

## **Media Comments 2020**

### **2021 Investment Horizons: A painful year looks imminent**

BY **DANIEL BEN-AMI** DECEMBER 2020 (MAGAZINE)

[https://www.ipe.com/reports/2021-investment-horizons-a-painful-year-looks-imminent/10049231.article?utm\\_campaign=208405\\_december%20IPE%20magazine%20email&utm\\_medium=email&utm\\_source=IPE&dm\\_i=5KVE,4GT1,C5V6S,IS6L,1](https://www.ipe.com/reports/2021-investment-horizons-a-painful-year-looks-imminent/10049231.article?utm_campaign=208405_december%20IPE%20magazine%20email&utm_medium=email&utm_source=IPE&dm_i=5KVE,4GT1,C5V6S,IS6L,1)

***Pension provision is likely to take a hit in 2021 as the pandemic-related crises lead to rising unemployment and greater job insecurity***

#### **KEY POINTS**

- The COVID-19 related economic crisis is leading to a surge in unemployment and increased job insecurity
- These trends will have a knock-on effect on pensions provision
- The situation varies considerably across different European countries
- Overall the challenges facing pension provision are likely to be considerably exacerbated by the crisis

Perhaps 2021 will be the year when it finally sinks in. The economic crisis associated with COVID-19 looks set to have a substantial impact on the labour market. This development, in turn, is likely to have a considerable effect on pension provision.

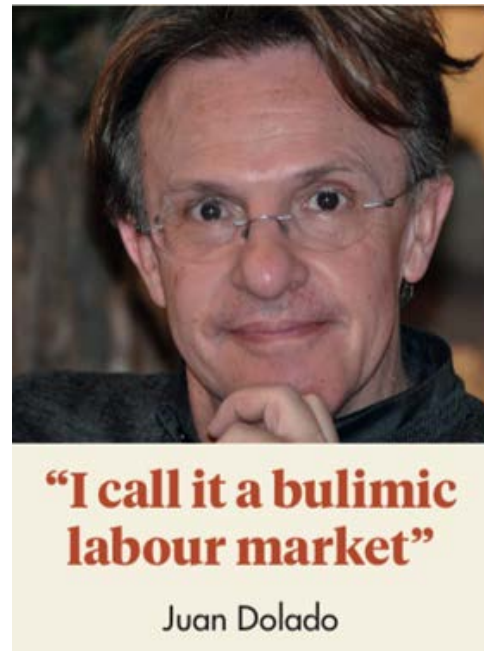
Perhaps the medical aspects of the crisis have fixated the world so much – for understandable reasons – that the scale of the economic slump has not been fully appreciated. Job retention schemes have also helped cushion the blow so far. But it should be remembered that, even according to the IMF, it is the greatest economic crisis since the 1930s. And that decade was, among other things, scarred by the tragedy of mass unemployment. This time around, it is unlikely governments will allow unemployment rates to reach such high levels but there is still a considerable challenge ahead.

The key contours of the trend are already apparent in the arid world of numbers (figure 1). According to the EU's autumn 2020 economic forecast the unemployment rate across the region looks set to increase from 6.7% in 2019 to 7.7% this year, before rising to 8.6% in 2021. In other words, unemployment looks set to continue to rise once job-retention schemes are wound back.

But these are only the headline numbers. In addition to unemployment, there is likely to be even further job insecurity. Some sectors – such as retail, tourism and hospitality – are likely to be hit particularly hard as are some segments of society. Nor is it clear how long it will take to contain the virus, despite many hopeful signs around vaccine development. Even in the best case scenario, it looks certain that the economy, and consequently the labour market, will take a heavy hit.

Under such circumstances, it would be a miracle if pension provision was not hit hard. For one thing, government resources to pay for state pensions are likely to be even more

constrained. Debt levels have surged as the authorities have struggled to contain the pandemic. Sooner or later, governments will have to start reducing their debt.



In relation to private pension provision, many will have either reduced their contributions or, if they are able, stopped them completely. Even those with substantial pension pots will, in some cases, draw them down. And employers are likely to rethink the benefits they provide to workers.

The challenge to the labour market of course varies across different countries and different segments of society. These differences will be sketched first before looking more closely at the different channels through which pension provision could be affected.

### **Labour markets across Europe**

It is often claimed that European labour markets can be sharply contrasted with those of the US. Europe, it is commonly said, has a relatively 'rigid' labour market, whereas the US is much more flexible. Rigid in this sense – although often used in a pejorative way – is meant to suggest it is relatively difficult to make workers redundant and extensive social benefits are available.

However, this counterposition between the US and Europe is a misleading one. There is, in fact, a huge amount of variation across Europe in general and even within the euro-zone (figure 2). This applies to the headline unemployment figures but also to the structure of the labour market.

Juan Dolado, professor of economics at the Universidad Carlos III de Madrid, says that job volatility in Spain is three times the level of that in the US. A high proportion of employees are on fixed-term contracts, so their positions can easily be terminated once their contracts end. There is, therefore, huge job creation in good times and huge job reduction in bad times. "I call it a bulimic labour market," Dolado says.

In Spain he foresees a great rotation in the labour market following the pandemic. Following the last economic crisis – when Spain's housing bubble burst – many of its young people

switched to working in the service sector and especially tourism. But this is precisely the sector that the epidemic has hit hardest.

Germany is the archetypal opposite end of the scale in terms of a rigid labour market. Given its strong manufacturing base, there is a particular emphasis on maintaining a large core of skilled workers, even in bad times. That is why it has long had short-time working schemes (Kurzarbeit) in which employees' hours are reduced rather than them being laid off.

Michael Burda, professor of economics at Humboldt University in Berlin, says how well such schemes work this time around will depend on how the crisis pans out.

If the resolution to the pandemic is relatively smooth it should work well. "The German system is very amenable, with its short-time working and heavy social security, for people who are temporarily out of work," Burda says.

However, there is a down side. The system is not so well adapted if it turns out that the resolution to the crisis proves more difficult and structural economic change is needed. In such a situation, short-time working schemes can end up shoring up sectors which are no longer viable. Burda points to the earlier experience of trying to maintain unviable production after the dissolution of East Germany. "You can end up preserving Trabant production when you should really be just shutting it down," he says.



Shortly after the pandemic hit Europe, the EU introduced its SURE scheme (Support to mitigate Unemployment Risks in an Emergency) to provide financial support for short-time working schemes. Essentially, this can be seen as an attempt to introduce a more German-style labour market across Europe.

Although EU member states already had such schemes in place, the SURE scheme was meant to give them additional financial backing. The European Commission borrowed on the markets to support such schemes. By mid-November it had raised over €90bn and covered

18 member states. However, the labour markets in Europe are still a long way from being uniform or fully integrated.

### **The impact on pensions**

There are many ways in which both pension schemes and pension provision will be hit by the COVID crisis. For one thing, average investment returns are likely to fall as the trend rate of economic growth falls – since investment returns are ultimately claims on real economic activity. “We are going to be a slow growth world, says Andrew Milligan, an independent consultant. “This is not going to be a world of 5% growth every year.”

There are also the well-known problems associated with ‘financial repression’. That is prolonged periods of artificially low interest rates. One of the down sides of this approach is that makes it extremely difficult for pensioners to get a reasonable income from their investments.

These are both important subjects for further investigation. But the focus here is on the employment effects of the crisis. Even from this perspective, there are several channels worth considering.



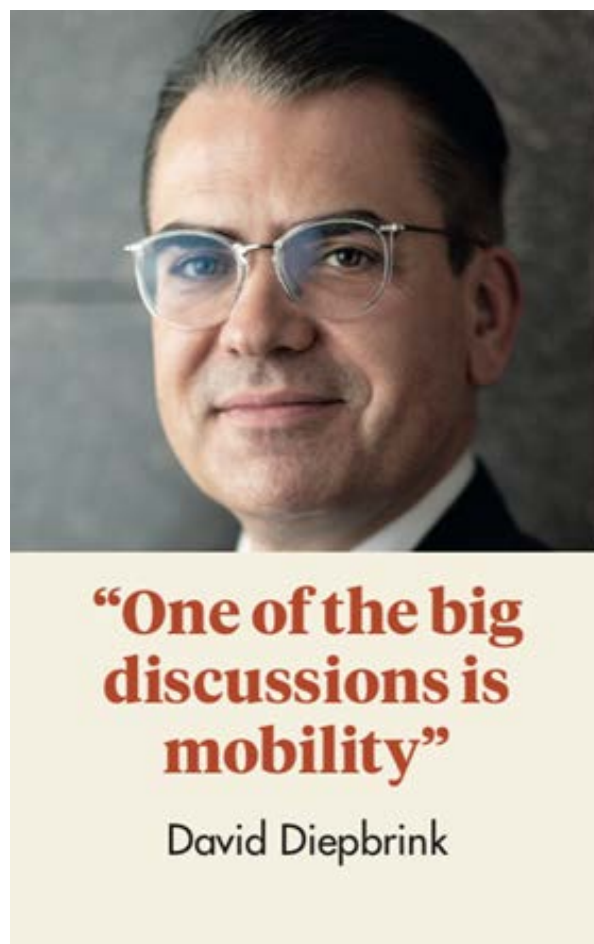
State pensions are likely to be squeezed further as governments find their fiscal position becoming more difficult. Part of the reason for the squeeze will of course be the cost of paying for measures to contained the virus and its economic impact. But the tax base will also narrow as unemployment rises.

Defined benefit (DB) schemes are likely to feel indirect effects from the employment squeeze. That is as opposed to the direct impact of financial repression – which push up their liabilities – and depressed returns on assets.

