HEALTH WEALTH CAREER

MERCER GLOBAL PENSION BUYOUT INDEX

Q3 2019

MAKE TOMORROW, TODAY

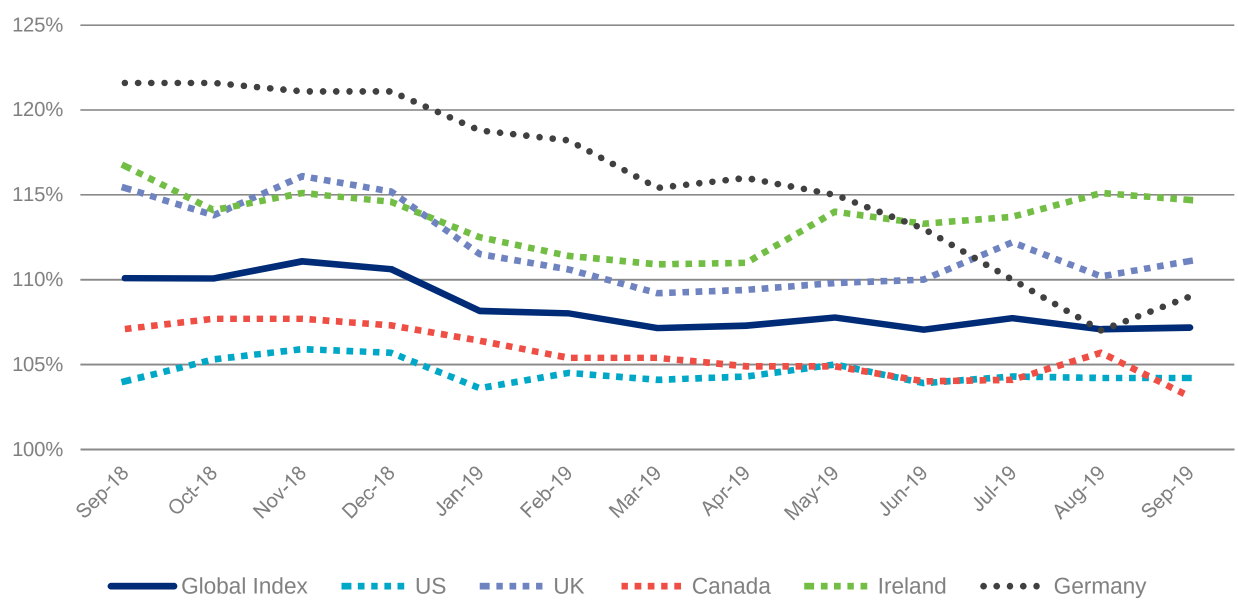
MERCER

EXECUTIVE SUMMARY

Mercer Global Pension Buyout Index monitors the general trend in the pricing of bulk pension annuity transactions in the US, UK, Canada, Ireland and Germany.

Pension risk transfer transactions increasingly involve an international element – for example, the sponsoring employer might be seeking to externalise pension risk in multiple countries. Pricing is subject to movements in global financial markets and domestic requirements for insurer reserving. However, country-specific pricing often trends in different directions due to domestic influences, leading to windows of opportunity in one country relative to another.

The chart shows estimated annuity prices from insurers as a percentage of accounting liability in the five countries monitored, for existing retirees in a sample defined benefit pension plan. This is based on up-to-date pricing information provided regularly by insurers in each country.



For example, where a line is at the 110% level, Mercer estimates the average price of a pension annuity transaction for current retirees to be broadly 10% higher than the equivalent accounting liabilities. The Global Index is represented by the solid line, showing the average price of pension annuity transactions as a percentage of accounting liability across the five countries and draws upon information such as country market size.

The Global Index remained stable during the third quarter of 2019, as a result of a steep downward movement in the Germany index, combined with a smaller drop in the Canada index which are more or less offset by moderate increases in the US, UK and Ireland indices.

