parts of the proposal are set out below.

Annuitisation or drawdown

- 5.101 Around half the respondents commented on the proposal that the conversion of accumulated pensions into income should be based on purchasing an annuity. Of these, a small majority supported the proposed approach.
- 5.102 Those opposing the proposed approach observed that individuals rarely choose to annuitise, and that income drawdown is becoming the predominant way of taking a retirement income. Those proposing a drawdown approach generally acknowledged that further consultation would be required on the form of drawdown illustrated. Alternative proposals included:

-
- An approximate rule for drawdown income (4% or 3.5% of the accumulated fund were proposed).
 - Modelling drawdown to a certain age and then annuitising after that age.
 - An assumption sitting between annuity and drawdown rates.

5.103 A number of those supporting the proposal to use an annuity basis also reflected that drawdown was a more common way to provide a retirement income but that currently there is no consensus on how drawdown income should be modelled. An annuity approach was therefore accepted as a pragmatic alternative.

Level pension

5.104 Two thirds of respondents commented on this element of the proposal, with around a third supporting a level annuity and two thirds of arguing for some form of inflation-proofing in the assumption. Of those who supported the use of level annuities, for some this was as a second preference if a drawdown model was not used.

5.105 Two arguments were put forward for a level annuity:

- This is the most common form of annuity purchased in practice.
- It would result in an illustrated retirement income that was closer to what one could expect from a drawdown approach.

5.106 A number of arguments were made against use of a level annuity:

- It may discourage individuals from adequately considering inflation protection when considering how to secure an income at the point of retirement.
- It may also result in individuals not making sufficient provision during the accumulation period to buy inflation protection when they come to retirement.
- It would be inconsistent with illustrations of DB and state pensions on pensions dashboards where some degree of inflation protection is typical.
- It would be inconsistent with other elements of AS TM1 applying up to retirement which are all calculated in real terms (i.e. after allowance for inflation).
- The lack of inflation protection from a level annuity would impact women more than men, as they have a longer life expectancy, and so the impact of inflation would be greater over the full length of their retirement.

5.107 Many responses, either supporting or opposing the proposal emphasised the importance of clear communication of the basis on which the annuity was calculated and the potential impact on members not having a retirement income that increases with inflation.

Single life pension

5.108 Just over half of respondents commented on the proposal to show an annuity on a single life basis. Of these, around three quarters supported the proposal, although few set out reasons for this. Those who did suggested that:

- This is a more common form of annuity purchase.
- This would reflect a move away from the assumption that a household has only a single earner, and other assumptions that may not reflect present day relationships.
- This would be more in keeping with the perceived purpose of dashboard ERIs to present an estimate of an individual's potential income at retirement, and not to provide guidance on what form of benefits should be taken.

5.109 Those respondents opposing the proposal highlighted a number of concerns:

- Not illustrating the cost of a spouse's pension may discourage individuals from making adequate savings to buy such protection. Some respondents viewed this as an implicit nudge away from providing spouse's pensions which could play a part in perpetuating the gender pensions gap.
- This would be inconsistent with illustrations of DB pensions on pensions dashboards where spouse's pensions are typical.

Pension Commencement Lump Sum (PCLS)

5.110 Half the respondents gave a view on the proposal to make no allowance for a Pension Commencement Lump Sum (PCLS) in calculating expected retirement income. Of these, the majority indicated support for the proposal, either citing the need for the illustrations to show the income a DC fund could generate or that the pensions dashboards data standards would not allow a PCLS to be shown separately for DC pensions.

5.111 Of those who suggested illustrations should make allowance for a PCLS, the main reason was that in practice the majority of members do take a PCLS. It was suggested that not allowing for this might risk overstating the expected retirement income.

5.112 Some respondents proposed alternative approaches, including producing illustrations with and without allowing for a PCLS. It was also consistently commented that if a PCLS is not allowed for, this would need to be clearly explained in SMPs and in pensions dashboards.

Other comments

5.113 Although not asked in the CP, some responses queried what guarantee period should be used, though they did not express an opinion as to what assumption should be made.

5.114 One respondent asked us to consider a different approach for projection of Additional Voluntary Contributions (AVCs) which are attached to a DB benefit, as these may be used to

provide added years of DB benefit, or to reduce the requirement to commute DB pension to take a cash lump sum.

- 5.115 One respondent asked us to consider specific requirements for DC funds contracted out on a GMP basis, where there may be a requirement to purchase inflation-linked benefits.