In the UK, for example, Milligan says the trend from DB to defined contribution (DC) pensions is likely to go even further than it already has done. “With all of these extra pressures it is all the more likely employers go for DC because it is the cheaper option as far as they are concerned”.

Another change related to UK DB pensions is identified by David Blake, professor of pension economics at Cass Business School in London. He says there is a big increase in people over 55 who are taking out their DB pots to spend now. Such a move can of course reduce the immediate financial pressures on such individuals but it means they face a reduced pension in the future.

Whereas DB schemes in the UK are nowadays largely confined to the public sector, in the Netherlands they are more ubiquitous. But here too there are likely to be secondary effects.



David Diepbrink, wealth leader at [Mercer](#) in Netherlands, points to a reassessment of priorities by his corporate clients. “One of the big discussions is mobility,” he says. In the corporate world, this relates to company cars, probably the second most costly employee benefit after pensions.

Diepbrink points out that in the post-COVID world it is likely there will be much more home working than before the pandemic. That means company cars will be a less attractive perk

than in the past. From an employee benefits perspective, that could mean maintaining pensions but cutting costs by dispensing with company cars.

Those reliant on DC pensions are likely to be harder hit. The impact, of course, will not be on the schemes themselves, since the risk is borne by the members who have lower pensions.

Members of such schemes are more likely to have periods of unemployment in which they do not make any contributions. These are unlikely to be made back up if and when they return to employment. That means that those affected are likely to have either a more delayed or more impoverished retirement.

The COVID crisis is also likely to accelerate the pre-existing trend towards greater job insecurity. That means a rising share of the self-employed, those on zero-hours contracts and those working in the 'gig economy' such as Uber taxi drivers.



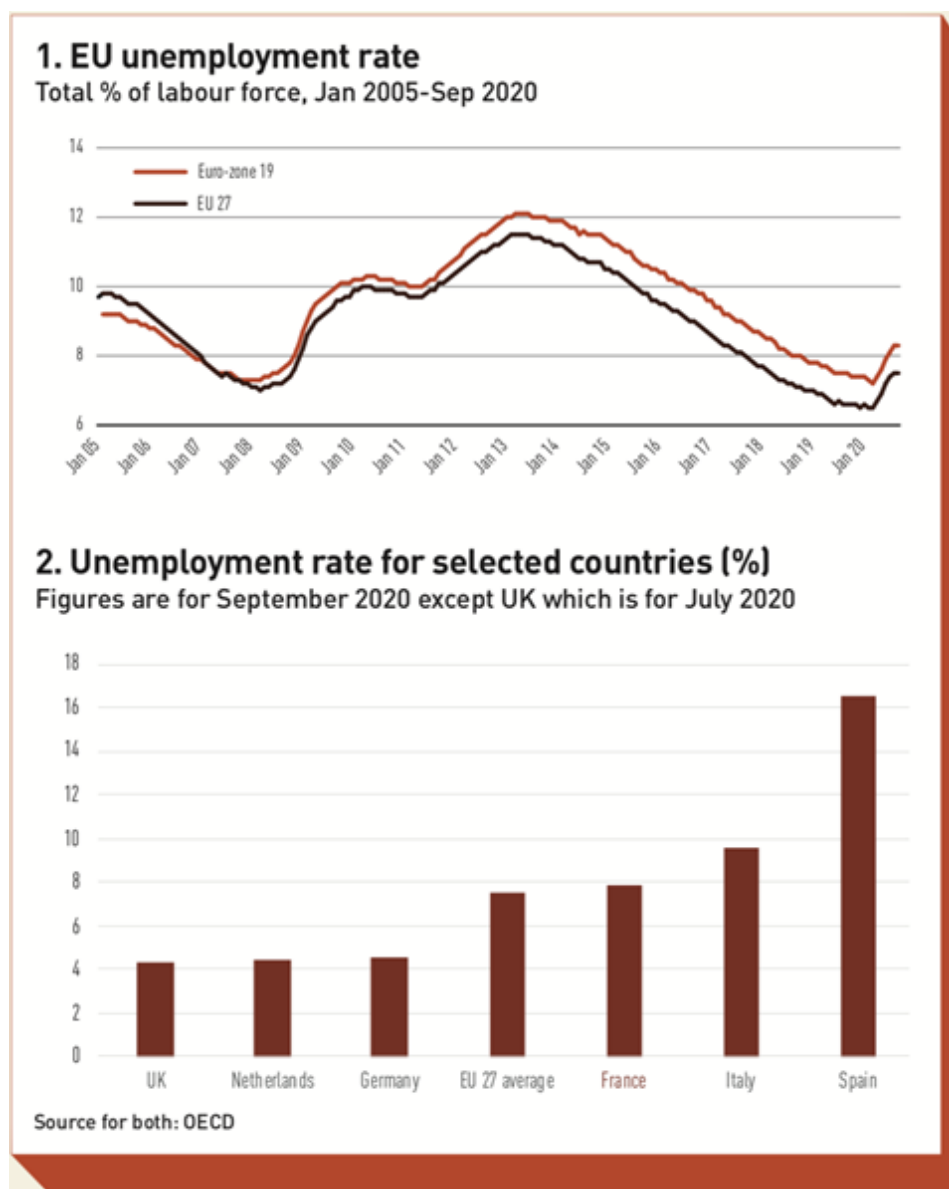
Some of these might have reasonable pension provision – particularly if they are fortunate enough to be wealthy – but many others are likely to fall through the net. This is not a new problem for pension provision but looks set to be exacerbated.

Pensions inequality looks set to widen. While the employment crisis is likely to hit pension provision, for many the effect will be profoundly unequal. The growing proportion of the population that is unemployed or in insecure work looks certain to suffer the most.



Roelof Salomons, professor of investment theory and asset management at Rijksuniversiteit Groningen, says in that respect, the situation in the Netherlands is similar to other European countries. “It especially puts the burden on the young, on people who have flexible jobs, are on zero-hours contracts or are service-oriented.” Under such circumstances, he points out that even his students are finding it difficult to get internships.

Blake even argues that the situation in the UK can be seen as a case of the relatively poor subsidising the relatively well off. That is because DB schemes – largely in the public sector – will in effect be financially backed by governments. But those in more marginalised sections of the labour market will be among those paying taxes to pay for such subsidies. “People in insecure jobs will be paying for public sector employees with their gold-plated pensions,” he says.



### Covid Not as Deadly to Life Settlement Population: Updated Analysis

ITM TwentyFirst now believes that the mortality risk for life settlement insureds is six times greater than the general population instead of six to 12 times higher, as it originally estimated.

By [Donna Horowitz](#)

Updated on August 08, 2020, 12:18 AM ET

The coronavirus is not as deadly to the life settlement population as previously thought, ITM TwentyFirst LLC said in its latest analysis.

The Minneapolis-based life expectancy provider put out an update Friday, Aug. 7, saying it believes the mortality risk is six times higher than the general population instead of six and 12 times higher.

The firm released its original analysis on the impact of Covid-19 on the life settlement population on May 19.

ITM TwentyFirst said it was basing its original analysis on data available through April 4.

"Since then, life settlements excess mortality has declined faster than national Covid-19 mortality, resulting in a risk estimate at the floor of our original range, around 6x," the company said.

For the latest analysis, the company said it defined excess mortality as the difference between observed deaths and expected deaths using the average weekly mortality rate that was observed between Dec. 29 through March 28.

It said the total mortality-risk factor steadily declined from 13.5 times higher on April 4 to 6.2 times higher on May 30.

The company said it doesn't know if the latest number has stabilized or will decrease further in the coming weeks.

"One explanation for the decline could be a delayed protective wealth effect where the delay is caused by the unprecedented nature of this pandemic," ITM TwentyFirst said.

"Once good information became widely available, wealthy individuals were able to take measures to guard against the virus such as moving away from hotspots and maintaining social distancing through remote work or retirement, use of delivery services, and avoiding public transportation."

The firm said there are other possible explanations for the decline.

Another could be that the time from exposure to death is shorter for Covid-19 victims who are older or had more pre-existing impairments and thus life settlement deaths from the virus occurred disproportionately early in the outbreak.

Yet another possible explanation is that the surviving insureds represented a lower-risk population because the most vulnerable in care facilities were impacted early in the pandemic.

The company said the underlying cause of the lower death rate might come to light when new data becomes available from current infections in the Sun Belt.

"We will continue to monitor the pandemic's impact on life settlements as we see new outbreaks in some localities and enter a season that might bring a second wave throughout the country," ITM TwentyFirst said.

Jay Olshansky, chief scientist and co-founder of Lapetus Solutions Inc., a competing life expectancy firm, praised the analysis.

"First, this research is based on real data, so there is little doubt as to the accuracy of what they're observing based on their current definitions," he said in an email. "They initially provided a range of mortality risk in the 6 to 12 range relative to a baseline population, and now based on much more data, they're declaring that the 6x seems more reasonable today."

He said it was appropriate for ITM TwentyFirst to say it didn't know exactly why the mortality rate has declined and that it can't predict the future.

"What I found most interesting was their explanation for why this might be happening," Olshansky said, referring to the wealth effect.



"This seems like a plausible explanation -- which is that wealthy people are more protected because they have the resources available to isolate effectively," he said. "I would add to their explanation the possibility that over time, the medical community has found various new ways to treat those with Covid that lower the death rate."

Olshansky, who also is a professor at the School of Public Health at the University of Illinois at Chicago, also said it's possible that a new strain of the virus has emerged that's less lethal.