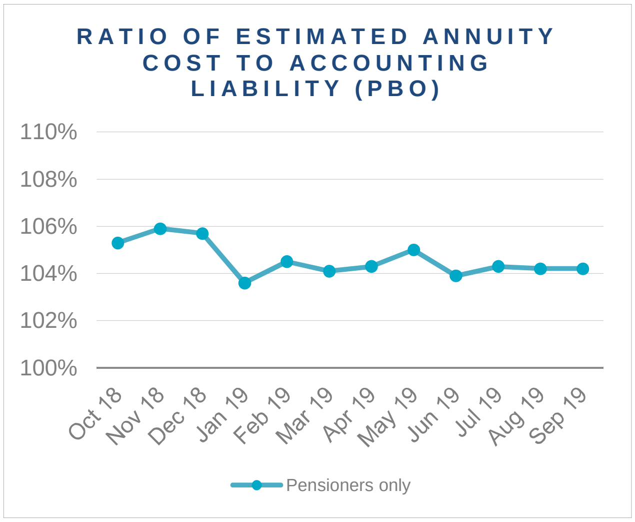
Pension liability has been measured according to local standards. As an example, the cost of insuring pension liabilities in the UK is higher than in the US (relative to accounting liabilities) partly because UK pension liabilities are commonly indexed for inflation and partly due to generous attaching spouses' pensions, both of which increase the liability duration. Insurers also charge an additional premium to take on inflation risk.

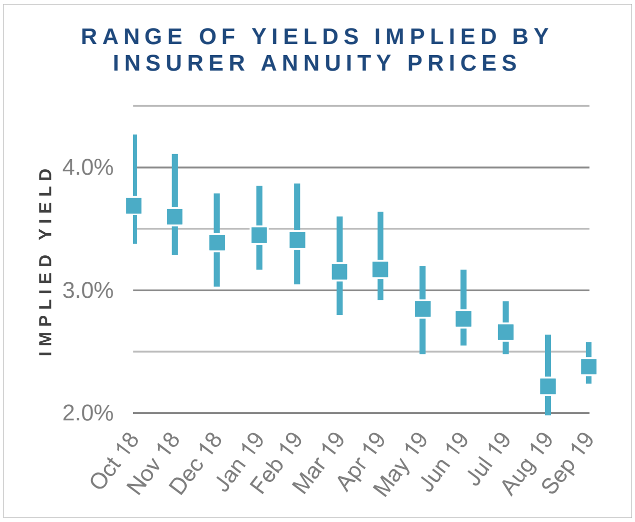
Mercer appreciates the assistance of more than 20 insurers, which provide pricing data every month to allow this report to provide a good indication of the trend in each country.

The information contained in this report is not based on information specific to your circumstances and approximations have been used. Past experience is no guarantee of future pricing and experience may vary for your plan.

UNITED STATES

The cost of a buyout had been decreasing a number of years ago relative to PBO accounting liabilities; however this relationship has remained relatively stable over the last couple of years. Price transparency allows for greater information from which a plan sponsor can act. The chart on the left shows the relative price to PBO using average pricing received from insurers, and the chart on the right shows the range of sample pricing received. At a single point in time pricing between insurers varies materially which may lead to a difference in cost of up to 10%.





At the end of September 2019, if the accounting liability in respect of plan pensioners only was US$100 million, the buyout cost would be broadly US $4.2 million higher, as compared to June where the cost would have been US $3.9 million higher.

When insurer pricing rates increase relative to discount rates used to calculate PBO, the premium for an annuity buyout decreases.

It should be noted that the above implied yield has decreased slightly more compared to corporate bond yields over Q3 2019, resulting in the slight increase in the ratio shown in the chart above and to the left.

UNITED STATES MARKET NEWS

In mid-2015, Mercer launched Mercer Pension Risk Exchange®, a groundbreaking solution that both increases annuity price transparency by enabling plan sponsors to continuously monitor pricing and helps plan sponsors execute group annuity buyouts in a shorter timeframe and in a more competitive pricing environment. Given the current level of volatility, it is not surprising that we already have over 190 clients in the US, representing over US$23 billion of assets, signed up to Mercer Pension Risk Exchange to execute an annuity placement. Please see the infographic at the end of this report for more information.

