CONSULTATION ON THE REFORM TO THE RETAIL PRICES INDEX METHODOLOGY

RESPONSE FROM THE PENSION PROTECTION FUND

21 AUGUST 2020

About the PPF

The Pension Protection Fund (PPF) was established to pay compensation to members of eligible defined benefit pension schemes, when there is a qualifying insolvency event in relation to the employer and where there are insufficient assets in the pension scheme to cover PPF levels of compensation.

The PPF is a statutory fund run by the Board of the PPF, a statutory corporation established under the provisions of the Pensions Act 2004. The PPF became operational on 6 April 2005.

On 10 July 2009 the Board of the PPF was also given the responsibility of being the scheme manager for the Financial Assistance Scheme (FAS). FAS provides assistance to members of eligible underfunded defined benefit schemes that started to wind-up between 1 January 1997 and 5 April 2005, or between 6 April 2005 and 27 March 2014 where an employer insolvency event occurred before 6 April 2005.

General comments

The Pension Protection Fund provides compensation to members of defined benefit (DB) schemes where their employer becomes insolvent and the pension scheme cannot secure the level of compensation we provide (i.e. it has a PPF deficit). As at 31 March 2019 we had £32bn of assets under management and 250,000 members.

We repair the deficits we inherit through a compulsory levy on eligible schemes but also (and most critically) through the returns we make on investments. Our investments are designed to match movements in our liabilities whilst also providing some outperformance.

Although our liabilities are indexed by reference to CPI, the absence of a liquid CPI market means we largely use the RPI-Linked Gilt and RPI derivative markets (together with an assumption about the difference between the two indices) to hedge our liabilities against inflation risk. The effectiveness of this strategy is important to our long term viability and to limit calls on our levy payers.

All else equal, the proposed change to the construction of the RPI index will cause the value of our inflation hedging assets to fall with no corresponding change in our liabilities. Assuming the change takes effect in 2030 we estimate this negative balance sheet impact will be in the order of £1bn, relative to the counterfactual where the change is ruled out. This increases to £1.3bn if the change is implemented in 2025. As inflation-linked markets have already partly adjusted in anticipation of the changes, part of this negative balance sheet impact has been felt already.

We are also concerned about impacts on the DB schemes we protect and their members. As recognised in the consultation document, DB schemes also largely use RPI linked assets to hedge their liabilities against inflation risk.

Some DB schemes will find that their funding level is not adversely impacted in a material way by the change and indeed may improve if they have liabilities indexed to RPI greater than their RPI-linked assets.

Instead it is members in these schemes that will bear the brunt of the impact: where scheme benefits increase in line with RPI, the proposed methodology changes means that there will be a significant reduction in the value of pension received over their lifetime. The recent Pensions Policy Institute briefing paper quotes illustrative reductions for members of schemes where indexation in payment and deferment is linked to RPI (based on implementation of the proposals in 2025) of eight or nine per cent for pensioners (currently aged 65) and 17 or 18 per cent for older deferred pensioners (currently aged 55). This latter figure could increase to around 30 per cent for deferred pensioners currently aged 40.

A significant minority of schemes – like us – have CPI based liabilities. Indexation in payment is likely to be the most significant factor in play here, particularly as many members who are currently deferred pensioners will have retired by such time as the consultation proposals come into effect and would therefore not be impacted by changes to revaluation. Around 35% of DB scheme payments to retired members are now based on CPI indexation. These schemes could therefore face a substantial balance sheet impact: seeing a fall in asset values where index linked bonds are held with no corresponding change in liabilities. Our estimate is that their aggregate funding position could worsen by around £10 billion to £20 billion if the proposals were implemented in 2030 and £25 to £35 billion if the change takes effect in 2025, relative to their funding position prior to inflation-linked markets beginning to factor in the prospect of the proposed changes.