But he has one caveat -- he's still not comfortable with estimated death rates from Covid by anyone.

He said that's because the population at risk, the denominator of the death rate, still is largely unknown and will remain that way for some time. Thus, he believes the observed rates come with an asterisk.

The second reason is that there could be overestimates of Covid deaths because anyone who dies with Covid is listed as a Covid death.

Conversely, he believes that there could be underestimates because many deaths from Covid have been occurring outside hospitals that don't get counted as Covid deaths.

"We may not know the magnitude of these issues for some time, so I'm hesitant to believe most Covid death rates reported by anyone, including the CDC (Centers for Disease Control and Prevention)," Olshansky said.

David Blake, a pension economics professor and director of the Pensions Institute at the Cass Business School in London, also thought the analysis "quite well" explained the reasons for the drop in deaths.

He said in an email that the oldest with the most co-morbidities, especially those in care homes, died at the beginning of the pandemic.

He said this is consistent with an accelerated deaths model study he wrote in May with two others, "The Impact of Covid-19 on Future Higher-Age Mortality." The study focused on people in England and Wales, showing the pandemic had the greatest impact on those over 50, particularly men.

Blake also agreed that once the nature of the virus became better known and how it spread, then those who were better off started shielding and isolating themselves at home and had their groceries delivered to them.

As of 7:34 p.m. Friday, there were 161,328 Covid deaths in the U.S., according to the Johns Hopkins University of Medicine coronavirus resource center.

For reprints of this story, please contact Jonathan McReynolds: [jmcreeynolds@thedeal.com](mailto:jmcreeynolds@thedeal.com)

**Donna Horowitz** | Senior Editor, *The Life Settlements Report*

**The Deal** | San Francisco Bay Area

[donna.horowitz@thedeal.com](mailto:donna.horowitz@thedeal.com) | Landline: 415.456.2758 | c: 415.794.8184 | [www.thedeal.com](http://www.thedeal.com)

## **Professional Pensions**

### **Assessing longevity in a post-Covid-19 world**

17 July 2020

Amy Kessler

*Amy Kessler, Professor Andrew Cairns, Professor David Blake and Marsha Kessler look at how schemes can make longevity assumptions post-Covid*

The outbreak of Covid-19 has created the worst global pandemic since the 1918 Spanish Flu, impacting individuals, communities and economies around the world. For pension funds and insurers, the pandemic has caused uncertainty around the future of mortality rates,

particularly at higher ages where the impact of the virus has been most acute. However, new research shows that the impact for the elderly may not be as dramatic as potentially feared.

### Accelerating deaths

Covid-19 has predominantly affected mortality at high ages. It kills people by inflaming and clogging the air sacs in the lungs, depriving the body of oxygen – inducing hypoxia – which closes down essential organs, in particular the heart, kidneys and liver, and causes blood clots (which can lead to stroke or pulmonary embolism) and neurological malfunction. Evidence from different countries points to the fact those who die are very often, but not always, much less healthy than the average for their age group.

Our research shows that many who die from contracting Covid-19 might have died in the relatively near future due to pre-existing medical conditions or co-morbidities. The pandemic 'accelerates' the deaths of many vulnerable people, leaving a surviving population that is healthier and less vulnerable. Given the current predictions of total deaths (between 75,000 and 85,000 in the UK), the impact on future mortality rates of the surviving population is expected to be very modest, meaning that the life expectancy of the surviving elderly population does not increase by a significant amount over pre-pandemic levels. It would take Covid-19 deaths above the worst-case scenario for the UK (500,000) for this to be significant.

Covid-19 also appears to increase each group's short-term mortality rate by a common multiplicative factor, whatever their starting mortality rate may be. This means that any group that starts out with elevated mortality rates (including the frail elderly and the most deprived) will experience materially higher absolute mortality rates during the pandemic compared with younger healthier individuals, but crucially not in relative terms when contrasting with pre-pandemic. Further, in both the most and least deprived groups, Covid-19 deaths are in proportion to the all-cause mortality. However, the groups in between have approximately 10-15% lower Covid-19 deaths compared with their all-cause mortality, possibly because these groups were better able to socially distance.

### Indirect consequences

What should not be overlooked are potential indirect consequences for future mortality of the pandemic and the 'lockdown' measures governments have imposed.

For example, there is evidence that some Covid survivors who needed intensive care could end up with a new long-term impairment, such as organ damage, which will reduce their life expectancy. There is also evidence that many people in lockdown did not seek a timely medical assessment for a potential new illness or deferred seeking treatment for existing illnesses, with the consequence that non-Covid-19-related mortality rates could increase in future. Self-isolation during lockdown has also contributed to an increase in alcohol and drug consumption by some people.

If another consequence of the pandemic is a recession and/or an acceleration in job automation, resulting in long-term unemployment, then this could lead to so-called 'deaths of despair'. Other people, by contrast, might permanently change their social behaviour or seek treatments that delay the impact or onset of age-related diseases. These could have the effect of increasing their life expectancy.

### Projecting liabilities

The research provides a useful framework for addressing three key challenges in the post-pandemic estimation of the life expectancy of particular groups of people, such as those in pension funds and insured annuity blocks.

First, it shows a way of adjusting the experience data collected during the pandemic period in order to avoid mis-estimating future mortality rates. Since Covid-19 appears to increase a cohort's short-term mortality rate by a common multiplicative factor, whatever their pre-pandemic baseline mortality rate, this factor can be used to normalise experience data.

Second, it shows how to assess anti-selection risk, if any, in the surviving population (i.e., the risk that the life expectancy of survivors differs from the pre-pandemic group of lives) in a flexible way that can be applied under a wide range of Covid-19 outcomes and across different countries. Third, it offers an approach to estimating the volatility that may arise in immediate post-pandemic mortality through an analysis of past seasonal influenza epidemics.

Our main conclusion is that if we can avoid a second wave of the pandemic, then Covid-19 will fortunately only have a modest effect on future mortality rates for the elderly.

*Amy Kessler is head of longevity risk transfer at Prudential Retirement, Andrew Cairns is a professor at Heriot-Watt University department of actuarial mathematics and statistics, David Blake is a professor at Cass Business School and director at the Pensions Institute, and Marsha Kessler is chief executive at M Kessler Group.*

# Beyond the numbers



## Summary

- There have been approximately 62,500 excess deaths this year. How many precisely can be directly attributed to Covid-19 is difficult to determine.
- Those with pre-existing conditions such as diabetes and heart disease, males, older ages and those from socioeconomically-disadvantaged backgrounds have been more likely to die of Covid-19.
- The mortality trends for pension schemes have broadly matched that of the general population, although can vary greatly by scheme.
- Pension scheme liabilities have declined by approximately 0.5 per cent, so not changing insurer pricing for longevity hedging.
- Longer-term consequences of the pandemic are expected to have a greater impact on future longevity, such as medical complications for Covid survivors and the negative health effects of the lockdown.
- The biggest impact on longevity will be if there is another protracted recession, due to the rise in unemployment and decline in healthcare funding it may cause.

## ✓ Laura Blows explores what the spike in mortality caused by Covid-19 means for pension schemes and the long-term impact of the pandemic on longevity

**6** 2,500 is the current, tragic, total of excess deaths in the UK this year. However, there is a lot of detail behind this simple, yet shocking, headline number.

### Excess deaths

The Continuous Mortality Investigation (CMI) states that there were 62,500 more

deaths in the UK from the start of the coronavirus pandemic to 26 June 2020 than if mortality rates were similar to those experienced in 2019.

According to the LCP *Longevity Report*, published in June, at the height of the pandemic in April/May, the Office for National Statistics (ONS) reported the highest number of registered deaths

in England and Wales in any week since 1993, and over double the typical number of deaths for that time of year. Therefore, as of end May 2020, the number of Covid-19 deaths in 2020 had led to a rise of 11 per cent in the year-to-date rate of mortality, LCP finds.

Meanwhile, Prudential Retirement head of longevity risk transfer, Amy Kessler, puts the number of UK deaths for March/April/May this year to be 125 per cent of 2019 totals over the same period last year.

Where these deaths are occurring has also changed compared to 2019. For instance, between 13 March and 8 May, over 8,000 fewer deaths were registered in hospitals than in the corresponding period in the weekly average, a decrease of 20.9 per cent, the ONS finds. In contrast, almost 11,000 more deaths were registered in care homes, an increase of 60.5 per cent, and over 8,000 more deaths were registered in private homes in this period, an increase of 42.6 per cent.

Covid-19 is attributable to the majority, but surprisingly not all, of these excess deaths.

For example, in just one week, ending 17 April, at the peak of the pandemic, XPS Pensions Group's Covid-19 Tracker finds that there were 14,340 excess deaths, with 9,408 of these being attributed to Covid-19, and 4,932 excess deaths being non-Covid related.

The largest increase in non-Covid excess deaths are seen in deaths due to 'dementia and Alzheimer's disease', at 5,404 excess deaths (an increase of 52.2 per cent the five-year average), with 'symptoms, signs and ill-defined conditions' (the latter mostly indicating old age and frailty) seeing 1,567 excess deaths between 13 March and 1 May. Combined, these comprise two-thirds of total non-Covid-19 excess deaths in this period, the ONS states. However, it warns that some of these may be due to undiagnosed Covid-19.

There are challenges to clearly defining which excess deaths are due to

recent years, driven by the widening of UK and US corporate bond spreads, the report adds, so “schemes hedging longevity only (ie through a longevity

### **“18,000 increase in cancer deaths over next year due to Covid impact”**

swap transaction, rather than a buy-in or buyout) will want to give careful consideration to the value offered given the current uncertainty around future longevity”.