With rates increasing and plan sponsors reaching PBGC caps, buyout activity has steadily increased. Pension risk transfer premiums exceeded $27 billion in 2018, according to the LIMRA report. Mercer continues to be a market leader role in pension de-risking transactions, advising plan sponsors and independent fiduciaries on over 40% of all deal volume transacted over the past three years, based on the 2016-2018 LIMRA reports and internal Mercer data.

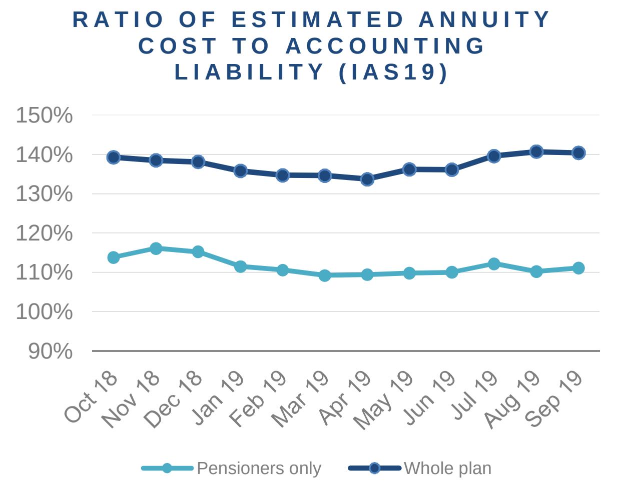
NOTES

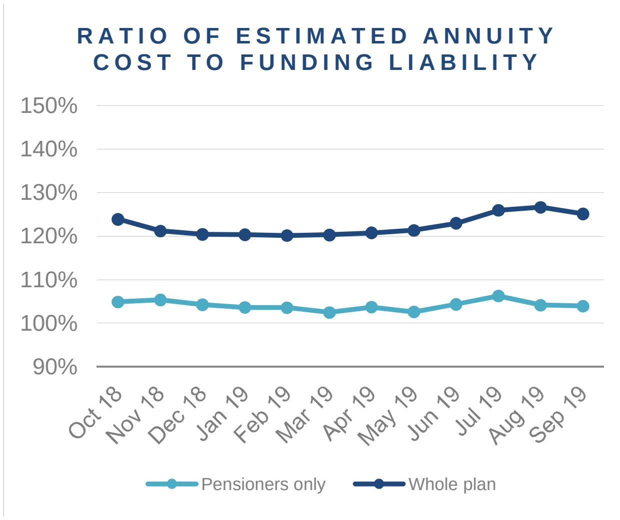
The chart on the left is based on a set of liabilities with pension benefit obligations of US$50 million, cash flow duration of 9 years, and discounted using the Mercer Yield Curve.

The figures in the charts should be used as an indication of the market pricing for annuity placements; actual pricing received will depend on plan-specific factors such as plan provisions, size, and age of the population. It is important to note that some of the insurers who provide pricing do not reflect mortality sensitivity in their illustrative rates, or benchmark to a standard table.

UNITED KINGDOM

The charts track the cost of a buyout and buy-in of a representative pension plan against accounting and typical funding liabilities. The plan has pensioner and non-pensioner liabilities, with a weighting towards pensioners. Pensioner and non-pensioner members receive a mixture of flat and increasing pensions in payment, commensurate with an "average" UK pension plan.





At the end of September 2019, if the plan had accounting liabilities in respect of all members of £100 million, the buyout cost would be broadly £40 million higher.

If the accounting liability in respect of plan pensioners only was £100 million, the buy-in cost of pensioners would be broadly £11 million higher.

At the end of September 2019, if the plan had typical funding liabilities (technical provisions) in respect of all members of £100 million, the buyout cost would be broadly £25 million higher.

If the typical funding liability in respect of plan pensioners only was £100 million, the buy-in cost of pensioners would be broadly £4 million higher.