These are clearly very significant impacts and somewhat perversely those schemes that have been acting most prudently in trying to protect themselves from inflation risk are more likely to be adversely impacted. The changes in scheme funding are most likely to lead to increased requirements being placed on employers in the form of higher deficit reduction contributions and come at a time when scheme sponsors are already facing significant pressures as the result of the current economic downturn. Ultimately, they could contribute to individual DB schemes being unable to pay member benefits in full, and a higher value of claims on us.

Given the impacts, the proposed changes raise important questions of fairness. RPI assets were bought by ourselves and DB pension schemes in good faith (particularly given a range of consultations that concluded RPI should continue unchanged as a legacy measure). Asset holders now face double digit reductions in value over the lifetime of some assets. Looked at another way, it could be said that savings to the Government from reduced payments on the stock of index linked gilts are being funded – in part – by pension schemes and their members.

Pension Protection Fund

We therefore believe the Government should do what it can to reduce the negative consequences of this change. In the context of this consultation that would mean refusing permission for the change to be introduced earlier than 2030.

We have expanded further on the impacts of the proposed changes in the responses below to the individual questions in the consultation. We have not responded to every question, but have instead focused on where we believe we have relevant information that we hope will help inform consideration of the issues.

Q2 What will be the impact on the interests of holders of 'relevant' index linked gilts of addressing the shortcomings of the RPI in a) 2025 b) 2030 or c) any year in between?

In assessing the impact on the interest of holders of index linked gilts we consider the expected value of those gilts if RPI is irreversibly aligned to CPIH at a future date between 2025 and 2030 relative to a counterfactual where the RPI methodology remains unchanged and the possibility of future alignment is ruled out.

It is worth noting that since the publication of the exchange of letters between the Chancellor and the UKSA in September 2019, the price of index linked gilts already incorporates market expectations that the change is likely to happen. By comparing the prices of RPI-linked and CPI-linked swaps since then we estimate that the derivatives market is pricing approximately 60% probability of RPI being aligned to CPIH in 2030.

Of the 'relevant' index-linked gilts, holders of bonds maturing in 2020 and 2024 are not impacted by any of the suggested timings as both mature before any change would be made to the RPI.

Holders of bonds maturing in 2030 are impacted though, with estimates given in the below[1]:

Year	2025	2026	2027	2028	2029	2030
Estimated impact on holdings of 2030 index-linked gilt	-3.3% -£600m	-2.6% -£470m	-1.9% -£345m	-1.2% -£218m	-0.5% -£90m	-

The PPF's own holdings of 'relevant' index linked gilts – purchased on the secondary market - are minimal.

Q3 What will be the impact on the interests of holders of all other index-linked gilts of addressing the shortcomings of the RPI in a) 2025 b) 2030 or c) any year in between?

[1] Estimates of the changes in index-linked gilt prices calculated as at 31st March 2020 using an assumption that if left unchanged RPI would average 0.90% above CPIH.
For each year quoted we assume that RPI is aligned to CPIH from January of that calendar year.
Changes in the value of index-linked gilts quoted is for the entire outstanding stock of such bonds, rather than the PPFs own holdings.
Sources: DMO, Bloomberg.

The estimated impact across all holders of other index-linked gilts is set out in the below table[1]:

Year	2025	2026	2027	2028	2029	2030
Estimated impact on holdings of all other index linked gilts	-14.8% -£110bn	-14.1% -£105bn	-13.5% -£100bn	-12.8% -£95bn	-12.1% -£90bn	-11.5% -£85bn

These numbers represent a loss that investors would incur relative to a counterfactual where the alignment of RPI to CPIH is categorically ruled out.

Whilst we agree with the UKSAs assertion that RPI uses a flawed methodology we would point out that investors are well aware of the flaws and have paid a premium for RPI-linked gilts that reflects them. This is made most obvious by the large premium that RPI-linked swaps have historically traded at relative to CPI-linked swaps.