“Many pension schemes are focused on the bulk of their liabilities, which mainly sit with the middle and upper aspects of their membership,” Kessler says. “In these groups of members there is not quite as much mortality as the lower groups that are less likely to be in the pension scheme or only have a small amount of money within it.”

Aon Risk Settlement Group partner and head of demographic horizons, Tim Gordon, agrees, stating in June that “the socio-economic profile of pension schemes means that their liabilities are typically partially insulated from the variations we see in national mortality statistics”.

Accordingly, it would be premature now to make major changes to best estimate longevity assumptions in either direction, he adds.

“Indeed, it is reasonable for median best estimate assumptions to remain broadly unchanged.”

#### **Knock-on effects**

The excess number of deaths experienced this year so far may not have a significant immediate effect on pension scheme liabilities, but the pandemic’s long-term knock-on effects may have an even greater impact on future life expectancy than the virus itself, *The Impact of Covid-19* paper predicts.

For instance, how the life expectancy

of Covid-19 survivors is affected is up for debate. There may be a modest increase in life expectancy of around 0.2 per cent at age 65, *The Impact of Covid-19* paper predicts.

Yet, akin to the 1918 Spanish flu or SARS, survivors may be left with long-term health damage such as lung scarring or blood clots, Institute and Faculty of Actuaries (IFoA) *Longevity Bulletin* editor, Matthew Edwards, warns.

“There is growing evidence that a number of survivors of the virus (often young people in their 30s) who needed to be hospitalised have developed serious health conditions that they did not have before, such as lung scarring and new-onset diabetes,” Pensions Institute director and co-author of *The Impact of Covid-19* paper, David Blake, agrees.

It may not be necessary to have even had Covid for health to be affected by the pandemic. There is expected to be an increase in non-Covid deaths due to people avoiding hospitals and missing doctor appointments during lockdown. For instance, LCP notes that A&E departments reported 50 per cent less activity than usual during April.

The result of this may already be playing out, as the ONS notes deaths due to causes such as asthma and diabetes increased up to the week ending 24 April 2020 and occurred increasingly outside hospital; this could suggest a delay in care for these conditions is leading to an increase in deaths, although this rise could also be related to undiagnosed Covid-19.

*The Impact of Covid-19* paper cites research from the University College London and the Health Data Research Hub for Cancer, which predicts that up to 18,000 more people could die from cancer over the next year in England because of the impact of Covid-19.

The paper also highlights Cancer Research UK findings that referrals by doctors for urgent hospital appointments had fallen by 75 per cent – equivalent to 2,300 cases per week – while 400 cancers

a week were being missed because 200,000 weekly screenings for breast, cervical, lung and bowel cancer were suspended during the lockdown.

Longer term still, the cancellation of millions of non-urgent procedures, such as hip and knee replacements, is expected to affect morbidity and mortality patterns, LCP’s report predicts. “Several million are currently on waiting lists, and with fears that this could be as high as eight million by autumn, the waiting time for ‘non-urgent’ procedures is likely to be longer than ever. For those waiting for hip replacements, for example, this

### **“7% fewer deaths in week 26 of 2020 compared to week 26 2019”**

can mean months longer with more sedentary lifestyles, affecting their mortality risk in years to come,” it states.

However, Kessler points out that, for the vast majority of people, missing four months of normal healthcare is not life changing. “The question is: are people immediately going to seek that healthcare they missed after lockdown or will they stay home all year?”

Avoiding doctors is not a welcome change, but some people implemented more positive health actions during lockdown, such as social distancing, wearing face masks, drinking less and exercising more.

Yet Edwards is sceptical that these new habits will transform into long-term change. “In five years’ time I doubt we’ll still be obsessing over 30-second handwashing,” he says.

Some behaviours may have become more self-destructive during lockdown, as estimates suggest one in three have put on weight, and smoking and alcohol consumption have increased in the most at-risk groups, while physical activity has declined, the LCP *Longevity Report* states.



## **“62,500 excess deaths”**

Covid-19, and which to other factors. For instance, the ONS may publish how many have died where Covid-19 is mentioned on their death certificate, but the virus may not actually be the primary reason for death, LCP suggests.

While the exact role of Covid-19 in all excess deaths is hard to define, the total excess deaths are just a fifth of the worst-case scenario as charted by Imperial College, Kessler states.

In fact, the 62,500 excess is a decrease from 63,500 excess deaths to 12 June 2020, the CMI reports. At the time of writing, the CMI also finds a recent decrease in the number of deaths in the UK occurring each week. For instance, there were 7 per cent fewer deaths registered in week 26 of 2020 than if death rates had been the same as week 26 of 2019, it notes.

These fewer deaths compared to 2019 are particularly striking, considering that the average mortality rate in England & Wales fell in 2019 by 3.8 per cent, to 530,000, 13,000 fewer than the previous year, LCP finds. This year had also begun with mortality levels lower than the same time in 2019, until coronavirus struck.

“Excess deaths have declined now compared to March-May because I think those in the most infirm health that may have died from something else this year already died from Covid-19 during these peak months,” Kessler suggests.

### **Vulnerability**

Those with certain pre-existing conditions, such as chronic kidney disease, serious heart conditions, type-2 diabetes, obesity or a weakened immune system, are more likely to die from Covid-19.

According to the CMI, the number of excess deaths has predominantly been driven by older ages dying, with the impact on males being slightly greater.

*The Impact of Covid-19 on Future Higher-Age Mortality* report, published in May, states that more than 97 per cent

of deaths occur above the age of 50, but “the highest risk is of course frail elderly over 85”, Kessler (a co-author of the paper) adds.

People living in more deprived areas have seen a bigger increase in mortality rates during the pandemic compared to those in less deprived areas, the CMI also finds. Kessler gives the example of London, which has twice the amount of deprived areas as the rest of the country and also had twice the Covid infection rate. Yet these higher Covid-mortality groups did not actually see a disproportionate increase in mortality rates. According to the CMI, mortality rates nearly doubled for all groups during April, at the peak of the pandemic.

However, “the poor and poor health came into the pandemic with a higher mortality rate already”, Kessler says, “so it was just equally multiplying from that rate”. As she says, “the coronavirus has exposed the impact of inequality on longevity and magnified it”.

### **Pensions experience**

The experiences of pension schemes seem to echo that of the general population.

The LCP *Longevity Report* analyses the recent experience of the defined benefit pension schemes it administers, covering around 65,000 members. “Our analysis shows there has been an increase in the number of deaths, but this has broadly been in line with the increases within the general national population,” it states.

“We are seeing the deaths within the pension schemes for which we do administration following the general population trends, but with a few-weeks delay, as people deal with other death-related matters like cancelling bank accounts before thinking to contact the pension provider,” XPS head of longevity, Steve Leake, says.

However, XPS’ Scheme Vulnerability Analysis tool shows that this can vary greatly by scheme, Leake adds. “During

the peak of the virus some schemes may have two to three times the number of expected deaths, while another pension scheme may just have the same volume of deaths as 2019,” he explains.

Using data analytics to conduct member profiling at a postcode level to determine things such as member age, likelihood of living in a care home, financial situation, living in pandemic ‘spike’ areas like London or Leicester, and health could help pension schemes understand how vulnerable their members are to the coronavirus.

“For instance, you may know how many members you have over 75 and are at greater risk but may not know how many live in a care home or hospital and so are at even greater risk,” Leake says.

This information can help a scheme assess the likely impact of Covid on its 2020 mortality levels.

### **Longevity hedging**

“If the number of excess deaths continue to run off and stay low, and with an economic recovery, its impact on a typical pension scheme will be quite modest, around a 0.5-1 per cent reduction in liabilities,” Leake predicts.

Therefore, any trustees questioning whether now would be a sensible time to look to hedge longevity risk is unlikely to find a great difference in pricing.

“From LCP’s ongoing discussions with insurers and reinsurers, they are making very little (if any) allowance for the impact of Covid-19 in their longevity assumptions at the current time,” the LCP *Longevity Report* states. “Holding out for the potential for increased mortality in your scheme this year is unlikely to save you as much as locking into the favourable pricing opportunities that can arise during periods of volatile market conditions.”

Indeed, March and April saw attractive buy-in and buyout pricing of

## **“11% rise in mortality as of May 2020”**

## **“2-3x number of average deaths for some pension schemes during the virus peak”**

At least half a million more people in the UK may also experience mental ill health as a result of Covid-19 over the next year, the Centre for Mental Health predicted in May. This makes the rise in mental health issues another increasing concern, Edwards says, also highlighting the centre's statistic that PTSD occurs in about 20 per cent of people who needed intensive care treatment.

Looking further ahead, it is still very uncertain whether there may be future waves of Covid-19, or even of different pandemics, and whether survivors of previous pandemics will have immunity and therefore increased life expectancy is up for debate.

### **Economy/longevity link**

But beyond the health issues, Covid-19's biggest impact on life expectancy will likely be due to economic factors.

One of the predicted fallout from Covid-19 is a global recession. In June, the Organisation for Economic Co-operation and Development (OECD) predicted that the UK economy will nosedive by 11.5 per cent. If history repeats with the global financial crisis (GFC) of 2008 and the longevity trends that followed it, “projected life expectancies could fall by as much as 4-5 per cent”, LCP says.