FRC response

Summary

5.116 Feedback received in the consultation process provided a number of arguments for and against the form of annuity we proposed in the CP. There is no clear consensus on any single approach, each of which has strengths and weaknesses. The points raised through the consultation process had been considered carefully by the FRC as we developed the proposals that were consulted on, which we saw as a pragmatic balance between the competing arguments. We will therefore finalise the form of annuitisation in AS TM1 v5.0 in line with the basis set out in the CP. We intend, however, to keep this under review in future years, and work with industry to develop an acceptable model which may better reflect the decumulation options being taken in the future. Further commentary on each element of the annuity basis is set out below.

5.117 Several of the responses to this question raised concerns about risks to individuals and warnings that ought to be presented to them. The FRC has fed these concerns back to PDP and intend to work with them to ensure that risks are appropriately communicated to dashboard users.

Annuitisation or drawdown

5.118 Since the introduction of pension flexibilities in 2014 there has been a significant reduction in the proportion of retirees buying annuities with their DC funds. 55% of funds (mostly small pots) are taken as single cash lump sums⁴. Of those that are used to provide a long-term income stream, only 26% are now used to purchase annuities, with the remaining 74% entering into drawdown.

5.119 There is currently no established practice in how drawdown funds are used to generate a retirement income, and insufficient time has elapsed to see how sustainable any rates may be over a lifetime. Certain 'rules of thumb' have been suggested for a sustainable drawdown income (such as 3.5% or 4% of the fund per year), and were mentioned in the consultation responses, but these have not been tested in practice, and it is also not clear how or whether these should depend on an individual's age at retirement. There is also no consensus on what rate is appropriate (recent arguments have been made for 3.3%⁵ and 4.7%⁶).

5.120 The FRC considers that there is not at present a reliable and supportable rate of drawdown that could be justified for use in illustrations. As a result, we intend to maintain the pragmatic

⁴ <https://www.fca.org.uk/data/retirement-income-market-data-2020-21#full>

⁵ "The State of Retirement Income: Safe Withdrawal Rates." Morningstar, November 2021

⁶ W. Bengen, "Is It Now the '3.3% Rule'?" Advisor Perspectives, November 2021

assumption that an annuity is purchased. We will, however, continue to review this assumption over time and will consider moving to a drawdown approach as the drawdown market matures.

Level pension – background and significance

5.121 Inflation has a significant impact on spending power over the course of retirement, with prices projected to rise by around 67% over the lifetime of an average person retiring at age 65 today.⁷ Studies⁸ have shown that the impact inflation has on savings is not very widely understood by the public, and the extent of the impact takes many by surprise.

5.122 The impact on ERIs is also significant. The starting pension amounts for inflation-linked annuities is around half that of flat annuities. Moreover, unlike accumulation rates (where differences in assumptions lead to large differences in ERIs when further away from retirement, but gradually smaller differences in ERIs as savers approach retirement) the impact of the annuitisation assumptions on ERIs will remain roughly constant throughout the saver's period of accumulation.

5.123 Inflation-linked annuities are very rarely purchased in practice⁹, and may have been seen by some retirees as offering poor value for money.

Level pension – user behaviour

5.124 Several responses raised concerns about the behavioural impact of the annuitisation assumptions on users. We acknowledge the risk that presenting ERIs on the basis of a level annuity may:

- Result in higher annual incomes being illustrated than in a sustainable drawdown approach that allows for some indexation. This may result in users saving too little for retirement.
- Encourage the purchase of level annuities or the take-up of other options that do not provide inflation proofing.

5.125 Counter to this, there are also potential concerns around the behavioural impact of providing an ERI figure that is arguably understated, if it reflects the cost of purchasing an increasing annuity, which happens very infrequently in practice. This could potentially give too negative a view of value from saving for a pension, and discourage savers from making contributions, or could push users to save more than they will in practice need in retirement.

⁷ Based on inflation of 2.5% p.a. and 50/50 weighted average future life expectancy of males and females, according to the ONS's 2020 statistics:

<https://www.ons.gov.uk/peoplepopulationandcommunity/birthsdeathsandmarriages/lifeexpectancies/bulletins/pastandprojecteddatafromtheperiodandcohortlifetables/2020baseduk1981to2070#:~:text=People%20aged%2065%20years%20in%202045.>

⁸ <https://webarchive.nationalarchives.gov.uk/ukgwa/20121114034530/http://www.fsa.gov.uk/static/pubs/cp/illustrating-the-effect-of-inflation-on-future-retirement-income.pdf>

⁹ <https://www.fca.org.uk/data/retirement-income-market-data-2020-21#full>, Tables 1 & 14.