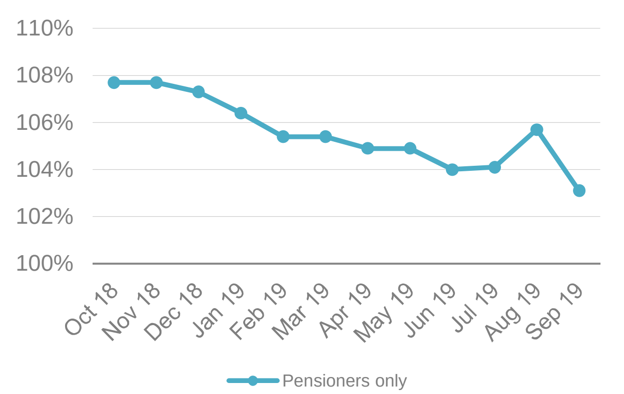
UNITED KINGDOM MARKET NEWS

Total premium volumes for 2018 were £24bn, which was the highest annual premium volume ever written (the previous highest being c£13bn back in 2014) and included 4 individual transactions exceeding £1bn during 2018. In addition to this 'regular' bulk annuity business, Prudential plc sold around £12bn of its annuity portfolio to Rothesay Life (this being the largest ever UK insurer "back book" annuity business transaction).

It is looking like 2019 will be another recording-breaking year, with an expected total premium volume of up to £40bn. This includes the largest bulk annuity deal to date of £4.7bn for the Telent Pension Scheme. Despite continuing uncertainty around the UK's departure from the EU, to date there have been few signs that this is having any noticeable impact on the buoyant bulk annuity market.

CANADA

The charts track the movement in the cost of a group annuity as a percentage of the associated accounting liabilities for a representative sample group of retirees.



During the third quarter of 2019, the Index decreased by 0.9%, going from 104.0% at the end of June 2019 to 103.1% at the end of September 2019. This implies that, at the end of Q3 2019, the cost of settling obligations through the purchase of annuities was 3.1% higher than the accounting liability.

It is also important to consider the absolute cost of settling plan obligations. This can be best accomplished by looking at the movement of each component of the index in isolation. To do so, we look at the yields of long -term government bonds, which drive annuity pricing, and compare them to the yields on AA corporate bonds, which are used to calculate accounting liabilities.

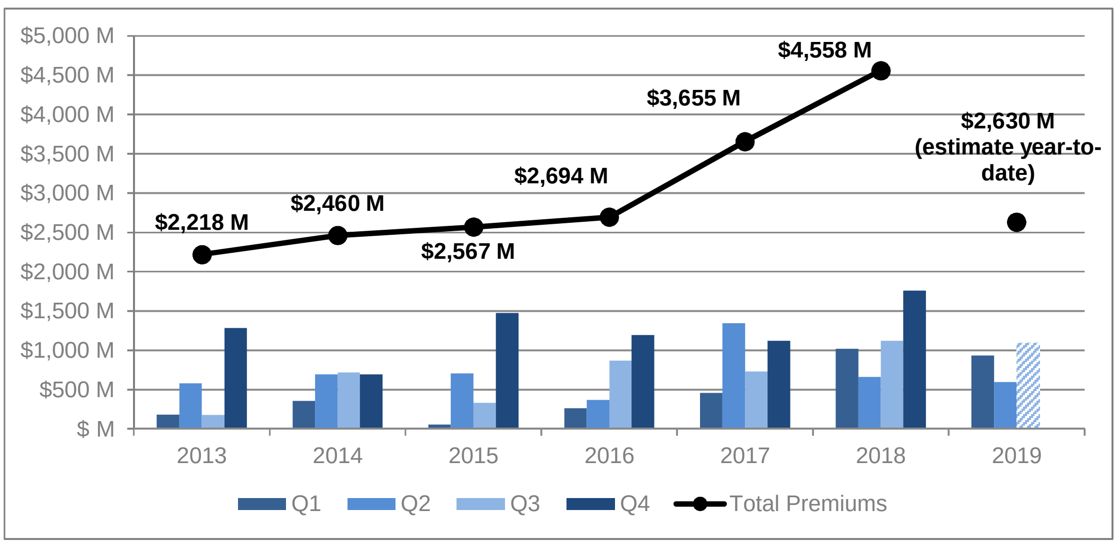
Following a very small increase in July, yields on long-term federal bonds, assumed to back annuity purchases, dropped by more than 25 basis points in the month of August before rebounding in September with an increase of just over 10 basis points. However, this net 15 basis point decrease in rates was more than offset by a steep reduction in insurer pricing, leading to an overall decrease in the estimated cost of annuities by nearly 1% compared to the estimated cost as at the end of June.