“Over the past 20-plus years there have been improvements in longevity of around 3 per cent a year between 2000-2010. Then between 2010-2015 it only increased around 1 per cent a year. This was due to many different drivers but one was the reduction in public funds to health and social care *[as a result of the GFC]*,” Edwards explains. “The strength of the economy relates to mortality and life expectancy. Both by directly in health expenditure but also with those employed being in better health than the

unemployed.”

*The Impact of Covid-19* paper agrees that if there is long-term unemployment as a result of the pandemic, this could lead to so-called ‘deaths of despair’ in the future. The start of the year saw 3.9 per cent unemployment, one of the lowest rates since 2010, but this is expected to significantly rise as furlough winds up. According to the ONS, around 612,000 lost their jobs in May compared to March, a 2.1 per cent decline in paid employees.

However, while higher unemployment may result in an uptick in suicide instances and other stress-induced disorders, pensioners “may benefit from having family with time to spare to look after them” potentially leading to a rise in their life expectancy, LCP's report suggests.

Yet an economic downturn might reduce spending on medical and pharmaceutical research, causing a reduction in long-term future mortality improvements, and may cause general medical advances to stall as resources are redirected to finding a vaccine and treatments for Covid-19, *The Impact of Covid-19* paper warns.

The current economic downturn may not play out in the same way as the global financial crisis though, since this one has come about under such different circumstances.

Leake recommends pension schemes consider the impact of a range of different economic scenarios, from an ‘instant’ recovery as lockdown eases, to a protracted global recession. “If things go back to normal there may be a 0.5 per cent reduction in liabilities for a typical scheme. But if we get a recession then it may result in a 5 per cent reduction in liabilities,” he says.

### **Monitoring**

Therefore, it is important that pension schemes closely monitor member deaths over the next months and years to see whether they are in line with the death

rates predicted by their scheme actuaries, Blake says.

“Large schemes do this as a matter of course, but it is much more important now,” he says. “Clearly, excess deaths above predicted levels will reduce pension liabilities. But they should also stay in close contact with employers for evidence of younger employees taking

## **“Recession = estimated 5% reduction in pension liabilities”**

sick leave *[due to the long-term health effects of surviving Covid-19]*. In extreme cases, this could result in ill-health early retirements, which could have the effect of raising liabilities as well as reducing future assets such as future employee pension contributions.”

However, pension schemes must not overreact to high short-term UK mortality data when looking to set their long-term mortality assumptions, as Aon warned back in June.

The past four months have been unique, and as such “the industry is trying to understand what ‘this’ all means at a population level, before we can extrapolate that down to individual schemes”, Kessler warns.

It is as AMNT co-chair, David Weeks, says: “Pension schemes should keep up-to-date with the latest mortality information. But recognise that decision making with imperfect information is the challenge that we are all having to work with.”



**Written by Laura Blows**



## **Stock pickers fail to beat passive peers — and may see a ‘swift volte-face’ from investors**

*Active managers still trail passives during the pandemic-driven volatility, as evidence shows they're 'very poor at market timing'*

<https://www.fnlonon.com/articles/stock-pickers-fail-to-beat-passive-peers-and-may-see-a-swift-volte-face-from-investors-20200729>

David Ricketts, 29 7 20

This was supposed to be their time to shine.

After a more than decade-long bull market that proved simply tracking an index would bring in hefty returns, active fund managers welcomed the volatile market environment ushered in by the pandemic. Sifting the winners from the losers is supposed to be easier in rocky markets.

But it hasn't turned out that way. According to Morningstar, actively managed funds investing in UK large-cap stocks generated average returns of -17.30% between January and June, compared to -17.25% for the largest open-ended passive fund which invests in the same type of companies.

David Blake, a professor in the finance faculty of City University in London, said the overwhelming weight of academic evidence shows that stock pickers are “very poor at market timing”.

Underperformance during the Covid-19 pandemic is an example of this, he said.

“Most outperformance is due to luck, not skill,” said Blake. “It takes a very long period of performance data to distinguish skilled managers from lucky ones.”

Performance was only mildly better for those active managers investing in large-cap European stocks. Average returns for actively managed funds in this sector were -11.29% during the first six months of the year, compared to -12.19% for the largest index fund in the sector.

Separate research from AJ Bell, the online investment platform, shows the average UK All Companies fund delivered the same return as the FTSE All Share index between January and June at -16.6%. However, almost half of funds in this sector delivered returns lower than the index.

Performance among UK Equity Income funds was even worse, with more than two-thirds of funds in the sector delivering lower returns than the FTSE 100 index during the same period.

The only outperformers identified by AJ Bell were among US active stock pickers. But even that was ho-hum. The average US fund returned 3.6% on average, compared to 1.4% for the S&P 500, the research showed.

The failure of active managers to set themselves apart from their passive counterparts is likely to add fuel to accusations that most stock pickers are “closet trackers” – a term used to describe funds which charge fees for active management but fail to deliver returns above their benchmark.

The UK regulator has already taken action against closet index funds. Last year it fined a division of Janus Henderson £1.9m for charging retail investors hefty fees on two funds, despite shifting management towards a passive investing style. The FCA said the move amounted to “closet tracking”.

The fine came more than a year after the regulator revealed that several asset managers had paid back £34m to investors for overcharging them for active management.

Laura Suter, personal finance analyst at AJ Bell, said that because fund managers charge higher fees than passives, their returns need to be greater than the market just to return the same as the index after fees.

“Many have failed to do so in the year so far, meaning their fees are eating away at returns or putting them deeper into losses.”

Despite underperformance, some active fund managers have gathered new money from investors.

Data from the Investment Association, the trade body representing UK asset managers, showed retail investors ploughed a net £3.5bn into active funds in May. This figure was more than double the £1.3bn gathered by index funds during the month.

However, stock pickers are being warned they will need to demonstrate skill in order to keep hold of these fresh assets.

“If active managers continue to underperform we could see a swift volte-face to passives,” said Suter.

Alan Miller, founding partner of SCM Direct, said claims by active managers that they can protect investors from substantial losses during a downturn by using stock picking abilities are “completely bogus”.

“They will have to invent some new argument to stop the rush by investors out of active funds into passive funds attracted by more performance, more transparency and less fees,” said Miller.

***To contact the author of this story with feedback or news, email [David Ricketts](mailto:David.Ricketts@ajbell.co.uk)***

## **Post-COVID-19 study provides framework for mortality planning, by Gail Moss, IPE 21 May 2020**

<https://www.ipe.com/news/post-covid-19-study-provides-framework-for-mortality-planning/10045761.article?adredir=1>

New research measuring the impact of COVID-19 on the future life expectancy of older people in the surviving population has been published by The Pensions Institute.

The paper – The Impact of COVID-19 on Future Higher-Age Mortality – focuses on England and Wales and assesses the implications of the pandemic for pension funds, insurance companies and academics who model and measure longevity risk. It also provides a framework for analysing future data on the virus.

Its authors are Professor Andrew Cairns, department of actuarial mathematics and statistics, Heriot-Watt University; Professor David Blake, Cass Business School and director of the Pensions Institute; Amy Kessler, head of longevity risk transfer, Prudential Retirement; and Marsha Kessler, CEO of M Kessler Group, a speciality consulting firm focused on data-driven transformation in healthcare.

While other COVID-19 research covers the spread and control of the virus, the authors of the study believe it is the first to cover mortality of the surviving population after the pandemic has abated.

The paper's key finding is that COVID-19 seems to increase each cohort's short-term mortality risk by a common multiplicative factor. In other words, if mortality rates rise temporarily at 10% in relative terms at one age, they will also rise by about 10% at other ages.

Blake told IPE: "Unlike other research, our finding is that there is some early acceleration of death and that those who die would likely have done so within, say, a few years from other causes such as respiratory disease. That should, therefore, lead to fewer deaths in the short term from other causes."

The researchers also examined how socio-economic differences impact COVID-19 mortality.

They found that once they controlled for regional differences in mortality rates, COVID-19 deaths in both the most and least deprived groups are proportional to the all-cause mortality of these groups.

However, the groups in between have lower COVID-19 deaths – by around 10-15% – compared with their all-cause mortality.

"The reason for this is not clear, although it might be because they were better able to adapt to lockdown and maintain more effective social distancing than the other groups," said Blake.

And current behavioural responses to the pandemic were also examined.

They observed that some surviving patients who needed intensive care could acquire a new impairment such as kidney damage, which will reduce their life expectancy.

Furthermore, many people in lockdown have not sought timely medical assessments for potential new illnesses such as cancer, with the consequence that mortality rates unrelated to COVID-19 could increase in future.

Other indirect consequences include increased alcohol consumption, and poorer health and even suicides as a result of long-term unemployment.

However, some people may retain healthier lifestyles adopted during lockdown, which could increase their life expectancy.

## Predictions

The authors said their research provides not only data, but a simple and flexible modelling framework which will be effective using future data, without the need to change existing models.

They also predict a total of 80,000 COVID-19-related deaths in England and Wales. However, the model's flexibility means it can be applied to different levels of such deaths.

Blake told IPE: "It can also be applied to different European countries. While the different parameters will have to be changed to match the circumstances of each country, the model itself does not have to be changed."

Such parameters could include patterns of infection and death rates at different ages, and the years of life lost by those who die from COVID-19, again at different ages.

Kessler told IPE: "Whether for valuations, pricing or the underwriting of risk, the industry has been waiting for this kind of framework."

She continued: "There are three major challenges in working with data relating to the pandemic: adjusting experience data from the pandemic period; making assumptions about

anti-selection risk going forward; and assessing volatility to come. The great thing is this research addresses all three challenges.”

The research is available [here](#).

