CLUB VITA

CMI Working Paper 216

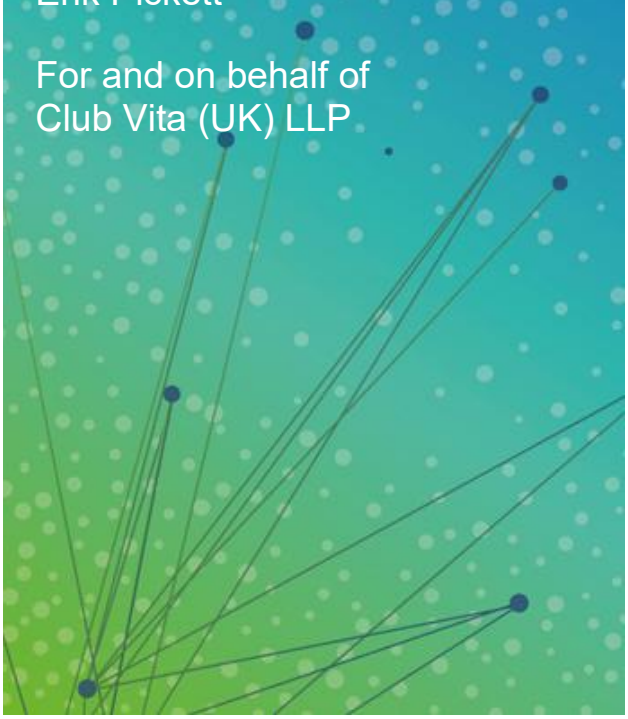
Club Vita's response to the CMI_2026 consultation

November 2026

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For and on behalf of
Club Vita (UK) LLP



Club Vita (UK) LLP

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Club Vita (UK) LLP

Introduction

This document represents Club Vita (UK) LLP's response to the CMI Mortality Projections Committee's Consultation on CMI_2026, as set out in CMI Working Paper 216. We are responding to the consultation in our capacity as a provider of mortality and longevity analytics services to both pension schemes and (re)insurers.

We thank the Projections Committee and CMI Secretariat for their work in producing the working paper and maintaining the CMI Model.

Introductory comments

We welcome the greater transparency provided by the new model parameters paper. Following recent significant model changes, we also broadly support a "steady as she goes" approach for CMI_2026, given the continuing uncertainty over emerging post-COVID trends. We summarise the key themes of our response below.

Uncertainty in current trends: The historically light mortality in the provisional 2026 data raises important questions. Does it signal an acceleration in mortality improvements, represent a lighter-than-average outlier within a continuation of pre-COVID trends, or reflect the knock-on effect of deaths brought forward during the pandemic? We consider all three interpretations plausible and encourage the Committee and users of the CMI Model to remain open-minded as further evidence emerges.

Pandemic treatment: Within the existing fitted overlay framework, we favour retaining a one-year half-life for CMI_2026. In our view, an alternative calibration that excludes 2020–2023 data also provides a plausible projection. We encourage testing both approaches, alongside alternative half-life values, against different mortality scenarios for 2027 and 2028.

Projection assumptions: We favour a flat 20-year age-period convergence period across all ages. This would simplify interpretation and address rapid increases in projected improvements at older ages. On balance, we support retaining the current cohort convergence approach pending further evidence, and the current long-term rate age taper pending the high-age mortality review.

Fostering engagement with projection parameters: We propose making Initial Addition a second Core parameter and age-period convergence an Extended parameter. This would give greater prominence to intuitive parameter choices that materially affect projections, encouraging users to consider them explicitly.

Disclaimer and TAS compliance

This response is addressed to the CMI Mortality Projections Committee and is provided solely for the purpose of providing input to the Committee to support their ongoing work in maintaining the CMI Mortality Projections Model. It has not been prepared for use for any other purpose and should not be so used. This response should not be disclosed to any third party except as required by law or regulatory obligation or with our prior written consent. We accept no liability where this response is used by or disclosed to a third party unless we have expressly accepted such liability in writing. Where this is permitted, the response may only be released or otherwise disclosed in a complete form.

The work associated with drafting this consultation response has been carried out in compliance with TAS 100.

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1 The new Model Parameters paper

Question 1 — Comments on the new model parameters paper

Do you have any comments on the new model parameters paper, released alongside this consultation? For example:

- *Is it useful?*
- *Is it clear how decisions have been made?*
- *Is the length of the paper, and the decision to refer to other papers for details, reasonable?*

We welcome its publication and the greater transparency it provides on model parameters and the decisions underpinning them. We consider it a useful addition to the CMI model documentation suite.

Its scope extends beyond parameters to cover data selection and modelling decisions. A broader title, such as “Data, Modelling Decisions and Parameters”, might better reflect the content and encourage wider engagement.

The comprehensive cross-references are particularly helpful, making it easier to locate supporting analysis on a given topic. Referring readers to other papers for detail is a sensible approach; hyperlinks at the relevant points in the main text, rather than only in the References section, would make this easier still.

To improve clarity, Section 3 of the parameters paper could perhaps be split into two sections: one covering input data and pre-calibration treatments, and the other explaining how the model uses that data to derive initial improvements.

A short explanation of how initial improvement rates are derived would also provide useful context at the start of Section 3 of the parameters paper. Alternatively, a prominent cross-reference to an existing explanation could serve the same purpose.

The paper provides a clear and concise account of the rationale for the decisions made. It also highlights how infrequently some projection parameters have been updated in what is now a longstanding model. We hope this greater transparency will encourage wider debate about parameters that many users will not routinely scrutinise.

On length, we consider the balance appropriate: including substantially more detail could make the paper less accessible to many potential readers.

As a related governance question, how will the Committee establish whether a change in approach for a particular aspect of the model has the support of the majority of users? An annual survey accompanying the paper could provide a way to gather those views and identify areas for particular focus.

2 Half-life assumption

Question 2 — Preferred overlay half-life and rationale
What is your preferred value for the half-life, and why?

Our preferred value for the half-life for CMI_2026 is **one year**.

2.1 Half-life serving two purposes

As we move further into the post-pandemic period, the half-life increasingly serves two distinct purposes:

1 Fitting a plausible trend to pandemic-era experience.

2 Helping to determine the launching-off point for initial rates.

Purpose 1 supports retrospective analysis, such as experience analyses covering the pandemic period. This calls for a "neutral" fit to recent mortality experience, placing equal weight on the fit of the fitted overlay in each year. However, many users will prefer to use observed excess mortality, potentially adjusted for regional or portfolio-specific considerations.