Nonetheless holders of index-linked gilts could reasonably be said to have received a windfall gain from the 2010 change to collection methods for clothing prices which increased the upward bias in RPI above what had previously been expected and incorporated into the price of RPI-linked gilts. According to the ONS, in 2010 this change was responsible for a 0.30% increase in RPI relative to CPI. If this 0.30% boost to RPI has remained constant over time (and recent data from the ONS suggest in fact that it has declined somewhat) then that would imply that index-linked gilt holders has enjoyed a windfall of approximately £8.9bn[2] as a result of the change to clothing price collection, or a small fraction of the losses that would be incurred by aligning RPI to CPIH.

For the PPF the impact on our balance sheet extends beyond our holdings of index-linked gilts as we are also holders of RPI-linked derivatives which, in the absence of a liquid CPI market, we use to hedge CPI-linked liabilities. The proposed change to RPI will lead to a reduction in value of both our RPI-linked gilts and derivatives with no change to our liabilities (all else equal). Assuming the change takes effect in 2030 we estimate that in total the balance sheet impact will be -£1bn. As inflation-linked markets have already partly adjusted in anticipation of the changes, part of this negative balance sheet impact has been felt already. The estimated impact differs according to the year of implementation[3]:

Year	2025	2026	2027	2028	2029	2030
Estimated total impact	-4.1% -£1.3bn	-3.9% -£1.24bn	-3.7% -£1.18bn	-3.5% -£1.12bn	-3.3% -£1.06bn	-3.1% -£1bn

[2] Estimate of the monetary impact of the additional upward bias to RPI introduced by the change to the collection of clothing prices in 2010 calculated based on data taken from the DMO 2010 Annual Review which listed the market value of index-linked gilts at end-March 2010 as £206.47bn with an average modified duration of 14.33 years, giving a sensitivity to a 0.01% change in yields of £296mn.

[3] Estimates of the impact on the value of the PPFs holdings of RPI-linked gilts and RPI-linked derivatives calculated as at 31st March 2020 using an assumption that if left unchanged RPI would average 0.90% above CPIH. For each year quoted we assume that RPI is aligned to CPIH from January of that calendar year.

Our concern is not just on the direct impacts to us. Impacts on the DB schemes we protect are also relevant because they can affect member outcomes and our claims experience. The consultation proposals are expected to produce a great variance of outcomes across individual schemes. Impacts will depend on their particular circumstances, specifically the nature of their liabilities (the extent to which they are linked to RPI or CPI) and the extent of their hedging strategy. Schemes which have at least some element of RPI-linkage to their liabilities will generally be less severely impacted and some will even see an improvement to their funding positions if their RPI-linkage is under-hedged or (at the extreme) they hold no RPI-linked assets at all. The table below provides a simplified illustration:

	RPI linked pension increases	**CPI linked pension increases**
Partial inflation hedge	Balance sheet gain Lower pension increases for members	Balance sheet loss No impact on pension increases for members
Full inflation hedge	No balance sheet impact Lower pension increases for members	Maximum balance sheet loss No impact on pension increases for members

The PPF is in the worst affected category given we fully hedge inflation risk and our liabilities are entirely indexed by reference to CPI. The majority of DB schemes will not be in that position. Even so we estimate the overall impact on DB scheme funding to be severely negative, relative to the funding position prior to inflation-linked markets beginning to factor in the prospect of the proposed changes. We estimate a negative impact in the order of £25 billion to £35 billion if the changes take place in 2030, which would increase to £55 billion to £65 billion if the implementation were brought forward to 2025. Our estimate of the negative impact on schemes with purely CPI linked pension increases is £10 billion to £20 billion if the changes take place in 2030, which would increase to £25 billion to £35 billion if the implementation were brought forward to 2025.

The above impacts should be considered only as high level estimates of the likely effect of the proposals on the ongoing funding position of schemes. We have used a variety of simplifying assumptions and have in particular extrapolated from information provided to us by schemes on a s.179 basis. Further information on the methodology and assumptions used is provided in the annex.