**Covid-19 unlikely to affect long-term mortality rates, by Angus Peters, Pensions Expert, 20 May 2020**

<https://www.pensions-expert.com/DB-Derisking/Covid-19-unlikely-to-affect-long-term-mortality-rates?ct=true>

On the go: The coronavirus pandemic is likely to have a very muted impact on the pensions sector, according to a new report emphasising that a reasonable proportion of Covid-19 deaths would have occurred this year anyway.

The paper on future higher-age mortality, produced by the Cass Business School and the Pensions Institute alongside Heriot-Watt University and insurer Prudential, points to the proportionality of deaths at different ages due to the virus and those due to all causes.

It argues that the disease acts as a multiplicative factor on existing mortality trends and that the life expectancy of healthy people will not be drastically changed, as only a small percentage of deaths have so far been people with no pre-existing conditions.

Adopting the worst-case scenario of an uncontrolled pandemic with 500,000 deaths, modelling showed that due to accelerated deaths being concentrated among those with shorter life expectancies, a drastic spike in monthly deaths for a cohort of 75-year-olds would be followed by a dip below the non-pandemic projection of monthly deaths, before the mortality experience reverts to previous assumptions.

Even under this model, life expectancy for the entire cohort only dropped to 13.04 years from 13.14 years if no pandemic had occurred. Survivors would have a life expectancy of 13.45 years.

The smaller the overall tally of Covid-19 deaths, the quicker this spike and dip feature would revert to the norm – leading the academics to conclude that at a best estimate of between 75,000 and 80,000 deaths, little impact is likely to be observed on the life expectancy of survivors. The baseline case would see 7 per cent of all deaths over the next year linked to the disease, with an average of four years of life lost on average.

“We believe that the effect of Covid-19 will be to accelerate the deaths of people who aren’t very well and might have died in the near future anyway,” said Dr David Blake, professor of pension economics at Cass Business School and director at the Pensions Institute.

The study does, however, admit that between 7 and 12 per cent of deaths are people who had the potential to live significantly longer.

The paper has implications for the government, in its weighing up of the economic cost of continued lockdown against the risk to life, but also for pension schemes building their assumptions about member longevity.

“Many of us in the industry are about to start working with datasets that have the pandemic in them,” said Amy Kessler, head of longevity risk transfer at Prudential Retirement.

She said pension providers will need to know how to adjust experience data, whether there will be so-called anti-selection, and the volatility that can be expected in deaths data.

Headlines have focused on the disproportionate impact of Covid-19 on more deprived demographics citing possible increased exposure, and the report confirmed that the worst-off have been hit the hardest by the virus.

However, it also found that deaths for the three most deprived and one least deprived deciles of socio-economic background were proportional with all-cause mortality. Only middle deciles fared comparatively better, perhaps due to better adaptation to lockdown and social distancing.

The report’s authors did suggest that direct and indirect results of the virus, including new organ damage sustained during infection but also lockdown effects such as increased reluctance to visit hospitals for non-Covid-19 services, could have an as-yet unknown impact on future mortality.

**Indirect Covid-19 consequences ‘may have greater impact on life expectancy’ – PI, by Laura Blows, Pensions Age, 20 May 2020**

<https://www.pensionsage.com/pa/Indirect-Covid-19-consequences-may-have-greater-impact-life-expectancy-PI.php>

The indirect consequences of the Covid-19 crisis could have a bigger impact on future life expectancy than the immediate consequences of the pandemic, research from the Pensions Institute has revealed.

The Impact of Covid-19 on Future Higher-Age Mortality paper, co-authored by the Pensions Institute, Cass Business School, Prudential Retirement, Heriot-Watt University and M Kessler Group highlighted evidence that many people in lockdown did not seek a timely medical assessment for a potential new illness such as cancer, or deferred seeking treatment for an existing serious illness, meaning the consequence that non-Covid-19-related mortality rates could increase in future.

The paper cited Cancer Research UK findings that referrals by doctors for urgent hospital appointments had fallen by 75 per cent – equivalent to 2,300 cases per week. Another 400 cancers a week were being missed because 200,000 weekly screenings for breast, cervical, lung and bowel cancer was suspended during the lockdown. IT also references a study from University College London and the Health Data Research Hub for Cancer, which predicted that up to 18,000 more people could die from cancer over the next year in England because of the impact of Covid-19.

The Impact of Covid-19 on Future Higher-Age Mortality report found that other indirect consequences include self-isolation during lockdown leading to an increase in alcohol and drug consumption by some people, which might reduce their life expectancy. The researchers noted if there is long-term unemployment as a result of the pandemic, this could lead to so-called 'deaths of despair' in the future.

It also warned that the long-term impact of the economic downturn might reduce spending on medical and pharmaceutical research, causing a reduction in long-term future mortality improvements and may cause general medical advances to stall for a number of years as resources are redirected to finding a vaccine and treatments for Covid-19.

However, some people might permanently change their social behaviour, such as social distancing or wearing face masks in public, or seek treatments that delay the impact or onset of age-related diseases that affect their susceptibility to coronavirus, which could have the effect of increasing their life expectancy, the paper added.

The research also found some surviving coronavirus patients at all ages who needed intensive care could end up with a new impairment, such as kidney damage or reduced liver function, which will reduce their life expectancy. But for survivors as a whole, the paper conjectured that their life expectancy has increased relative their age cohort before the outbreak of the pandemic. However, the increase in life expectancy of survivors is likely to be very modest, around 0.2 per cent at age 65, it stated.

"It is too early to quantify these possibilities, although it is conceivable that these indirect consequences could have a bigger impact on future life expectancy than the immediate consequences of the pandemic," , Prudential Retirement head of longevity risk transfer, Amy Kessler, said.

The research also examined how socio-economic differences impact Covid-19 mortality.

"We have also looked at variation in mortality by socio-economic group using data from England and Wales," Pensions Institute director and Cass Business School professor, David Blake, said.

"Once we control for regional differences in mortality rates, Covid-19 deaths in both the most and least deprived groups are proportional to the all-cause mortality of

these groups. However, the groups in between have lower Covid-19 deaths compared with their all-cause mortality.”

The reason for this is not clear, although it might be because they were better able to adapt to lockdown and maintain more effective social distancing than the other groups, Blake added.

“The key finding that Covid-19 seems to increase each cohort’s short-term mortality risk by a common multiplicative factor will help pension funds and insurers to properly assess liabilities now and in the future, Kessler stated.

“Assuming Covid-19 mortality in England and Wales between 75,000 and 85,000, we expect the impact on the mortality rates of the surviving population to be very modest,” Heriot-Watt University department of actuarial mathematics and statistics, professor, Andrew Cairns, concluded. “The impact on mortality rates post pandemic is not expected to be material unless deaths turn out to be a multiple of these levels.”

**Covid-19 impact on survivor mortality rates to be 'modest', study finds, by James Phillips, Professional Pensions, 20 May 2020**

<https://www.professionalpensions.com/news/4015474/covid-19-impact-survivor-mortality-rates-%E2%80%98modest%E2%80%99-study>



Pension schemes and life insurers should be prepared for a modest change to their assumptions for mortality rates in the post-Covid-19 world, an academic study suggests.

Analysis of data from England and Wales to 12 May finds that deaths from the novel disease are largely, but not always, confined to those who tend to be less healthy than others in their age group. The result is that the years of life lost through early death are less than the average for each age group.

The research came as latest Continuous Mortality Investigation data revealed deaths in week 19 of 2020 (2 May to 8 May) were 1.4 times higher than in the same week of



2019, while death figures are 61,000 higher than expected since the start of the pandemic compared to 2019 mortality rates. However, it warned that death figures may be understated due to reduced data collection over the VE Day anniversary bank holiday weekend.

The academic paper - The Impact of Covid-19 on Future Higher-Age Mortality, written by Heriot-Watt University professor Andrew Cairns, Cass Business School professor and Pensions Institute director David Blake, Prudential Retirement head of longevity risk transfer Amy Kessler, and M Kessler Group chief executive Marsha Kessler - also concluded that many of those who have so far died during the pandemic "would have died anyway in the relatively near future". This is due to the presence of other life-shortening illnesses such as heart diseases, Alzheimer's, and diabetes.

Consequently, the academics estimated that there would be a "very modest" increase in life expectancy for survivors of around 0.2% at age 65, implying that "the impact of anti-selection on future life expectancies is negligible". This is based on mortality from the disease in England and Wales being between 75,000 and 85,000.

However, it did highlight that there was some evidence that lower socio-economic groups were 10-15% more likely to contract and die from Covid-19 than those in middle-ranking deprivation groups, largely as a result of a lesser ability to conform to social distancing measures due to working requirements.

Blake explained: "Once we control for regional differences in mortality rates, Covid-19 deaths in both the most and least deprived groups are proportional to the all-cause mortality of these groups. However, the groups in between have lower Covid-19 deaths compared with their all-cause mortality. The reason for this is not clear, although it might be because they were better able to adapt to lockdown and maintain more effective social distancing than the other groups."

The paper also predicted death rates will be low in 2021, "due to anti-selection", before gradually reverting to previously predicted mortality levels - but added indirect consequences of the pandemic could affect overall mortality trends.

These factors include long-term impairments that may arise from contracting but surviving the disease, delayed diagnoses on other medical issues, increased alcohol or drug intake during the lockdown, and "deaths of despair" from long-term economic fallout or increase job automation. However, changes to social and workplace behaviour or increased use of anti-ageing treatments could have a converse effect.