Purpose 2 is, in our view, significantly more important to most users. Directionally, a longer half-life strips out more excess mortality in recent years, implying a stronger underlying trend (lower mortality and higher life expectancy) during the pandemic era and hence in the projection.

The consultation paper highlights that a longer half-life provides a better fit to 2020-26 data. We might therefore favour a longer half-life (say 1.5 years) if the primary purpose were an overall fit to pandemic and post-pandemic experience. However, our response focusses on Purpose 2.

When setting an appropriate launching-off point, we believe a half-life greater than a year allows for too strong a projection based on the cumulative evidence at the time of writing. Supporting such a projection as a best estimate would, in our view, require stronger evidence of an acceleration in improvements relative to the general trend seen during the 2010s than is provided by the data up to and including the provisional 2026 data described in the consultation paper.

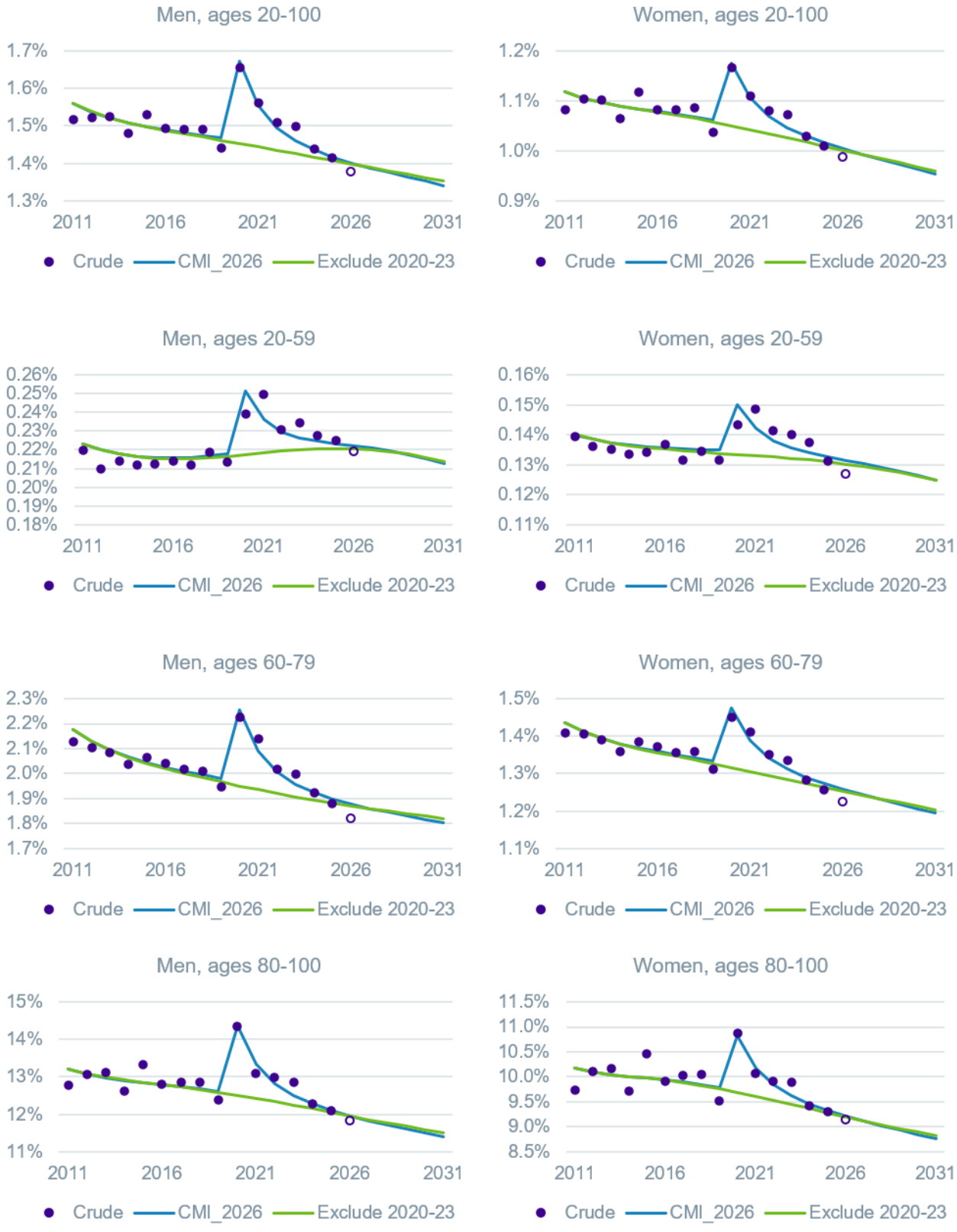
2.2 Alternative approach to post-COVID data

We note that Charts 3A–3H in the consultation suggest that the candidate CMI_2026 projection does not always fit experience during 2024–2026 closely, particularly for men and women aged 60–79 (Charts 3E and 3F). One possible explanation is that the half-life giving the best overall fit may not provide the best fit for each age group and/or subperiod of the post-2019 calibration period.

With the benefit of mortality data covering the period up to the end of 2026, we think there is an argument for not making even modest adjustments to post-2023 data. Each data point since 2023 appears broadly consistent with a continuation of pre-pandemic trends. We recognise, however, that Chart 5J indicates residual COVID deaths in 2024 and 2025, providing some supporting evidence for applying some form of COVID adjustment for those years.

This raises a separate question from the precise choice of half-life: whether excluding the 2020–2023 data entirely, using the W parameter, might provide a better fit to recent experience across all age groups. Below, we compare this alternative approach with the candidate CMI_2026 approach for each age range considered in the consultation paper, focusing on the fit to 2024–2026 mortality and its relevance when setting a post-pandemic base table.

Age-standardised mortality rates for men and women across different age ranges



Our CMI_2026 runs use the same 2026 Scenario as used by the authors of the consultation paper to set the number of deaths in 2026, but do not adjust the population data for more recent ONS publications.

One simple measure to assess the 2024–26 fit is to compare crude mortality averaged over 2024–26 with the fitted value for 2025. This is particularly pertinent to organisations that wish to set a post-COVID base table assumption, for example one centred on 2025, and hence will use a 2025-based launching-off point.