The impact of the proposals on actual s179 funding positions could be more severe than the ongoing estimates given above, due to the reduction in schemes' RPI-linked asset values with no corresponding reduction in the s179 liabilities. This is of particular concern to us as a scheme's s179 funding deficit may be regarded as an indication of the claim which we would have to absorb in the event of the insolvency of the sponsoring employer(s).

These proposals would also increase the PPF levy payable by affected schemes with an s179 deficit (absent any counter-measures in our levy rules). This would be a further cost burden for employers in addition to the impact from the worsening scheme funding deficit which would need to be managed.

Q4 What will be the impact on the index-linked gilt market or those dependent on it of addressing the shortcomings of the RPI in a) 2025 b) 2030 or c) any year in between?

The losses to holders of index-linked gilts reflects a gain to the public finances, albeit the former would see that loss immediately in terms of a fall in the paper value of their holdings whilst the latter would realise that gain over time in the form of lower payments of bond coupons and redemption proceeds.

The consultation document highlights the clause in the prospectus of 'relevant' index linked gilts that, in the event of a fundamental and materially detrimental change to RPI such as is proposed, holders have the right to redeem the bonds early with the government repaying the principal plus inflation accumulated to date. The consultation specifically seeks views on the impact on the gilt market of the Government having to finance such redemptions. In our view there will be no such impact. As the early-redemption proceeds under this process is far below the market price for these gilts and will remain so even if RPI is changed in 2025, it would be extremely unlikely that any holders would choose to exercise that right to early redemption and so the direct impact on public finances from changing RPI would solely be the reduction in future payments to gilt holders.

There are, however, other potential impacts. As the proposed change results in a large value transfer from investors to the issuer (the government) it seems possible that there will be legal challenges brought by or on behalf of investors either seeking for the change to be reversed or some mitigation for the losses it causes. It seems plausible that those challenges and thus uncertainty could drag on for several years and during that time have a negative impact on the smooth functioning of the index-linked gilt and related inflation markets and thus on the government's ability to use it to meet financing needs.

It is also noteworthy that the market still attaches a material probability to the government reversing its decision to align the indices. That is, the market is priced in such a way as to suggest that it believes the government is either likely to reverse its decision and leave RPI unchanged because of a continued need for publication to support the markets and contracts that it impacts, or provide some form of financial mitigation. There is, therefore, significant scope for a further sell off in the market. The sooner it occurs, the larger the negative value of the impact would be. This could likely result in the index-linked gilt market being dysfunctional in the immediate aftermath of the Government's response to this consultation.

More generally the proposed change could have an impact on future investor demand. The substantial impacts on asset holders might deter discretionary investors in gilts and index-linked gilts (that is investors who could choose to buy something else). In particular this is likely to include international investors who have perhaps considered index-linked gilts as part of a global inflation-linked portfolio, or who think that the inflation-linked return provided a good economic offset to investing in sterling assets. Whilst uncertainty remains during any legal challenges that is also likely to deter some investors from adding exposure to the asset class.

There could though be an impact in the other direction on what we might consider non-discretionary investors for whom inflation-linked gilts are the best or only asset available to them, specifically defined benefit pension schemes. Schemes that make RPI-linked pension payments but own few RPI-linked assets will find themselves better funded. This could prompt a de-risking of their investment strategy, to include the purchase of RPI-linked gilts. Schemes that make CPI-linked pension payments but own a large amount of RPI-linked assets will suffer a windfall loss from RPI reform, but will also find that they are now less well hedged to future changes in inflation: they would need to buy more inflation-linked gilts to maintain their level of inflation hedge.

Q5. What other impacts might the proposed changes to address the shortcomings of the RPI have in areas of contracts where the RPI is used?