Level pension – Needs in retirement

- 5.126 There are various views on what patterns of spending may look like in retirement. Some research¹⁰ suggests that spending tends to decrease steadily in real terms during retirement, but a recent IFS report¹¹ suggests that, in fact, individuals' spending patterns do increase roughly in line with inflation.
- 5.127 We also note that the State Pension, which currently has inflation protection, will be a large part of the overall retirement benefits for many savers. This may mean that even with a non-increasing income from their DC pension savings, a reasonable proportion of total retirement income may increase with inflation, particularly for those with lower levels of overall savings.

Level pension – consistency with DB benefits

- 5.128 We considered the comments regarding consistency with DB pension illustrations in dashboards. We note that while consistency between DC illustrations is important, to allow meaningful comparisons, there are many fundamental differences in nature between DB and DC (not least the level of certainty) which make comparisons between these less relevant.
- 5.129 While consistency would be preferable, we have balanced this against other arguments made in this paper regarding allowance for increases.

Level pension – conclusion

- 5.130 We consider that it would not be appropriate to reflect an increasing annuity when we are aware that only a very small proportion of savers would buy such annuity given the perceived poor value. We have therefore finalised AS TM1 v5.0 to require use of a level annuity.
- 5.131 We expect drawdown to remain the predominant choice for providing income at the point at retirement. We consider an increasing annuity basis would significantly understate the retirement income that may be provided in practice through a reasonable drawdown approach that does have some level of allowance for inflation. Given the uncertainty of future practice, we will keep this assumption under review for future years, so we are able to build towards producing illustrations on a meaningful drawdown basis as a clearer practice develops.

Single Life Pension

- 5.132 There are strong arguments for and against including allowance for a spouse's pension. On balance, we consider it more consistent that if an annuity basis is used to calculate retirement income that it should follow the form of annuity more typically purchased, which would be on a single life basis¹². We believe this is consistent with the aim of ERIs on pensions dashboards of showing individual savers how their pension savings may convert to income. We have therefore finalised AS TM1 v5.0 to require use of a single life annuity.

¹⁰ See e.g. <https://www.nytimes.com/2018/11/29/business/retirement/retirement-spending-calculators.html>

¹¹ <https://ifs.org.uk/publications/16055>

¹² <https://www.fca.org.uk/data/retirement-income-market-data-2020-21#full>, Table 14.

5.133 While we acknowledge the comments relating to the impact on the gender pensions gap, we understand that this gap is more strongly driven by factors affecting an individual's accumulated fund at retirement (such as pay inequality and breaks in pensionable employment). We do not consider the potential nudge of AS TM1 towards or away from saving for a spouse's pension will be as material in this context.

Pension commencement lump sum

5.134 We recognise the argument that most retirees currently take a PCLS at retirement, and so to be consistent with our approach set out for other elements of annuitisation, we should also allow for a PCLS being taken. However, our approach here is strongly influenced by the pensions dashboards data standards, where a PCLS will not be shown separately. As a result, if a PCLS were allowed for, dashboard users would have no visibility of c. 25% of the value they would gain from their pension saving, which we feel would cause significant confusion. If future versions of pensions dashboards included further information on PCLS, then we would review this approach.

5.135 We considered whether it would be appropriate to allow for PCLS in SMPI statements, but not on pensions dashboards. However, creating an inconsistency between SMPI and dashboards would be contrary to our aims in supporting user understanding. For these reasons, we have finalised AS TM1 v5.0 with the approach set out in the CP, of not allowing for PCLS being taken at retirement.

5.136 Given the prevalence of PCLS at retirement, we agree feedback comments that it will be important for communications on dashboards and in SMPIs to make clear that a PCLS has not been allowed for.

FRC response to other annuity comments

5.137 In response to paragraph 5.113 we have updated AS TM1 v5.0 to include specific reference to a 5 year guarantee period within the annuity calculation. We understand this is consistent with current typical practice, as well as being the most common form of annuity purchased¹³.

5.138 In response to paragraph 5.114, our understanding is that any AVCs which provide added years to the DB benefit would be classified as a DB benefit and therefore AS TM1 would not be applicable. AVCs which provide a separate pot are comparable with DC pots, and we maintain that it is more important for these to be consistent with other DC benefits, than to be consistent with DB benefit. The approach set out in our proposals is consistent with providing illustrations that do not include an allowance for taking any PCLS.

5.139 In response to paragraph 5.115, we recognise that in some cases, there may legal requirements on the form of annuity purchased with a DC fund. We have therefore amended paragraph C.3.3 of AS TM1 to reflect this.