Sex & Age Group	ASMR difference between Crude 2024-26 average and Fitted 2025 value	
	CMI_2026	Exclude 2020-23
Men, ages 20-100	0.6%	**-0.1%**
Women, ages 20-100	0.8%	**0.1%**
Men, ages 20-59	**-0.3%**	-1.5%
Women, ages 20-59	0.7%	-0.7%
Men, ages 60-79	1.3%	**0.4%**
Women, ages 60-79	1.5%	**0.7%**
Men, ages 80-100	0.3%	**-0.2%**
Women, ages 80-100	0.4%	**-0.2%**

The smaller absolute difference in each row is shown in **bold** where there is no tie. On this measure, excluding the 2020–2023 data gives a closer fit in six of the eight comparisons. In our view, these results support considering the alternative approach, particularly in relation to combining the projection with a post-pandemic base table (for example, a table based on 2024–26 data and centred on 2025) for pensioner lives.

We note, based on the charts on the previous page, that this alternative approach generally leads to a slightly weaker short-term projection. This is primarily because it does not allow for the unwinding of the residual fitted overlay present in the 2024–26 data, as the Core CMI model does. In our view, this alternative approach gives an equally plausible projection, which has the benefit of adhering more closely to the latest three years of data.

A key question is to what extent the very light mortality seen during 2026 will be repeated during 2027 and 2028. That will help indicate whether we are now entering a period of stronger post-COVID mortality improvements, or whether 2026 will prove to be an unusually light outlier year.

2.3 Responsiveness of model to 2027 and 2028

We would encourage the Committee to consider excluding the 2020–2023 data alongside the candidate half-life values shown in the consultation paper.

In doing so, we believe it would be particularly useful to assess how each approach responds to different scenarios for 2027 and 2028. For example:

- **2026 as an outlier:** If the light mortality in 2025 and 2026 reflects forward displacement, mortality in 2027 and 2028 may be heavier than in 2026.
- **2026 as a harbinger:** If stronger post-COVID improvements represent an emerging trend, mortality in 2027 and 2028 would continue the downward path seen during 2024–26.

Such analysis would help users assess whether fitted overlay-based projections are likely to stand the test of time and, if so, what value of half-life would be both reasonable and sustainable.

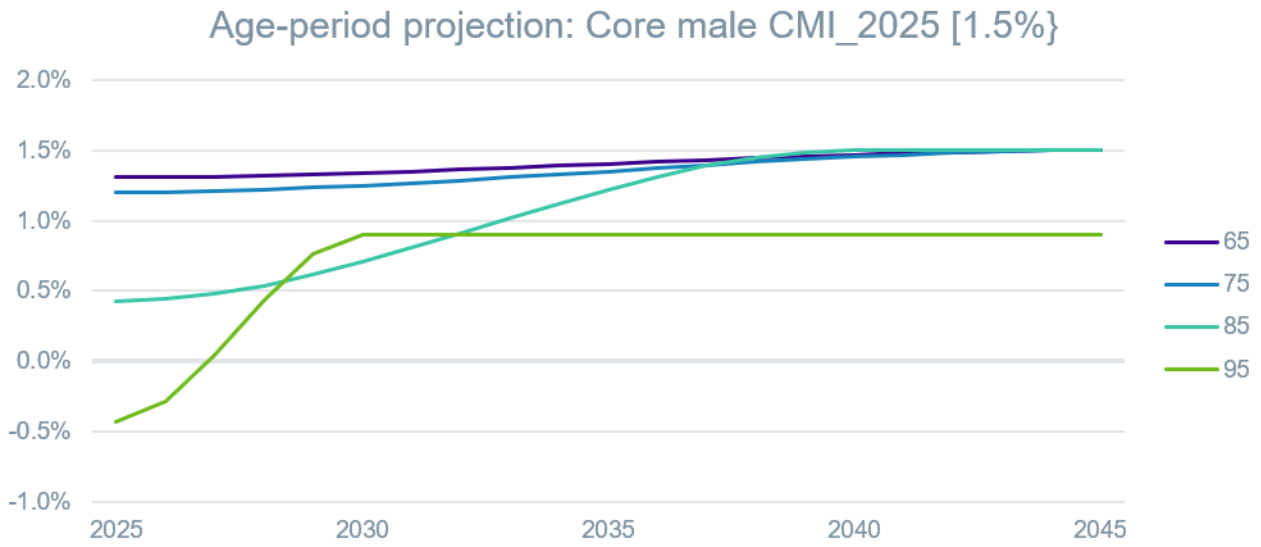
3 Projection assumptions: age-period effect

Question 3 — Preferred approach for age-period convergence periods and rationale

What is your preferred approach for the age-period [and cohort] convergence periods, and why?

3.1 Age-period convergence period

Our preferred approach is to simplify the age-period convergence period so that it is the same at all ages. This would simplify the age structure, making the parameter easier to interpret. It would also address the concern discussed in Section 6.3 of the consultation: under current conditions, shorter convergence periods at older ages produce a rapid increase in projected improvements. We illustrate this rapid convergence at age 95 below. This chart also highlights a counterintuitive crossover with improvements at intermediate ages (specifically age 85), where convergence takes longer.



Whilst we can see an argument for shortening the flat convergence period to 15 years, on balance we favour retaining the headline 20-year period.

3.2 Should the age-period convergence period vary by age?

We question whether age-varying convergence periods remain justified. The parameter can be interpreted intuitively as the time taken for current improvements to blend into the user's long-term assumption. Yet users who set only the long-term rate may not appreciate that the time taken to reach their chosen value varies by age. A convergence period that does not vary by age would give "long-term" a clearer and more consistent meaning. The original rationale, as described in the CMI_2025 v02 Parameters paper, also merits revisiting: these assumptions were developed against the longevity landscape of the late 2000s, when emerging improvements were substantially higher than they are today.

We also note that under its current construction, the age taper applied to the long-term rate implicitly assumes an element of "ageing of improvements", at least for men. This is illustrated in Chart 6C of the consultation paper. It seems inconsistent to then assume that mortality improvements at older ages will converge rapidly to this long-term rate.