Kessler said: "This body of work is crucial for mortality modeling as the pandemic progresses and in its aftermath. The key finding that Covid-19 seems to increase each cohort's short-term mortality risk by a common multiplicative factor will help pension funds and insurers to properly assess liabilities now and in the future."

The paper will continue to be updated as further data becomes available.

### **New research measures COVID-19's unexpected impact on future life expectancy of senior citizens**

*Top longevity researchers examine the direct and indirect consequences of the virus on the most vulnerable population.*

<https://news.prudential.com/new-research-measures-covid-19s-unexpected-impact-on-future-life-expectancy-senior-citizens.htm>

May 20, 2020

COVID-19 has created the worst global pandemic since the 1918 Spanish flu, impacting communities and economies around the world. For pension funds and insurers, who help ensure the financial stability of retirees and their families, the pandemic has caused uncertainty around the future of mortality rates, particularly at higher ages where the impact of the virus has been most acute.

Now, new research from leading experts on longevity risk from around the globe—including representation from the industry and academia—will help pension funds and insurers properly assess liabilities in a post-pandemic world.

“[The Impact of COVID-19 on Future Higher-Age Mortality](#)” is a new research paper authored by Professor Andrew Cairns, Department of Actuarial Mathematics and Statistics, Heriot-Watt University; Professor David Blake, Cass Business School and director of the Pensions Institute; Amy Kessler, head of Longevity Risk Transfer, Prudential Retirement; and Marsha Kessler, CEO of M Kessler Group.

Blake, Cairns and Amy Kessler, who together bring the brightest minds from Europe, North America and Asia each September to the annual International Longevity Risk and Capital Markets Solutions Conference, have used the lockdown to quickly assess the implications COVID-19 has for pension funds, insurance companies and academics who model and measure longevity risk.

“This body of work is crucial for mortality modeling as the pandemic progresses and in its aftermath,” Amy Kessler said. “The key finding that COVID-19 seems to increase each cohort’s short-term mortality risk by a common multiplicative factor will help pension funds and insurers to properly assess liabilities now and in the future.”

The researchers also examined how socioeconomic differences impact COVID-19 mortality.

“We have also looked at variation in mortality by socioeconomic group using data from England and Wales,” Blake said. “Once we control for regional differences in mortality rates, COVID-19 deaths in both the most and least deprived groups are proportional to the all-cause mortality of these groups. However, the groups in between have lower COVID-19 deaths compared with their all-cause mortality. The reason for this is not clear, although it might be because they were better able to adapt to lockdown and maintain more effective social distancing than the other groups.”

The [new paper](#) also explores current behavioral responses to the pandemic, the lockdown measures governments around the world are using to contain it, and some of the indirect consequences for future mortality.

The research team found, for example, there is evidence that some surviving patients at all ages who needed intensive care could end up with a new impairment, such as kidney damage, which will reduce their life expectancy.

There is also evidence that many people in lockdown did not seek a timely medical assessment for a potential new illness such as cancer, or deferred seeking treatment for an existing serious illness, meaning the consequence that non-COVID-19-related mortality rates could increase in future.

Other indirect consequences include self-isolation during lockdown leading to an increase in alcohol and drug consumption by some people, which might reduce their life expectancy. The researchers noted if there is long-term unemployment as a result of the pandemic, this could lead to so-called “deaths of despair” in the future.

Other people, by contrast, might permanently change their social behavior or seek treatments that delay the impact or onset of age-related diseases, one of the primary factors that make people more susceptible to the virus—both of which could have the effect of increasing their life expectancy.

“It is too early to quantify these possibilities, although it is conceivable that these indirect consequences could have a bigger impact on future life expectancy than the immediate consequences of the pandemic,” Amy Kessler said.

“Assuming COVID-19 mortality in England and Wales between 75,000 and 85,000, we expect the impact on the mortality rates of the surviving population to be very modest,” Cairns concluded. “The impact on mortality rates post-pandemic is not expected to be material unless deaths turn out to be a multiple of these levels. We will, of course, continue to update this work as additional data become available, but wanted to share early findings as soon as possible.”

To watch a replay of Cairns, Blake and Kessler discussing their findings, [click here](#). Feedback on the paper from the academic community or industry professionals should be sent to [Marilyn Parris-Bell](#).

**WebEx:**

<https://pruretirement.webex.com/recording-service/sites/pruretirement/recording/play/96b3e524824446cf9ab9663ea90b25fc>

**Longevity & risk transfer: A booming market, By [Nick Reeve](#), February 2020 (IPE Magazine)**

<https://www.ipe.com/reports/longevity-and-risk-transfer-a-booming-market/10043510.article>

*Consultants expect high growth in UK pension risk transfers to continue after last year's record figures*

## Key points

- Consultants and insurers estimate £30bn-40bn worth of UK pension risk transfer deals a year for the next few years
- The North American market is also expected to see more activity in the near future
- As demand soars, insurers are becoming more innovative with their transactions

Last year marked a record year for the UK's pension risk transfer (PRT) market, with an estimated £50bn (€59bn) worth of transactions completed, including buy-ins, buyouts, and longevity swaps.

The total was almost double that of the previous year, according to [Mercer](#), which compiled the figures, and there were several innovative approaches to buy-ins and buyouts as demand from pension funds and competition among insurers reached new highs.

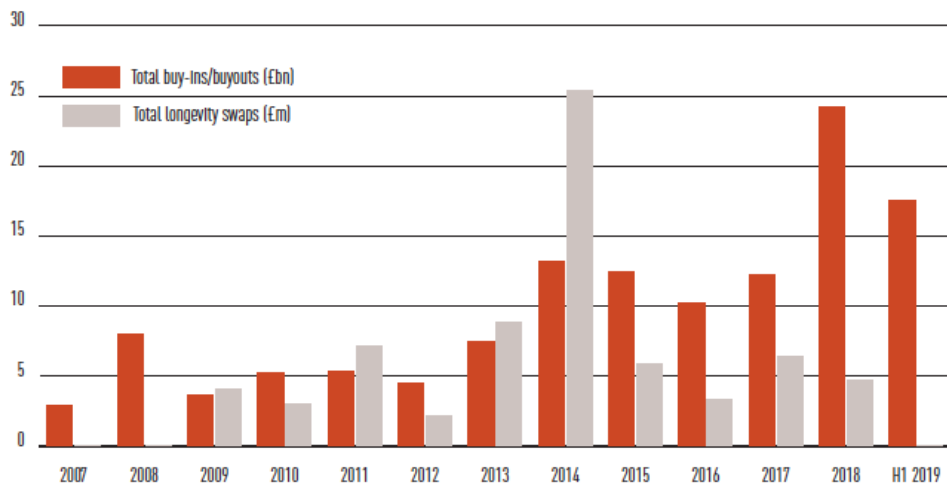
Communications company [Telent](#) conducted the biggest single deal of the year, agreeing a full buy-in of its GEC 1972 Pension Plan with Rothesay Life worth £4.7bn. The agreement will subsequently be converted into a buyout, with individual annuities issued to the scheme's approximately 39,000 members, making it the biggest buyout in the UK to date.

Publicised transactions ranged in size from 3i's £95m deal with Legal & General (L&G) to the £4.7bn Telent buy-in, although consultants say a number of smaller transactions were also completed, including some sub-£10m arrangements.

Some consultants have introduced streamlined processes for small schemes seeking a buy-in or buyout, simplifying the process for trustees and reducing the amount of time insurers have to spend analysing deals.

Larger schemes have been de-risking in tranches, selecting different insurers for various buy-ins as a way of obtaining the best price and diversifying insurance risk. [Marks & Spencer](#) and [National Grid](#) both took this approach in 2019.

## The development of the UK's pension risk transfer market



Source: Hymans Robertson

Other innovations included Dresdner Kleinwort's £1.2bn deal with Pension Insurance Corporation (PIC) that involved the conversion of a £300m hybrid defined benefit (DB)/defined contribution (DC) scheme. See the case study for more detail.

### Looking to 2020

The records set in 2019 have led some consultants to issue bold forecasts for what the next year – and decade – might bring.

[LCP](#) expects demand from schemes combined with healthy insurance company capacity to drive £30bn-40bn worth of deals a year from 2020. Mercer has estimated that the total for the next decade could be quadruple that of the previous decade's £135bn, which would require an average of more than £50bn a year.

This growth, Mercer says, will be fuelled by factors such as the ongoing maturing of the DB sector driving down prices as well as more reinsurers entering the UK market, adding capacity to pension insurers seeking to offload longevity risk.

"The next few years are looking bright for those schemes wishing to insure their members' retirement income," says David Ellis, partner at Mercer. "As the UK's defined benefit schemes mature, the length of insurance contracts reduces, making them more predictable and cheaper to buy.

Despite the increased demand, there is still capacity in the market for well-prepared schemes."

Jay Shah, head of origination at PIC, says there are several constraints on the pension risk transfer sector that insurers and schemes need to negotiate. These include the scarcity of illiquid assets suitable for backing pension liabilities at a scale that is attractive to a fast-growing insurance balance sheet. PIC's assets under management have grown from £16.6bn at the end of 2015 to £39.6bn as of 30 June 2019.

In addition, the capacity of the reinsurance market will play an important role in insurers' ability to take on risk, as it dictates whether or not they can offload longevity risk.

Shah also highlights capital-raising and talent-sourcing as issues that must be addressed if insurers are to continue to take back buy-ins and buyouts at the rate the industry expects. Both PIC and fellow specialist pension insurer Rothesay Life issued bonds last year to help fund new transactions, while Shah says PIC has made a number of hires in the past year to support its growth.

