



Technical Bulletin

Following the [Chancellor of the Exchequer's reply](#) to the UK Statistics Authority, there is significant uncertainty around the future of the Retail Prices Index (RPI) – one of the key measures of inflation in the UK. This technical bulletin looks at what the issues are underlying this exchange of letters and what might happen next.

The many measures of inflation

Price inflation is the rate at which prices of goods and services increase over time. Measures of inflation provide indicators of the cost of living and relative spending power but are also frequently used in contracts to determine changes in contracted payments. For example, inflation measures influence changes in benefit payments, pensions, rail fares and repayments of student loans and government debt.

There are different ways in which inflation can be measured. The most common measures used in the UK are the Retail Prices Index (RPI), Consumer Prices Index (CPI) and Consumer Prices Index with Housing (CPIH). Each measures inflation slightly differently, and as a result report different levels of inflation. More details on the differences are in [a previously published explanatory note](#).

Historically, RPI was the dominant inflation measure in the UK and is the reference inflation for many pension schemes, student loan repayments and repayments for index-linked gilts. There have been a number of issues identified in the way that RPI has been calculated and as a result RPI's status as a National Statistic was revoked in 2013 and in 2018 the government confirmed that it will not introduce new uses of RPI.

Proposed changes to RPI

As a result of the issues with RPI, there has been significant discussion between the UK Statistics Authority (UKSA), HM Treasury and the House of Lords Economic Affairs Committee on whether RPI should continue to be used in its current format. UKSA has offered 2 recommendations to the Chancellor. The first recommendation is to cease publication and promotion of the RPI figures. The Chancellor rejected this as it would have a material and detrimental effect to existing users of RPI, including holders of relevant index-linked gilts.

The second recommendation is for RPI to be aligned to CPIH. The Chancellor has decided that these will not be aligned until February 2025 at the earliest. After 2030 there will no longer be a need for approval from the Chancellor in order to make changes to RPI and current indications suggest that a move to CPIH will be enacted by UKSA by this point at the latest.

The Chancellor has confirmed that the government will launch a consultation at Budget 2020 to understand the impact of potential changes and consult on what changes should be made to RPI and when these should come into force.



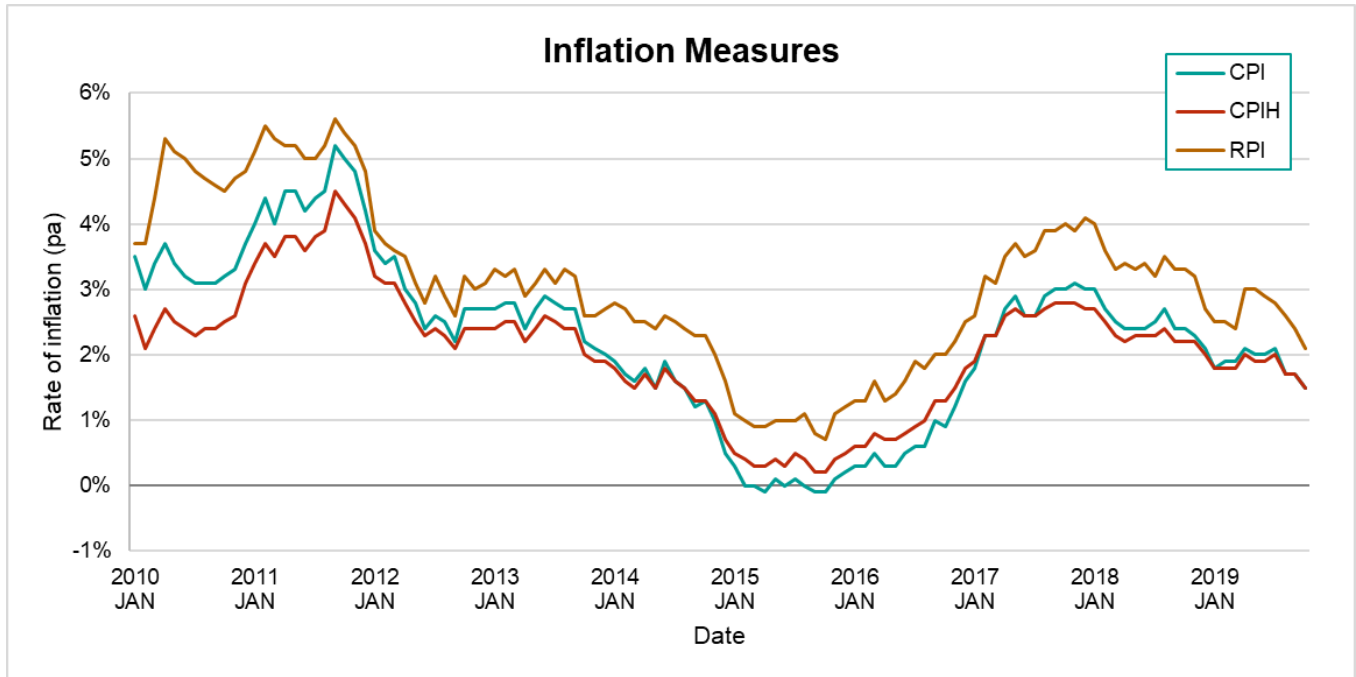
Differences between inflation measures

The levels of inflation reported by the various measures vary because of differences in:

- which goods and services are included in the measure – for example, CPI does not include any element of housing cost. Both RPI and CPIH do include measures of housing costs but in different ways
- the formula used to combine different prices into a single measure – for example, CPIH and CPI both use the same formula whereas RPI uses a different formula

The chart below shows the inflation figures under each measure since 2010 and shows that differences between the measures are not constant and do fluctuate.