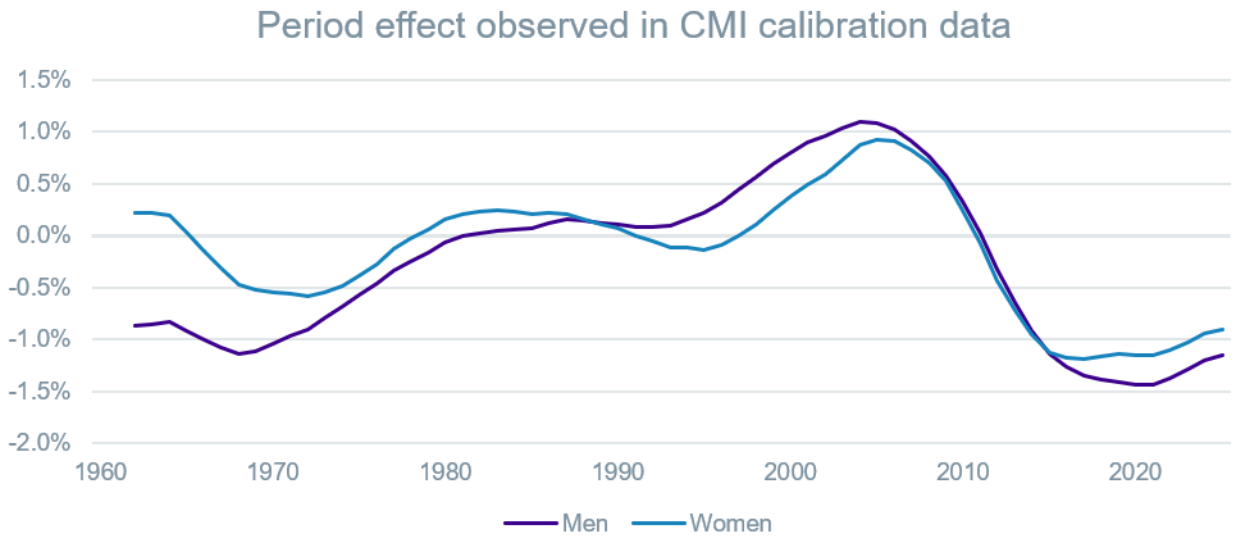
3.3 What should the headline convergence period be?

The choice is most material when initial improvements differ substantially from the long-term assumption: the key question is how long an unusually high or low starting rate should influence the projection. A longer period

places greater weight on initial improvements and can make successive projections more sensitive to changes in recent experience. A shorter period also gives greater weight to the user's long-term view.

However, a drawback of a shorter convergence period is that, if data emerges in line with the projection, pushing out convergence to the long-term rate by a calendar year in the next model update can have a relatively greater impact.

Historical variation in the fitted period effect for England & Wales provides some context for making a judgement on the convergence period:



The chart shows the fitted period effect from CMI_2025, calibrated from 1961 using a single period term and otherwise Core settings.

The historical pattern illustrated above, most clearly in the female data, comprises three peaks and subsequent troughs over the 64-year period assessed. For men, the pattern is less clear, although we do see inflexion points around 1980 and 1993 whose timing is consistent with the female peaks and troughs. This provides mixed evidence. The female fluctuations are consistent with an expectation that peaks and troughs in mortality improvements will tend to resolve themselves over periods somewhat shorter than 20 years and might support a shorter headline convergence period. The male fluctuations, however, suggest that we can see much more prolonged periods of sustained higher-than-average improvements.

On the balance of evidence, and in the interests of stability, we therefore propose retaining a headline 20-year age-period convergence period.

Finally, we note the original rationale for having a shorter convergence period at younger ages: "mortality improvements at younger ages tended to change relatively rapidly". If anything, under the new multiple period terms framework, this is more pertinent than before. However, accepting that our main interest as an organisation is in pensioner-age mortality, we believe the advantage of a simpler model outweighs what we see as a marginal argument for retaining a shorter convergence period for under-50s to reflect this additional uncertainty. As noted in the consultation paper, users can modify the model's parameters or methods to reflect their own views, including when modelling younger-age mortality.

3.4 Observations on “speed limit” approach

We thank the Committee for its analysis outlining potential alternative approaches to setting the convergence period, including the “speed limit” approach. This approach is attractive because it provides a mechanism for resilience when short-term improvements differ significantly from the long-term rate. When initial improvements are close to the long-term rate, both the period and shape of convergence have limited impact on projections.

We support **not** introducing further complexity into the model at this stage. Instead, we would focus on addressing the potential issue at older ages under the current convergence period assumptions, as the CMI has done. However, we believe the “speed limit” approach would be a useful area for future consideration.

3.5 Age-period convergence period as a more prominent parameter

Expressing the convergence parameter as a single value across all ages would make the choice of convergence period easier to interpret and adjust. If the Committee were also to designate this single value as an Extended parameter, this might encourage users to consider it explicitly in combination with their choice of long-term rate.

4 Projection assumptions: cohort effect

Question 3 — Preferred approach for cohort convergence periods and rationale

What is your preferred approach for the [age-period and] cohort convergence periods, and why?

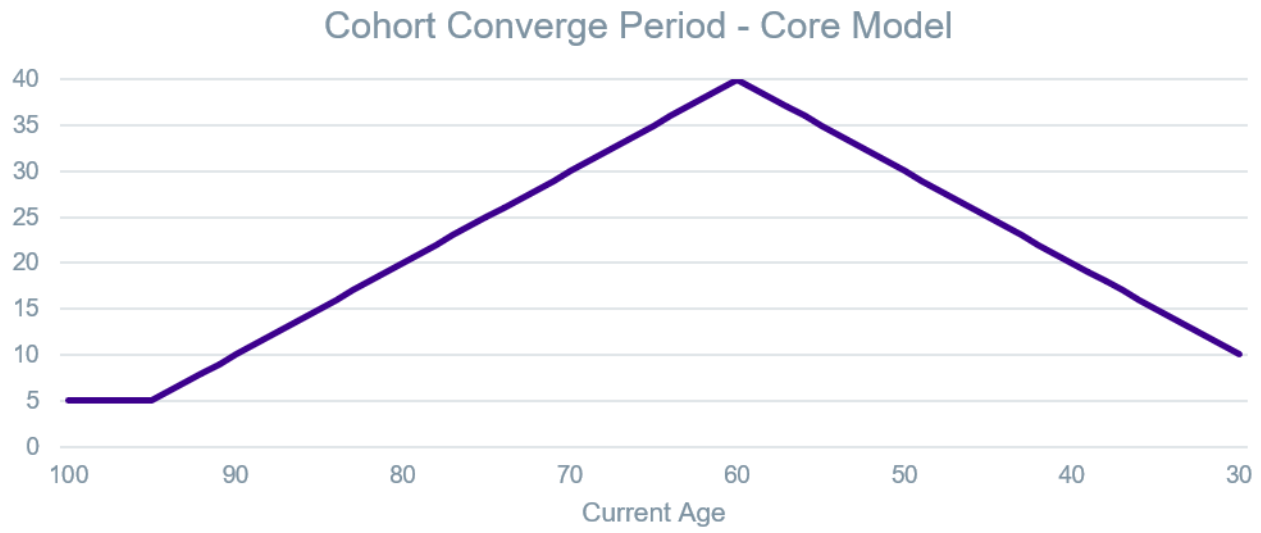
We believe the current approach to setting the cohort convergence period is a reasonable one.