During the same 3 month period, yields on corporate bonds, assumed to back accounting liabilities, decreased by about 11 basis points. This was fueled by the decrease in long-term rates noted above combined with corporate credit spreads that dropped by approximately 4 basis points in July, then increased in August by 10 basis points before dropping again by 2 basis points in September (net increase of approximately 6 basis points for Q3). This led to an overall increase in accounting liabilities of approximately 0.3% throughout the quarter.

Combining the movements of the estimated cost of annuities and accounting liabilities explains the shifts in the Index on a month-to-month basis. In July, the narrowing of corporate credit spreads resulted in a bigger decrease in the estimated cost of annuities relative to accounting liabilities, leading to a 10 basis point gain in the Index from 104.0% to 104.1%. In August, the widening of corporate spreads resulted in a decrease in accounting liabilities relative to the estimated cost of annuities, leading to a 160 basis point rise in the Index from 104.1% to 105.7%. In September, the reflection of a reduction in insurer pricing led to a 260 basis point fall in the Index from 105.7% to 103.1%. Overall, the 0.9% decrease in the Index in Q3 2019 has brought it to a relative low, reaching the lowest point since the summer of 2014.

CANADA MARKET NEWS

The Canadian group annuity market was estimated to be at approximately $2.6B as at the end of September 2019. However, with over $1B in premiums secured so far in Q4 and another $1.5B still in the pipeline, the volume for 2019 appears poised to surpass the $5B threshold for the first time. Capacity continues to be supported by the emergence of reinsurers interested in entering the Canadian annuity market, allowing for a record high volume to be set for the 7th consecutive year.



With over 380 plans having enrolled as of September 2019, the Mercer Pension Risk Exchange® has established itself as a global tool to help clients meet their de-risking objectives in an efficient and cost-effective manner. Over US$80B of plan liabilities have been committed to the platform and almost US$28B has been successfully secured with insurers. In Canada, more than 50 transactions have been secured through the Exchange with total premiums of approximately C$2.6B.

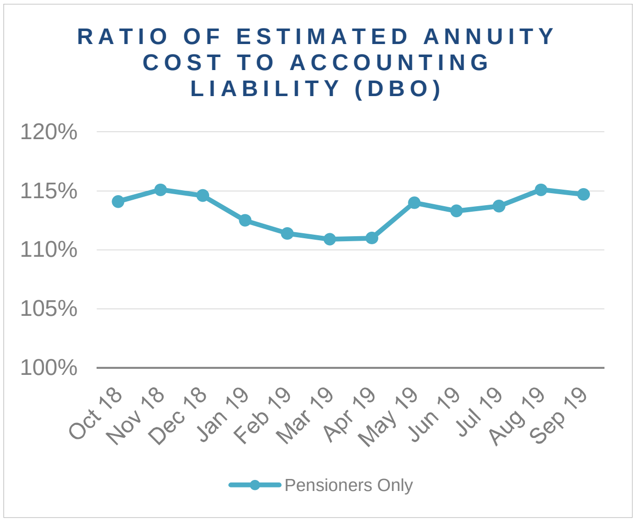
NOTES

The Index is based on an estimate of settling non-indexed pension obligations through the purchase of annuities and an accounting discount rate based on a proprietary model developed by Mercer to assist our clients with selection of the discount rates used for the purpose of corporate financial reporting. It is provided for a sample group of non-indexed retired members and is only intended to illustrate general trends. The actual premium can vary significantly for individual plans based on a number of factors that may include:

- The plan's benefit structure and timing of its anticipated benefit payments.
- The demographic profile of the plan's participants.
- Market conditions prevailing at the time benefits are distributed and annuities purchased.
- Insurer appetite and capacity for a transaction.
- Which employees, if any, receive and accept an offer to take a lump sum instead of an annuity.