¹³ <https://www.fca.org.uk/data/retirement-income-market-data-2020-21#full>, Table 14.

QUESTION 11:

What are your views on the proposed approach to determine the discount rate assumption when used to determine the annuity rates for illustration dates which are a) more than two years from retirement date and b) less than two years from retirement date?

- 5.140 Around half of respondents answered this question.
- 5.141 A number of the respondents were comfortable with the proposal, and there was broad support for the proposed approach to annuity rates for illustration dates more than two years from retirement date.
- 5.142 The most common concern was raised primarily in relation to occupational pension schemes. Some respondents felt that for these schemes, the proposed approach of obtaining market annuity prices within 2 years of retirement was unnecessarily complex. It was also commented that this would add no particular benefit to consumers given relatively few would choose to purchase an annuity at retirement.
- 5.143 Some respondents asked for more clarity on the choice of reference annuity where illustrations are within two years of retirement date, and whether factors such as pot size and post codes could be considered.
- 5.144 Some respondents suggested that if there was a requirement to move to market annuity pricing close to retirement, this should be within 12 months of retirement age, as per existing FCA rules.
- 5.145 Two alternative approaches were also suggested:
- For FRC to annually publish annuity rates to be used for AS TM1 illustrations.
 - For illustrations not to be required within two years of retirement, and instead encourage members to obtain open market quotations.

FRC response

- 5.146 For illustrations more than two years from retirement we have finalised AS TM1 v5.0 in line with the approach outlined in the CP.
- 5.147 Currently pension disclosure regulations do not require an SMPI where the individual is within 2 years of retirement date¹⁴ for the policy/plan concerned. Equally, pensions dashboards requirements will not require ERIs to be shown where a member is within 2 years of retirement. Providers may, however, provide ERI figures to dashboards for members within 2 years of retirement if they choose.
- 5.148 As noted in the CP, as members approach retirement the assumption with most impact on a member's retirement income is the rate at which the accumulated fund is converted to

¹⁴ <https://www.legislation.gov.uk/uksi/2013/2734/regulation/17/made>

pension. However, we acknowledge that only a small proportion of individuals will take an annuity at retirement, and so believe there is little benefit for users in mandating an approach giving spurious accuracy if this creates significant burden on providers. In particular we believe the proposed approach may deter some providers from producing illustrations or providing ERIs for these members.

- 5.149 Based on the above, and considering feedback provided, we have amended AS TM1 v5.0 to require that any illustrations produced within two years of retirement date follow the same approach as for illustrations produced more than two years from retirement.

QUESTION 12:

What are your views on the proposed new mortality basis for determining the annuity rates where the illustration date is more than 2 years from the retirement date?

- 5.150 The majority of those who answered this question supported the proposals but some requested clarification that parameters should use core values.
- 5.151 Some respondents expressed concerns that the proposed '16' series tables were out of date and it would be appropriate to also make allowance for experience from 2020 and the impact of COVID19 on mortality rates.
- 5.152 Some respondent highlighted the need to ensure consistency with the basis under AS TM1 and that required for FCA projections under CoBS13.
- 5.153 One response also questioned the 1.25% rate of mortality improvements and suggested 1.5% may be more in line with annuity markets.

FRC response

- 5.154 On balance we consider the proposed change to mortality assumptions remains appropriate, and follows the central approach as set out by the CMI, and so we have finalised AS TM1 v5.0 in line with the approach outlined in the CP. We have, however, updated the exposure draft to clarify the parameters to be used.
- 5.155 We are mindful, however, of the ongoing uncertainty of the impact of COVID19 on future mortality rates and improvements and so will continue to review these assumptions in the future.

QUESTION 13:

Do you have any other comments on our proposals?

- 5.156 Just under half of respondents made some reference in their response to a desire to see alignment between FCA's CoBS13 basis of projections and AS TM1, citing both the complexity for providers and the potential for confusion of users of statements.

5.157 A number of respondents raised comments on the need for clear communications in SMPI, developed with the end user in mind. This included comments on the need to be able to show the level of uncertainty in any illustrations. A number of respondents also raised concerns specific to the design of pensions dashboards, or to the calculation of 'annualised accrued pensions' required on pensions dashboards. These are out of the scope of this consultation and so we have not commented on these points.

5.158 There were also some specific points raised on the technical detail of AS TM1 as follows:

- Some comments related to concerns on the definition of retirement date, either for policies that had different elements with different attaching retirement ages, or more generally that users of dashboards will see different DC illustrations at different retirement dates.
- Some respondents asked for clarification of how Guaranteed Annuity rates should be disclosed and whether they should be included in the figures provided to pensions dashboards.
- One provider asked for clarity on whether the returns used to determine volatility groups were gross or net of expenses and/or discretionary benefits.