We can see qualitative arguments for changing the age shape of cohort convergence periods (for example, having a maximum convergence period of 30 years applying between current ages 50 and 70 and then tapering to a 10-year convergence period for the birth cohorts aged 30 and younger). However, based on our analysis, we do not think a change is justified at the present time.

4.1 Current approach to projecting cohort effects

The cohort convergence period under the current Core CMI model has the following features:

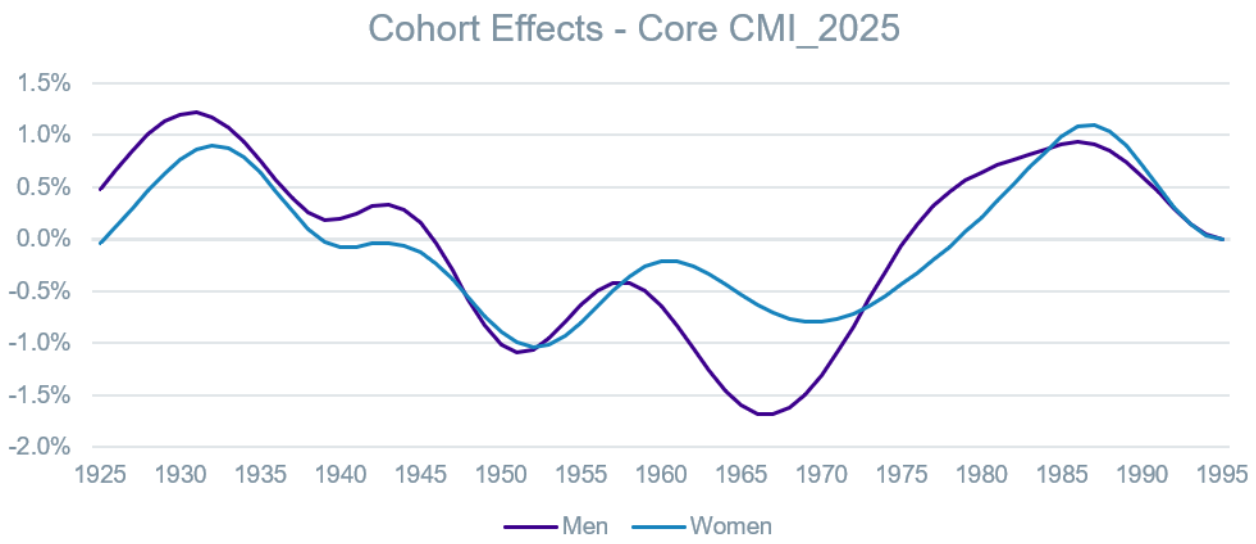
- For those aged 95 and over, the convergence period is 5 years.
- For those aged between 60 and 94, the convergence period covers the period up to their 100th birthday.
- For those aged below 60, the convergence period tapers by 1 year per year, reaching 10 years for those aged 30 and below.



We believe that, at older ages, converging the cohort effect to zero by age 100 (or over the next five years for birth cohorts aged 95 and over) is a plausible approach. We also agree with the principle that, at the youngest ages, we are working with extremely limited evidence for a persistent cohort effect and therefore a very short convergence period is justified.

The key question is whether the tapering away from an end age of 100 should begin at age 60 (e.g. birth year 1965 in CMI_2025) or at an older age. We note that this is a particularly material question for male projections under current conditions due to the pronounced negative cohort effect centred on birth year 1967, as discussed further below.

To illustrate this discussion, we show below the cohort terms for men and women in the Core CMI_2025 model.



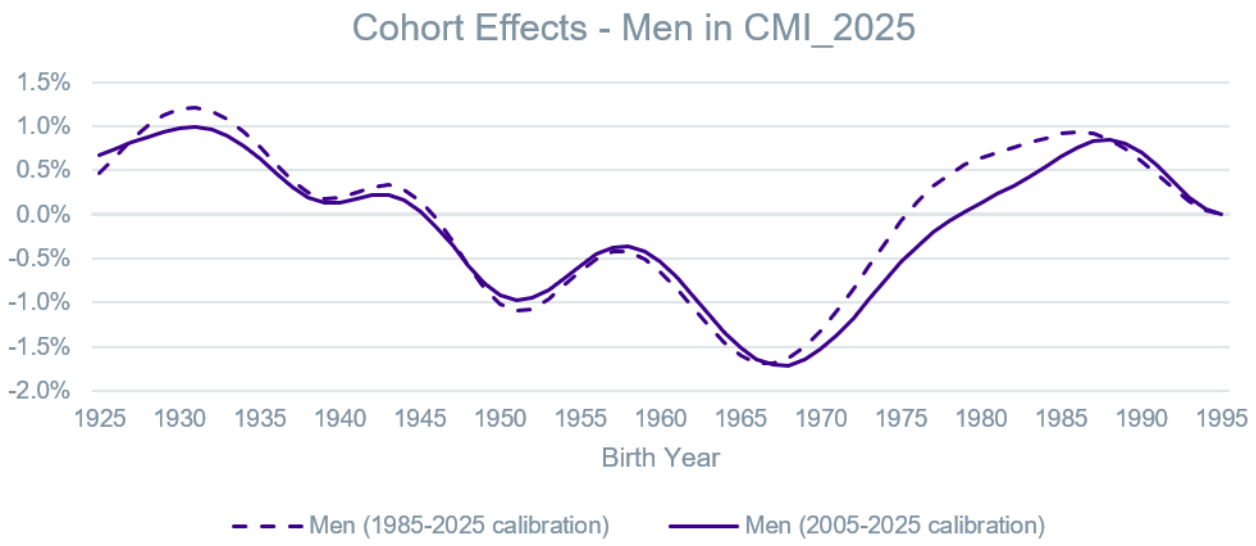
In this chart, we can clearly see the classic "golden cohort" feature centred on those born in the early 1930s. This feature of UK mortality is well established and rightly represents a longstanding feature of mortality projections. However, successfully capturing that feature is becoming less material to most users of the model as that cohort reaches its 90s. Cohort effects amongst younger groups within the pensioner age range (say, birth years up to and including 1960), whilst showing some interesting features, are relatively modest and largely serve to cumulatively run off the golden cohort effect.