Figure 1: The annual inflation for each measure (2010-Present)



Broadly speaking CPIH has moved relatively closely with CPI over the last 10 years. This reflects similarities in the indices and the fact that they only differ by the inclusion of residential rental price growth and council tax in the CPIH. In the long-term, one might assume rental price growth to cause CPIH to exceed CPI slightly – however, over the past 10 years CPIH has averaged 0.2% lower. This is because the rental price and council tax elements included in CPIH have grown less than general price inflation over the last 10 years.

Historically, the differences between RPI and CPI (and CPIH) have been larger – with RPI exceeding CPI by around 0.8% pa over the same period shown above. Similar differences are likely to persist before any reforms to RPI are made which, will be until at least 2025 but no later than 2030. Beyond this, it's expected that the differences between RPI and CPI will narrow and align to the differences between CPI and CPIH. As such, future expectations for RPI vary significantly depending on the time period of interest.



Impact of changes to RPI

As referred to in the Chancellor’s reply to the UKSA, the full extent to which RPI is used, and the impact of a change to it, is somewhat unknown and supports the need for the forthcoming consultation. One area that is clearly and significantly impacted will be investors in index-linked gilts. With current experience suggesting that CPIH is approximately 1% lower than RPI, an alignment of RPI to CPIH will result in lower expected income from these investments.

While there was movement in the prices (and yields) of gilts following the September exchange of letters between the Chancellor and the UKSA, the fall has generally been lower than might have been expected given the differences between RPI and CPIH. Figure 2 illustrates this by showing the movement in break-even inflation – the difference between nominal and real index-linked yields which provide an indication of the market’s inflation expectations.

Figure 2: Break-even inflation

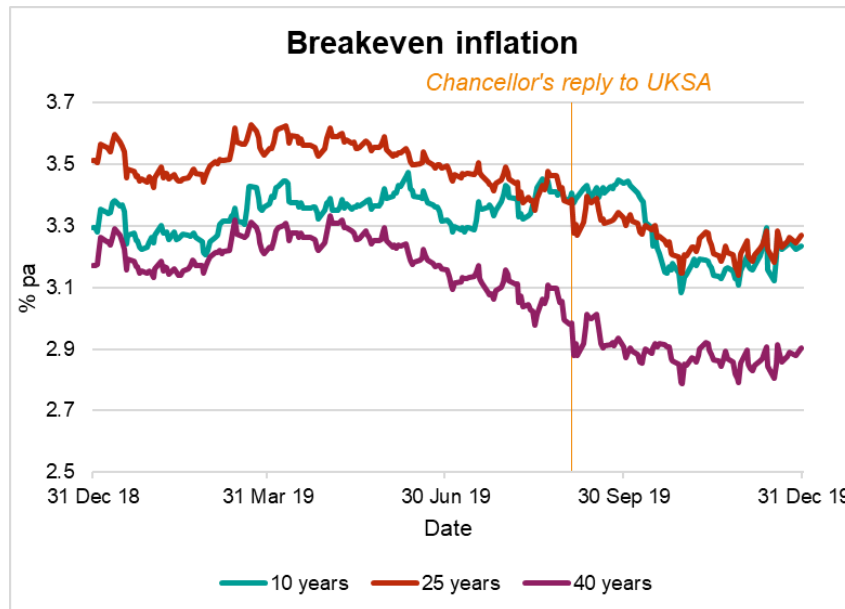


Figure 2 shows relatively little change in inflation expectations at shorter durations (10 years and less) following the Chancellor’s response to the UKSA. This is consistent with the view that changes to RPI are unlikely to occur before 2030. There were more noticeable differences in inflation expectations over longer durations (25 and 40 years shown above). However these were generally relatively small – possibly reflecting either that the market was expecting changes to RPI and had already priced in the announcement, or reflecting that gilt holders expect that they might receive some form of compensation if there is any material change to RPI.

One major investor in index-linked gilts are pension schemes who invest to back inflation-linked pensions obligations. For schemes that revalue pensions in line with RPI, any changes to RPI will not only feed through to impacts on their index-linked gilt holdings but also impact the value of their liabilities. This is because changes to RPI are likely to mean that scheme members receive lower pension increases and so would reduce the present value of outstanding liabilities.

Reforms to RPI mean that index-linked gilts are likely to provide a closer match to scheme revaluation for schemes that revalue pensions in line with CPI. Therefore index-linked gilts are likely to be a more attractive hedging investment over the longer term. However, the scheme may already be holding RPI-linked instruments to hedge against CPI-linked pension increases and are



likely to have determined the level of investment in gilts based on the historical differences between RPI and CPI. Alignment of RPI to CPIH means that these schemes will have to revisit their hedging positions and are exposed to the risk of financial losses from the lower expected income from gilts.

Next steps

It is almost certain that RPI in its current format will not continue forever – however until the consultation has concluded, there remains significant uncertainty in how it might evolve. Given these uncertainties, when considering the outlook for future price inflation it is more important than ever to consider:

- which inflation measure is being used or referred to
- the time period over which a view on inflation is required as potential future changes are likely to significantly change the level of reported RPI inflation

If you would like to discuss any of these issues in more detail or have any questions then please email ashara.peiris@gad.gov.uk or get in touch with your usual GAD contact.