Perhaps the most critical consideration is the direct impact on DB scheme members. With the majority of DB scheme benefits being linked to RPI, aggregate lifetime benefits will reduce as a consequence of the proposed change. It is worth noting that these impacts will not fall evenly – women will typically see a greater reduction because of their longer life expectancy; younger scheme members will also see a greater impact. The Pensions Policy Institute briefing paper quotes illustrative reductions for schemes where indexation in payment and deferment is linked to RPI (based on implementation of the proposals in 2025) of eight or nine per cent for pensioners (currently aged 65) and 17 or 18 per cent for older deferred pensioners (currently aged 55). This latter figure could increase to around 30 per cent for deferred pensioners currently aged 40.

The most significant other direct impact on the PPF and DB schemes is likely to be the effect the proposed change will have on derivatives contracts. Alongside RPI linked gilts we make substantial use of RPI swaps to hedge our liability inflation risks. Our contractual payments under the swap (a fixed payment) will remain unchanged but payments from counterparties (linked to RPI) will reduce and the value of the asset will fall. Outstanding RPI swaps cleared through LCH total over £2trn notional. For any of these swaps maturing after the change to RPI is implemented, winners and losers will be created. So the scale of the impact of changes to RPI goes far beyond the index-linked gilt market.

Corporate bonds that make payments linked to RPI are also likely to be impacted by legal complexity and challenges. Many of these bonds include clauses that allow for the eventuality that the calculation of RPI is amended in a fundamental way, and in that event trigger a process by which a replacement index (perhaps in the form of an index that increases at RPI plus a fixed spread) is determined that leaves neither issuer nor investor worse off as a result of the change to the calculation of RPI. Determining such a replacement index that satisfies all parties seems likely to be a challenging process. Out of the a total of publicly traded RPI-linked corporate bonds universe of £110bn, approximately £12bn notional of such bonds sit on the liability side of the government balance sheet in the form of bonds issued by Network Rail.

We would also expect to see impacts on other investments. RPI is embedded in long lease commercial property investments and therefore the proposed change may affect revenue streams. RPI is sometimes used as an alternative to open market rent reviews providing the landlord with rent adjustments. Indexation may also be used to ensure that any cap on the tenant's obligation to pay service charges is adjusted to preserve in real terms the parties' original allocation of risk for maintenance and capital expenditure. It is also worth noting that UK legislation incentivises the use of RPI in such contracts as its use avoids the risk of additional charges to Stamp Duty Land Tax on any future uplift in rent (Finance Act 2003, Schedule 17A disregards future increases for tax purposes, but only if they are "in line with the retail prices index").

Q6. Are there any other issues relevant to the proposal the Authority is minded to make of which the Authority or the Chancellor ought to be aware?

In our response to Q4 we noted the possibility of legal challenge to the proposed change. In our interaction with other investors the level of hostility to the proposals is clear. They believe the proposals are counter to their 'reasonable expectations' as asset holders.

To a large degree this reflects that the formula bias has been an understood feature of the RPI through time and has been "baked in" to the price paid for index-linked assets (as the then Chief Secretary to the Treasury, Elizabeth Truss noted in her testimony to the Lords RPI inquiry). This position was hardened by the conclusion of previous reviews and consultations (the CPAC consultation in 2012-13 and the Johnson Review in 2015) that RPI should continue unchanged.

There is a linked concern regarding due process. According to the Code of Practice for Statistics set out by the Office for Statistics Regulation one of the principles (Principle V1) recognises that "Users of statistics and data should be at the centre of statistical production; their needs should be understood; their views sought and acted upon; and their use of statistics supported."[4] It would have been preferable therefore if, similar to the 2012/13 review of RPI, the UKSA had given users of the index the opportunity to offer their views on whether it continued to effectively fulfil the same function and purpose with the proposed changes to methodology, components, and weights rather than consulting only after a decision had been taken. For DB schemes, the fact that the most significant impacts are on those who – in good faith - implemented prudent steps to manage inflation risk can only increase the sense of unfairness.