4.2 Should cohort effects at intermediate ages be so strongly persisted?

Turning to non-pensioner ages, we see a clear negative cohort feature for men, centred on birth year 1967. Under the Core CMI_2025 model, this negative cohort effect persists (albeit increasingly converging to zero) for a full 38 years, until that birth cohort's 96th birthday. A key question is whether this is justified, based on what we know about that generation of lives.

A commonly expressed hypothesis is that this mortality feature is associated with the AIDS epidemic in combination with historically high levels of heroin use during the 1980s and 1990s. Given that most men of that generation alive today were not directly affected by either of these historical events, we might expect the knock-on effects on older-age mortality to be more limited than those associated with the society-wide drivers underlying the golden cohort phenomenon.

One way to assess whether this feature is likely to persist is to examine the extent to which the cohort effect remains in calibration data from later years, as that birth cohort ages. Below, we compare the cohort effect generated by the Core CMI_2025 model with that from a run using Core CMI_2025 settings, but with the calibration period restricted to 2005–2025, covering that cohort's late 30s through to late 50s:



Interestingly, we see that the effect centred on the 1967 birth year fully persists even if we exclude pre-2005 data. This gives us some confidence that it is reasonable to allow the effect to persist into the medium-term future and allays concerns that we might be applying significantly too weak a projection for that cohort.

We also see that the golden cohort feature largely persists into that generation's later years, justifying the general approach of allowing cohort effects to persist until members of older generations reach their 100th birthdays.

Finally, we see that cohort effects amongst younger cohorts are lower when pre-2005 data are excluded. This is surprising, as those cohorts contribute only limited data to the pre-2005 window, but we have not explored this observation in any detail.

Taken together, the first two observations provide some support for retaining the current cohort convergence approach. We therefore favour retaining the current approach whilst periodically monitoring emerging experience, particularly in relation to the negative male cohort feature centred on 1967, given its increasing prominence as that generation reaches retirement age.

5 Projection assumptions: age taper and other aspects

Question 4 — Preferred approach for taper of the age-period long-term rate and rationale

What is your preferred approach for the taper of the long-term rate for the age-period component, and why?

5.1 Taper of age-period long-term rate

On stability grounds, our preferred approach would be to retain the current taper (linear from age 85 to age 110) pending the conclusions of the high-age mortality review. Given the limited signal provided during the COVID pandemic, there appears to have been insufficient additional evidence since the last review in 2016 to justify changing the tapering approach.

Question 5 — Comments on other aspects of projections

Do you have any comments on other aspects of projections?

5.2 Initial Addition as a second Core parameter

The Projections Committee consistently—and, in our opinion, rightly—encourages users to consider adjusting model parameters to reflect the characteristics of the specific population to which the model is being applied. In our experience, the most common approach adopted by users for this purpose is to adjust the Initial Addition.

Most users of the CMI Model apply it to a population other than the overall England & Wales population. Requiring users to make an active decision on this parameter may help ensure that they explicitly consider the characteristics of their population when using the model.

5.3 Choice of Extended parameters

In our view, a parameter should meet two conditions to warrant Extended status:

1 Moving from the Core value to a plausible alternative materially affects the resulting projection.

2 The parameter is sufficiently intuitive for non-specialists to understand what it represents and how it impacts the projection, and to form a view on its appropriate value.

The Initial Addition parameter meets both these conditions. By contrast, the half-life is less intuitive and has a more limited impact on projections, as shown in Table 5.4 of the consultation paper.

Age-period convergence is, in our view, the strongest candidate for promotion to Extended status. As Table 6.2 of the consultation paper shows, it can materially affect mortality projections and has an intuitive interpretation. However, under the current parameterisation, the fact that the convergence period varies by age (alongside the requirement for integer values at each age) makes this difficult to express as a single choice of value.

5.4 Encouraging exploration of alternative convergence shapes

We support retaining the current Core convergence shape. However, in our experience, engagement with its ongoing plausibility and the impact of adopting alternative shapes is very limited.

The “Specify Proportion at Midpoint” parameter seemingly offers a great deal of flexibility in setting convergence shapes. However, its unintuitive behaviour can discourage users from exploring plausible alternative shapes and their effects on projections. The response to changes in the specified proportion can vary substantially and sometimes counterintuitively, depending on which of the initial and long-term rates is higher and the size of the gap between them. This means that a single alternative value (say, 25% or 75% rather than 50%) will often lead to an implausible set of shapes across the age range. We wonder whether this functionality within the model would benefit from a rethink to encourage users to engage with alternative convergence shapes in both the age-period and cohort dimensions.