"There are some constraints to the market, but the market has proven resilient as we saw last year, and my expectation is that it will continue at the high level we saw last year into the future," he says.

David Blake, professor of finance and director of the Pensions Institute at Cass Business School in London, says that, while there is no shortage of insurance companies to back deals, one potential stumbling block could be a lack of trained lawyers to advise on transactions.

"Increasing standardisation should help with that," he adds.

#### **Netherlands case study: Chemours**

While most discussions of pension risk transfer centre on the UK or North America, the Netherlands has had some limited action in the insurance sector.

Last July, Dutch chemicals company Chemours announced that it had agreed to transfer €820m worth of assets and liabilities from its pension fund, Stichting Pensioenfonds Chemours, to insurance company Nationale-Nederlanden (NN). Effective from October 2019, NN has

taken on responsibility for paying the pensions of retired or deferred members.

In addition, these members were promised a one-off indexation payment on 1 January 2020 to compensate for past periods when the scheme was unable to pay inflation-linked uplifts. In the future, the roughly 3,000 members covered by the transaction will receive a guaranteed annual indexation payment.

Active members of the Chemours fund were transferred to the Centraal Beheer general pension fund (APF) at the start of 2020 where they will continue to accrue benefits.

Frans van Dorsten, chairman of Stichting Pensioenfonds Chemours, said in July that the scheme's board had "conducted extensive research" on how "future-proof" the pension fund was. Transferring members to an insurer or an APF was a direct action to improve the likelihood of members receiving full indexation, he said.

The Chemours transaction was unusual by Dutch standards. Normally, a buy-in or buyout will cover the entire population of a pension fund – the Chemours deal with NN was just the second time specific tranches of a scheme's membership had been transferred, according to a spokesperson for the insurer.

Tight regulation from regulator De Nederlandsche Bank makes it difficult to split transactions as members of the same pension scheme are not allowed to be treated differently.

For Chemours, this meant the scheme's board had to ensure that the deferred and retired members transferring to

NN were not going to be treated better or worse than the active members transferring to the Centraal Beheer APF.

The NN spokesperson told IPE: "This is a more complex way of calculating economically equivalent rights for different groups, including the level of guarantees relating to the accrued entitlements.

This is, in general, a circumstance to deal with, and will become easier to cope with when more experience is gained in this market..

"Now that more experience is available with partial buy-ins or buyouts, it is expected that more pension funds



will work towards transferring deferred and/or retired entitlements to insurance companies."

There is good news for smaller DB schemes too, according to LCP. It estimates that there will be about 10 transactions covering a total of £15bn in 2020, which would leave more capacity for deals in the £250m to £1bn range.

Iain Pearce, a consulting actuary at [Hymans Robertson](#), says the next big step for insurers and reinsurers will be to take on more non-pensioner business.

"The vast majority of bulk annuity business has been for pensioners who receive their benefits already," he says. "Most schemes take the view that those are cheaper to insure.... but we are seeing schemes generally becoming better funded and well hedged. They may have already insured a lot of their pensioners and are able to insure their non-pensioners as well, or a proportion."

Pearce says insurance companies are actively working on their propositions to write non-pensioner business, including investing in administration capabilities and reserving capital. This, in turn, is encouraging reinsurers to assess whether they can offer non-pensioner longevity reinsurance.

David Blake expects data science to be applied to more areas of the pension risk transfer market. He points to L&G's introduction of a blockchain-powered risk-transfer platform last year, designed to streamline the reinsurance aspect of the process.

Launching the service - dubbed 'estua-re' - in June 2019, Thomas Olunloyo, CEO of L&G Reinsurance said blockchain was "uniquely suited to the long-term nature of annuities business as it allows data and transactions to be signed, recorded and maintained in a permanent and secure nature over the lifetime of these contracts, which can span over 50 years".

Blake explains that this "will introduce greater transparency, since all parties will have access to the latest version of the ledger database of scheme member information".

The Cass professor also calls for the introduction of reinsurance 'sidecars' to allow investors such as sovereign wealth funds to share in the risks and returns of pension reinsurance. In addition, he favours longevity

bonds to "help kick-start a liquid market and set the risk-free term structure for mortality rates as it has done in the fixed-interest and index-linked bond markets".

PIC's head of origination structuring Uzma Nazir says insurers will have to get used to renegotiating longevity swaps when taking on DB schemes with legacy insurance contracts.

**"The next few years are looking bright for schemes wishing to insure their members' retirement income" - David Ellis**

Schemes with longevity hedges already in place have begun asking insurers such as PIC to take on the longevity swap and convert it into a buy-in. The Scottish Hydro-Electric Pension Scheme completed such a deal in November 2019, insuring £750m worth of liabilities, and Nazir says PIC has more in the pipeline.

"Normally when we do a buy-in, we get our own longevity swap," Nazir says. "These transactions come with a longevity swap that the trustees negotiated. On paper, it sounds ideal because that's what we're looking for anyway, [but] there are a lot more parties involved in the discussions, which adds to the complexity of things."

Pension schemes have different requirements to insurers regarding reporting and calculations, Nazir says. This means insurers may have to renegotiate the terms of the longevity swap when converting it to a buy-in.

"Trustees having a clause in a longevity swap contract to say that this might happen in the future, and how it might happen, is quite helpful," she says.

### **Outside the UK**

The UK is not the only market opening up to more risk transfer business. L&G completed its first transaction in Canada in April 2019, following the formation of a strategic partnership with Brookfield Annuity Company. The two companies supported a CAD200m (€138m) buy-in with an unnamed pension scheme, with L&G as the reinsurer.

The North American market is central to L&G's international pension risk transfer strategy, according to a company statement announcing the Canadian deal. As of April 2019 the group had written £2.5bn of international pension insurance deals.

[Prudential](#) Financial – the US insurance giant that has reinsured dozens of large UK transactions – affirmed its market leading position in its home market with a \$1.8bn (€1.6bn) buyout of the Lockheed Martin pension scheme.

#### **UK case study: Dresdner Kleinwort**

Transferring defined benefit (DB) liabilities and assets to an insurer is an accepted norm for the UK pension sector. In April 2019, however, one scheme managed to extend this to include its defined contribution (DC) fund.

The Dresdner Kleinwort Pension Plan – part of Commerzbank – agreed a £1.2bn (€1.4bn) full buy-in with Pension Insurance Corporation (PIC), split across three transactions.

The first was a relatively straightforward £900m buy-in of the plan's DB section. The second and third involved its £300m DC section and allowed members of the hybrid scheme the option to transfer their DC savings out or convert them into a DB equivalent, ready for transfer to PIC.

While this sounds straightforward on the surface, as Uzma Nazir, head of origination structuring at PIC, explains, there were several parts to the transaction that required PIC to be flexible.

When the Dresdner Kleinwort scheme came to market, the trustees brought in an independent financial adviser to help members decide whether to opt for a DB conversion – and go to PIC – or transfer to an alternative DC scheme. However, this process was not complete when PIC was chosen as the insurance provider. This posed a problem for PIC when deciding how to price the deal.

"When we talked about pricing, we had to take a view on how much of that DC section was actually going to come across to us," Nazir says. "That's important because the nature of the liabilities and the duration of pension scheme affects the assets that we would be looking to invest in. That, in turn, affects the underlying price that we would give to the scheme."

In addition, the DC section had a DB underpin, meaning that each member had an individual DC pot that would be topped up by the company if it underperformed the minimum DB level. This meant that PIC had to take the unusual step of calculating premiums on a per-member basis.

"We had to do individual premium calculations per member, compare it to how much DC pension that person had, and then look at whether there was extra money that we needed from the scheme or the company to come across for that member if they chose to stay with us," Nazir explains. "Usually we don't do individual calculations."

These complications meant PIC and the Dresdner Kleinwort scheme signed two agreements covering the DC section, one to cover those who had already made their decision about converting to DB, and another to cover those who had yet to decide. The latter became effective in mid-2019 once all members' decisions had been confirmed.

David Curtis, chairman of the plan's trustee board, said at the time: "This transaction required a high level of creative thinking by our advisers, LCP, in designing a structure combining the member choice programme with the insurance transaction."

He praised PIC's flexibility, "especially in relation to the insurance of the [DC] section, which is an unusual transaction and, I believe, a great result for the membership".

PIC publicised five large transactions in 2019, according to IPE research, insuring almost £6.8bn worth of liabilities. This included a £3.4bn buy-in deal with British American Tobacco, which at the time was the largest ever to include both pensioner and deferred members.

In Europe, Italian financial services group Generali announced plans to enter the de-risking market at the end of 2018, setting up a cross-border pension fund, although it has yet to complete any transactions.

Meanwhile, the Dutch pension insurance market has shown signs of growth in recent years - although it is still a fraction of the size of the UK's. Chemicals company Chemours became the latest to seek an insurance-based solution to its de-risking plan (see case study) last year, while the €581m pension fund for publishing company VNU is exploring options for an insurance buyout.

Nationale Nederlanden (NN), the insurance company behind the Chemours transaction, says that pension funds and sponsoring employers "are looking for future-proof solutions and a reduction of risk", according to a spokesperson. "We expect that the market for buy-ins and buyouts will increase in the coming years, with more and

more focus on carve-outs from specifically deferred and/or retired participants."

The consensus among industry experts is that the volume of pension risk transfer activity has undergone a step change in the past two years, with far more activity expected in the years ahead.

With this comes challenges for all actors to maintain the insurance and reinsurance sectors' capability to take on these volumes. Demand also looks set to bring about new technological developments and innovative approaches to further secure the future benefits of millions of DB scheme members.