IRELAND

The chart shows the relative cost of a buyout of pensioner liabilities of a sample defined benefit plan versus the equivalent liabilities on a company accounting basis.



At the end of September 2019, if the Plan had accounting liabilities in respect of pensioners only of €100 million, the cost of a traditional annuity would be broadly €14.7 million higher compared with €13.3 million higher at 30 June 2019.

IRELAND MARKET NEWS

Both accounting liabilities and annuity costs have continued to increase over 2019, as a result of falling Eurozone interest rates. The net result is that the index at 30 September is in a similar position to where it was at the beginning of the year.

The Index stood at 114.7% at 30 September, suggesting an increase in annuity costs relative to accounting liabilities over the quarter. The index is up slightly from its position at 30 June 2019 and continues to rise from historic lows in Q1 2019. However, it still remains low relative to pre-2019 values.

Q3 2019 proved to be a mixed quarter for asset returns for pension schemes:

- Equity performance has picked up slightly since the middle of the year (MSCI World Index returned 5.1% in Q3 compared with returns of 2.7% in Q2) and remain strong year to date (23.9% YTD).
- Eurozone Government bond yields fell over the quarter, leading to increases in the value of Scheme's Government bond holdings.
- Corporate bond yields, which drive the accounting liabilities, hit record lows in August 2019. They have showed signs of recovering in September but liabilities remain relatively high.

- Scheme's that hold corporate bonds would have seen the value of these assets increase as corporate bond yields fell, providing a partial offset.

Activity in the bulk buyout market in Ireland is largely driven by the winding up of pension plans which, under Irish legislation, requires the buyout of pensions in payment. However, in late 2017, Danske Bank entered into a ground breaking transaction with Irish Life, transferring €335m of its Irish DB liabilities to Irish Life in a buy-in contract. This deal was the largest of its kind in Ireland, and also set a precedent for using insurance strategically as part of ongoing risk management in a well-funded scheme.

NOTES

The index is provided for a sample mature pensioner population and is indicative only. The benefits secured (and valued as an accounting liability) are flat pensions, with no increases in payment.

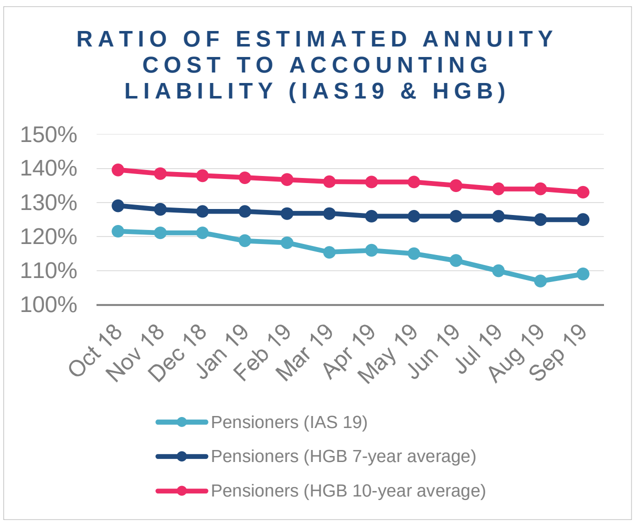
The price differential identified above will also be affected by the nature of the assumptions adopted for the accounting disclosures.

The accounting liabilities are valued using the Mercer Yield Curve, which is used by leading Irish and multinational companies to set their discount rate for accounting purposes.

The index does not make any allowance for buyout costs for active or deferred members.