6 High-age population estimates

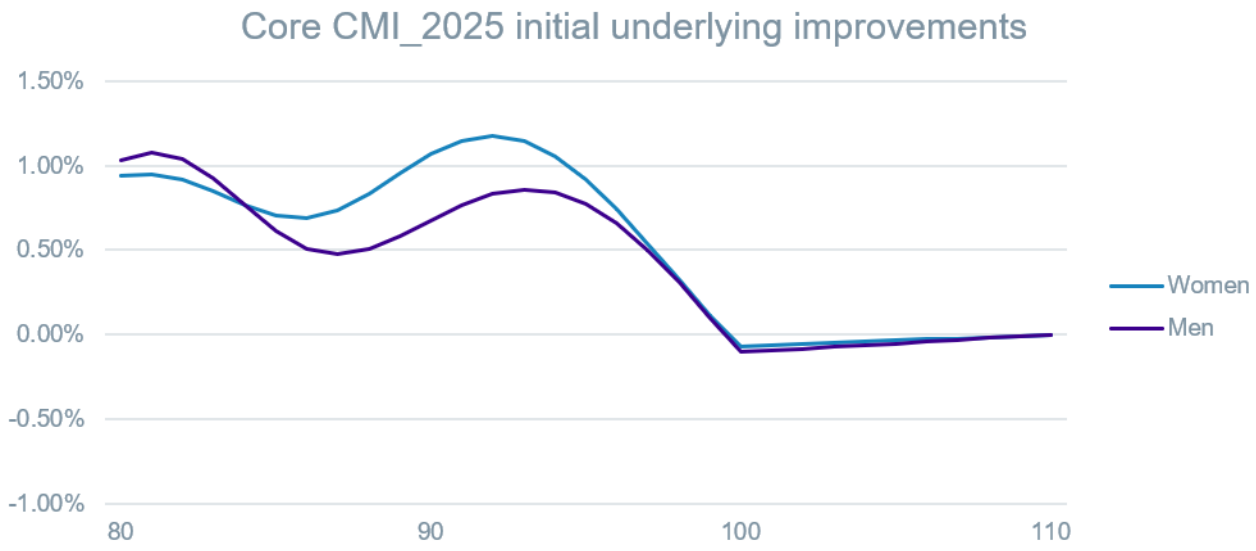
Question 6 — Review to date and further areas for investigation

We have described our initial review and further areas to investigate. Do you have any comments on the review so far and our plans? Are there any important areas that we have missed?

Time has not permitted a thorough review of the existing approach and the material presented.

Based on Charts 7E and 7F, we observe that the ONS approach appears to give far more intuitive results for underlying improvements at ages 95 and beyond.

We also note that initial improvements at older ages in the Core CMI_2025 model were positive or only very slightly negative, more in line with the ONS improvements presented and with what we might intuitively expect. We show these in the chart below.



Our reading of the consultation paper is that the only difference between the “CMI 85” initial improvements shown in Charts 7E and 7F and the improvements shown above is the use of new ONS population data published in July 2026. If this reading is correct, it suggests that the updated population data had a material effect on fitted initial improvements at older ages. The significant changes in population estimates, particularly at the oldest ages and in 2025, are highlighted in Appendix 2 of the consultation.

One approach might be to analyse the ONS data before and after the recent changes through the lens of the CMI model: what would the initial improvements have looked like using ONS population data prior to the July 2026 revision? Do the changes made by the ONS partly or fully address the concerns that led the Projections Committee to take a different approach originally? This may provide useful information on how the CMI’s current approach at older ages should be adapted, or indeed whether the ONS approach is now suitable for use without adjustment.

Finally, we encourage the Committee to continue investigating the impact of the pandemic on high-age population estimates. The analysis in Sections 7.4 and 7.5 suggests that the linear projection of survivor ratios underlying the current method may be less reliable following the pandemic. This warrants further investigation, particularly given that the next census-based reassessment of population estimates would not be available until after 2031.

7 Non-calendar year data

Question 7 — Continued use of calendar year data

Are you comfortable with our proposal to continue to use calendar year data? If not, what is your preferred approach?

We support retaining calendar-year data for calibration of the Core model. We also welcome the analysis in Section 8 of the consultation paper: it provides useful reassurance that this familiar and convenient convention remains reasonable.

We found the volatility results particularly persuasive. Section 8.5 shows that calendar years have the lowest volatility in eleven of the twelve combinations of sex, measure and historical period tested, and are a close second in the remaining case. Splitting winter mortality between adjacent years seems a plausible explanation for this result.

An important practical consideration is model release timing. Section 8.2 uses a custom ONS monthly deaths dataset extending to December 2025 but does not say how promptly equivalent data could be supplied for a routine non-calendar-year calibration. Population estimates for the alternative periods were interpolated from existing mid-year estimates. Could sufficiently timely deaths data and suitable population estimates support an earlier release following a different year-end? Without a corresponding earlier release, the practical case for changing the calibration year appears weaker.

Any change would also need to be considered alongside the effective dates of base mortality assumptions and the systems used to apply improvements. Standard tables would not necessarily have to be republished at a different date, but users would collectively need to agree a clear and consistent way to align their effective dates with the shifted projection timeline to maintain the “common currency” aspect of standard tables. Software and processes built around calendar-year projections could require adaptation, so implementation costs would extend far beyond the CMI’s calibration process.

In summary, any benefit of changing the calibration year does not appear sufficient to outweigh the potential adaptation costs for users and the uncertainty over data availability and release timing relative to the current approach. In addition, the analysis in the paper does not identify any particular alternative approach as preferable to using calendar years. Our strong preference is therefore to retain calendar years for the Core model, while continuing to use alternative periods as a periodic sensitivity test and a means of exploring emerging mortality patterns.

Would the Committee consider releasing one or more alternative calibration datasets for users to explore? A July-to-June period would seem the most obvious candidate.

8 Mortality selection

Question 8 — Materiality of mortality selection and further investigation

Do you agree with our view that the impact of mortality selection is small and not worth further investigation? If not, what is your assessment of the impact of mortality selection?

We agree that making an explicit allowance for mortality selection in the CMI Model (and hence adding further complexity to what is already an extremely complex model) would not be appropriate. Given its transient nature, explicitly anticipating mortality selection in the CMI Model would also be highly subjective.

However, the question of the short- to medium-term impact of the pandemic on population health and hence mortality rates is an important one **and merits further investigation**. Given the uncertainty surrounding emerging trends based on limited post-COVID evidence, we would expect more advanced users of the model to reflect their own interpretation of the data using the flexibility already present in the model.

We note that the discussion in the consultation focuses on an expectation that the population surviving the pandemic will have a higher life expectancy. However, there are several ways in which the pandemic could have affected mortality. For example:

- **Forward displacement:** Deaths were brought forward amongst frailer elements of the population, leading to a "shortfall" in deaths in the latest observations.
- **Scarring**: The population is in poorer health following COVID infection or due to delayed diagnosis and treatment.
- **Trend change:** The underlying trend could have changed during or immediately after the pandemic, and this could be masked in the limited data we have on post-COVID trends.

We believe the CMI is referring to forward displacement when describing selection in the consultation document, but the paper would benefit from clarifying this.