FRC response

5.159 For comments which are outside the scope of AS TM1 but relevant to pensions dashboards or other pensions illustrations, we will alert the relevant organisations to those comments where they have not been confidentially provided to the FRC.

5.160 We agree the requirement for clear communication of the content of SMPs, but requiring information on the uncertainty of outcomes via AS TM1 would be redundant while this is not required or displayed on pensions dashboards. We will, however, continue to review how uncertainty is illustrated if pensions dashboards develop in a way to accommodate this.

5.161 Commenting on each of the technical points in turn:

- We have finalised AS TM1 v5.0 with the definition of retirement age as set out in our Exposure Draft. We understand from DWP that this is in line with their intentions.
- We have finalised AS TM1 v5.0 to clarify how guaranteed annuity rates are applied.
- We have finalised AS TM1 v5.0 to clarify how expenses and discretionary benefits should be treated when calculating 5-year volatilities.

QUESTION 14:

Do you agree with our impact assessment? Please give reasons for your response?

- 5.162 There were a number of areas where respondents suggested the impact assessment may understate costs for providers:
- Making allowance for multiple projections where multiple funds are held in one policy.
 - Making allowance for lifestyling and target date funds on a mechanistic basis.
 - Due to the complex and bespoke nature of some SIPP arrangements, there were consistent comments that the cost to the SIPP industry is understated.
 - Obtaining market annuity rates within 2 years of retirement would add significant costs for occupational pension schemes.
 - The need to maintain two different bases of calculation between these proposals and CoBS13.
 - The cost of making extensive changes to statement wording.
 - Costs for some platform providers due to the volume of funds they may provide for investors.
- 5.163 Within the comments it was highlighted that the costs for providers would be mitigated if the 5 years volatility figures were calculated and provided by fund managers.
- 5.164 None of the respondents provided estimates of the potential costs to deliver the proposed changes to AS TM1 or quantified the impact of any of the points raised above.

FRC response

- 5.165 We have included an updated impact assessment within this paper which reflects comments received through the consultation process.

Appendix A – Summary of amendments to Exposure Draft of AS TM1 in response to feedback

Consultation question	Paragraph in AS TM1 v5.0	Change
Q3	C.2.15	Where volatility cannot be reliably determined, categorise funds as volatility group 3 for the purpose of determining the accumulation rate
Q3	Various	In multiple places, replaced the term 'pooled fund' with 'investment' to clarify that the statement refers to investment holdings within a DC pension that may be other than pooled funds
Q6	C.2.8	Updated volatility calculation date to consider the 5 year volatility history up to the 30 September preceding the financial year of the calculation
Q8	C.2.15	Require the use of volatility group 3 for investments where volatility cannot be reliably determined, including unquoted assets
Q9	A.1.2	Clarified that other methods producing a materially similar result can be used for aggregating multiple pooled funds
Q10	C.3.3	Clarified that the form of annuity should reflect any underlying legal obligations to provide for pension increases in payment Clarified that the annuity should include allowance for a 5 year guarantee period
Q11	N/A	Removed additional requirements for calculation of annuity rates within 2 years of retirement

Consultation question	Paragraph in AS TM1 v5.0	Change
Q12	C.3.9	Specified the use of core parameters within mortality assumptions
Q13	C.3.12	Clarified that statutory illustrations do not need to be shown both with and without guaranteed annuity terms assumed
Q13	C.2.9	Clarified that the returns used for the calculation of volatility should exclude any discretionary benefits added to the fund, and be net of any expenses or charges which are reflected in the unit price.

Any other amendments to the Exposure Draft are for clarification only, and have not been set out here.

In addition, the guidance document published alongside AS TM1 covers the following areas:

Consultation Question	Area of guidance
Q3	Circumstances in which FRC anticipates volatility cannot be reliably determined
Q5	Application of AS TM1 principles to lifestyling programmes Application of AS TM1 principles to target date funds Circumstances in which derisking is on a programmatic basis
Q6	Application of the corridor when funds move between volatility groups
Q7	Application of AS TM1 for with-profits fund projections



Financial Reporting Council

**Financial
Reporting Council**

8th Floor
125 London Wall
London EC2Y 5AS
+44 (0)20 7492 2300

www.frc.org.uk

Follow us on
 Twitter [@FRCnews](https://twitter.com/FRCnews)
or **Linked** .