GERMANY

In Germany, a true buy-out of liabilities is not generally possible as the purchase price is treated as taxable income for the beneficiaries except in the case of the wind-up of the sponsoring company. Here we focus on so-called reinsurance, where the future promised pension payments are insured. The German pension reinsurance market is based on with-profits policies. It is usually not possible to insure future indexation – in general, it is assumed that the with-profits bonuses will broadly compensate for the required level of future indexation, but exact indexation matching is not possible. The accounting liabilities in the table below reference a sample retiree population and are shown on an IFRS basis and the old and new German GAAP ("HGB") basis. The new German GAAP uses a 10-year average of the discount rate (previously a 7-year average was used).



At the end of September 2019, if the plan's accounting liabilities under local German GAAP (HGB) in respect of pensioners were €100 million, the buyout cost would be broadly €33 million higher (compared with €35 million higher at 30 June 2019). Under the previous HGB basis, using the 7-year average rate, the buyout cost would broadly €25 million higher at 30 September 2019 (compared with €26 million higher at 30 June 2019).

If the plan accounting liabilities under international accounting standards (IFRS) in respect of pensioners were €100 million, the buyout cost would be broadly €9 million higher (compared with €13 million higher at 30 June 2019).

GERMANY MARKET OPPORTUNITIES

- There is no minimum funding requirement in Germany, and many retirement obligations remain unfunded. Increasingly we do see companies funding their retirement benefit obligations, and there are now tax incentives (and an 80% reduction in the insolvency protection premium) available in case that benefits are funded using a "*Pensionsfonds*"
- For the DAX30 constituents, the funding level disclosed in the published accounts was 67% in 2018 (Plan Assets of €246billion compared to Liabilities of €366billion)
- Reinsurance is commonly used for deferred compensation plans, which offer a tax-incentivised method of saving for retirement with higher limits on contributions than other methods available as a private individual.

NOTES

The illustrations are based on values used by German life insurers, public information and a representative sample of a retiree population. Due to the applied approximation method the Index is not suitable for any company - and plan-specific pricing.

CONTACT

US
Monica Dragut
+1 215 982 4427
monica.dragut@mercer.com

UK
David Ellis
+44 113 394 7591
david.ellis@mercer.com

CANADA
Ryan Kastner
+1 514 841 7856
ryan.kastner@mercer.com

IRELAND
Peter Gray
+353 1411 8595
peter.gray@mercer.com

GERMANY
Dr. Udo Müller
+49 711 237 16 427
udo.Müller@mercer.com

IMPORTANT NOTICES

References to Mercer shall be construed to include Mercer LLC and/or its associated companies.

This contains confidential and proprietary information of Mercer and is intended for the exclusive use of the parties to whom it was provided by Mercer. Its content may not be modified, sold, or otherwise provided, in whole or in part, to any other person or entity, without Mercer's prior written permission.

The findings, ratings, and/or opinions expressed herein are the intellectual property of Mercer and are subject to change without notice. They are not intended to convey any guarantees as to the future performance of the investment products, asset classes, or capital markets discussed. Past performance does not guarantee future results. Mercer's ratings do not constitute individualised investment advice.

Information contained herein has been obtained from a range of third-party sources. Although the information is believed to be reliable, Mercer has not sought to verify it independently. As such, Mercer makes no representations or warranties as to the accuracy of the information presented and takes no responsibility or liability (including for indirect, consequential, or incidental damages), for any error, omission, or inaccuracy in the data supplied by any third party.

This does not contain regulated investment advice in respect of actions you should take. No investment decision should be made based on this information without obtaining prior specific, professional advice relating to your own circumstances.

This does not constitute an offer or a solicitation of an offer to buy or sell securities, commodities, and/or any other financial instruments or products or constitute a solicitation on behalf of any of the investment managers, their affiliates, products, or strategies that Mercer may evaluate or recommend.

For the most recent approved ratings of an investment strategy, and a fuller explanation of their meanings, contact your Mercer representative. For Mercer's conflict of interest disclosures, contact your Mercer representative or see www.mercer.com/conflictsofinterest

Mercer's universes are intended to provide collective samples of strategies that best allow for robust peer comparisons over a chosen timeframe. Mercer does not assert that the peer groups are wholly representative of and applicable to all strategies available to investors.

MARSH & McLENNAN
COMPANIES