Although forward displacement has been suggested as an explanation for the strong mortality improvements seen in 2025 and 2026, the pandemic's net effect on population health (and how this varies by age) remains unclear. We suggest that alternative approaches to analysing the period could lead to different conclusions about the pandemic's effects. As such, we believe that, in stating that the impact of selection is small, the CMI risks steering the industry towards a specific interpretation. Data for 2027 and 2028 should help clarify this, and we would encourage more circumspect commentary from the CMI.

9 Projected life expectancy

Questions 9 & 10 — Male and Female life expectancy at age 65

Setting aside any opinion on the methods used, how does the male/female life expectancy at age 65 shown in bold in Table 3.1 compare to your best-estimate view based on mortality improvements for the general population of England & Wales?

- *The Table 3.1 figure is more than 1.5% higher than your view*
- *The Table 3.1 figure is between 0.5% and 1.5% higher than your view*
- *The Table 3.1 figure is within 0.5% of your view*
- *The Table 3.1 figure is between 0.5% and 1.5% lower than your view*
- *The Table 3.1 figure is more than 1.5% lower than your view*

We do not have a single best-estimate view. However, we are comfortable that the proposed Core CMI_2026 model is within a reasonable range of best estimates for a current 65-year-old.

As highlighted in Sections 2 and 8 of this response, recent mortality experience can be interpreted in a wide range of ways. Because of this, in our view, the range of reasonable best estimates is particularly wide under current conditions.

9.1 Observation on articulation of this question

We interpret this pair of questions as seeking views on the aggregate strength of those aspects of the parameterisation that are set by the Projections Committee. We think this means that respondents should not include their own choice of headline long-term rate in their assessment. Explicit guidance on this point in future consultations would help ensure consistent and comparable consultation responses.

Question 11 — Further comments including variation by age

Do you have any further comments on this? For example, how your response would vary by age?

Our comments in this paper are largely focussed on pensioner-age mortality. We have not formed a view on whether the life expectancies at ages 25 and 45 are within a reasonable range.

10 Other comments on the Model

Question 12 — Further comments on the Model

Do you have any further comments on any aspect of the Model that you would like to bring to our attention?

10.1 Half-life as an Advanced parameter

As discussed in Sections 2.1 and 5.3 of this response, we see little reason to retain the half-life as an Extended parameter. In our view, its meaning and the way it affects projections are not sufficiently intuitive to merit its current prominence in the model. Advanced users of the model will still be able to set the half-life as they see fit.

10.2 APCOI model parsimony

Whilst we have not carried out a full investigation of this point, we suspect that a similar level of granularity in historical and current improvements, split by age-period and cohort effects, could be achieved using fewer dimensions than are currently used in the APCOI model.

Specifically, whilst we see the rationale for varying the age effect over the calibration period via the new multiple period terms feature, we are not clear whether it is necessary to fit both an aggregate age effect and a period effect that varies by age.

Because of this multidimensionality, we find it hard to conceptualise the current structure of the model. An approach that more directly models and expresses how current underlying mortality improvements vary by age, whilst continuing to allow for cohort and COVID effects, would, in our view, help users engage with this important aspect of the model.

10.3 Fitted Overlay or Underlying Trend in naming convention

CMI Working Paper 214 emphasises the need for consistency between base mortality and improvement assumptions, distinguishing total projections, including the fitted overlay, from underlying projections. To help users select the appropriate approach for their purposes and communicate their choice to third parties, we suggest distinguishing total and underlying projections in the CMI Model naming convention.

Another useful feature to encourage engagement with this decision would be to enable users to select either approach on the Main input sheet. We note that this would be a more invasive change to the current model structure than a simple change to the naming convention.

11 Mortality monitors and benchmarking survey

Question 13 — Interactive web format for the summary mortality monitor

We intend to change the format of the summary mortality monitor from a static PDF file to an interactive web page. Would you see this change as positive, neutral, or negative?

We would see this change as positive.

Encouraging wider engagement with emerging trends and their likely impact on projections is particularly important in current conditions. The expected further strengthening of the CMI model, as described in the consultation paper, should come as no surprise to those who have been following the monitor throughout the year.

Question 14 — Other comments on mortality monitors

Do you have any other comments on the mortality monitors?

We find that the chart comparing the emerging SMR with the 2016–2025 average (Chart 2 in the summary monitor and Chart D in the quarterly monitor) provides limited insight into emerging mortality during the year, especially given the inclusion of the COVID years.

A more useful chart would compare the emerging cumulative SMR with that expected based on the most recent Core CMI model, with the expected value including an appropriate allowance for seasonality.

Question 15 — Shortening and improving the survey results paper

We published the results of our 2026 benchmarking survey in Working Paper 213 in June 2026. We are conscious that the results working paper is long so we sought feedback on ways to shorten and improve it. We would welcome further views on this.

Given the limited drafting time, we have focused on questions relating directly to the CMI model and have not responded to this question.

12 Wider work and research priorities

Question 16 — Suggestions for the 2027–2028 CMI year

We are starting to consider our plans for the 2027-2028 CMI year. Do you have any suggestions for areas of research or other work?

12.1 Population estimates and emerging trends at younger ages

In recent years, net immigration has dropped materially from its peak during 2022–23. The current approach to population estimates at younger ages is based on a six-year average and will materially overstate the under-40 population. We also note the uncertainty surrounding the accuracy of the net immigration rates reflected in the ONS population estimates.

As highlighted in the paper, population estimates and hence mortality improvements are less certain amongst under-40s. We note that this issue was explored in CMI Working Paper 211 and believe that it merits continued monitoring, especially given the long period until the next census and the potential for actual migration to differ from estimates.

12.2 Registrations vs occurrences data

We welcome the investigations on this topic described in Appendix 8 of CMI Working Paper 211. We encourage the CMI to continue exploring data availability with the ONS and sharing relevant datasets and associated insights with users.

12.3 Workshops on more technical points in the model

Each year, we strive to provide comprehensive and thoughtful responses to the CMI Model consultation questions. It can, however, be difficult to give sufficient attention to several diverse technical areas within a broad consultation.

We believe that some of these more technical topics would benefit from a more focussed and discursive approach, where follow-up questions can be asked and misapprehensions can be addressed.

We would be happy to provide a sounding board and technical challenge on some of these areas outside the consultation cycle.