More generally, the impacts of the changes on DB schemes result from a lack of clarity on the best measure of inflation and inconsistency across the official sector in its use, specifically between the UK Statistics Authority (who present CPIH as their best measure of inflation), the Secretary of State for Work and Pensions (who sets the statutory minimum indexation for pensions using CPI) and the Debt Management Office (who offer for sale only gilts indexed to RPI). It would be highly advantageous for DB schemes and ourselves for these inconsistencies to be addressed. If statistical integrity is of paramount importance - which the proposed change to RPI seems to suggest - then this would imply that CPIH should be adopted across the official sector.

With regard to the inflation-linked gilt market we note that roughly 35% of pensions are indexed to the statutory minimum indexation set by DWP. There is already a large investor base that would be keen buyers of gilts linked to that index (ourselves included). The establishment of such a market will allow assets to be matched to liabilities without the use of assumptions that give rise to significant levels of risk. If that happens then the impacts of future changes to the construction of inflation indices (e.g. to maintain their statistical credibility) will have far less impact as asset values and liabilities will move in tandem. (We note that much of the demand for CPI(H)-linked

[4] https://code.statisticsauthority.gov.uk/the-code/value/v1-relevance-to-users/

assets is for maturities shorter than 10 years which means that even though RPI reform will align RPI to CPIH, this won't help much in meeting the existing need for CPI(H) linked assets).

21 August 2020

Annex – summary of methodology used to estimate impacts of proposals on DB scheme funding

To establish our estimate of the impacts of the proposals on the universe of defined benefit schemes we took a sample of 63 large schemes where detailed information was available on the schemes' benefit inflation rules. These schemes represented 25 per cent of scheme liabilities. We calculated the impact of these proposals on these schemes and then extrapolated the findings to the whole universe of PPF eligible DB schemes. For assets, as we do not collect information on schemes' holdings of swaps and other derivatives, we took the universe holding of index-linked gilts and scaled-up to reflect the impact of this wider spectrum of RPI-linked instruments.

We used the valuation data submitted to us by schemes on our statutory s.179 basis. These valuations are used to calculate pension protection levies and only reflect our compensation levels rather than full scheme benefits. In particular, s.179 liabilities provide only for CPI linkage (or nil increases on some tranches of compensation) with no allowance for RPI increases. We have therefore used assumptions to move from a s.179 basis to an estimate of impacts on a schemes' own funding position. To do this we have drawn on some of the information and assumptions underlying the recent PPI briefing note 'how could changes to price indices affect DB schemes' where we do not have access to this data ourselves. In particular, we have used:

- reductions of 10 and 20 per cent in the value of RPI-linked gilt holdings (based on implementation of the consultation proposals in 2030 and 2025 respectively), noting that these figures are on a consistent trajectory with the one-off immediate 'shock' implied by our stress factors which we use to adjust asset and liability figures for levy calculations; and
- total current holdings by defined benefit schemes of £470 billion in index-linked bonds and £350 billion in swaps and index-linked gilt repurchase agreements (in order to scale up our calculated impact on the value of index-linked bonds to the wider spectrum of RPI-linked instruments).

Our calculations assume a long-term gap of 0.9 per cent per annum between RPI and CPI, which our analysis suggests to be the historical long-run average. This is slightly different to the PPI analysis which was based on a 1% gap. We therefore adjusted the reductions in the value of RPI linked gilt holdings to 9 per cent (2030) and 18 per cent (2025).

Our calculated impact figures take no account of any mitigating factors which may arise prior to the implementation of the consultation proposals, for example the development of a deep and liquid market in CPI-linked instruments or changes to schemes' investment strategies. As our scheme data collection pre-dates the announcement of a change to align RPI with CPIH, it is unaffected by subsequent pricing adjustments to reflect the announcement.