

# Quarterly InsurTech Briefing Q4 2020

January 2021



Time	Summary	Phys. Exam.	Comment
11:33:52 AM			W/ME OUTPAT ARE ASSESSED IMMEDIATELY
11:33:57 AM			PRIOR TO START OF PROC
11:33:58 AM			STAFF AND MD INTRODUCED
11:33:59 AM			Correct Patient Position
11:33:59 AM			As Medication Containers are Labeled
11:34:00 AM			Labeling occurs when Wells or Suction are placed
11:34:00 AM			Containers
11:34:01 AM			Pre-procedure Teaching Performed
11:34:01 AM			Event Verbalized Understanding of Procedure
11:34:04 AM			Correct Pt. Identity
11:34:05 AM			Assess Consent For Risk and Complication
11:34:06 AM			Agreement on the Procedure to be Done
11:34:06 AM			Safety precautions based on patient history or
11:34:06 AM			medication use
11:34:12 AM			Availability of special equipment or requirements
11:34:21 AM			2% Lidocaine
11:34:25 AM			W/lost 10 ml
11:34:30 AM			Right Femoral Drain
11:34:30 AM			Paracatheter Puncture to 39FA
11:34:33 AM			31064 INTRO
11:34:39 AM			INPUT RFR
11:34:42 AM			Continuous A-Line Monitoring Using sterile protocol
11:34:48 AM			RFR Catheter in Place
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Foreword



# 2020 — The most important year for InsurTech to date

**Dr. Andrew Johnston**  
Global Head of Willis Re InsurTech,  
Quarterly Briefing Editor

What a year. 2020 has arguably been the most interesting 12 months of InsurTech-related activity since the term was coined. We have observed a year of testing digital hypotheses and jumping into the digital unknown. It has also been a very difficult year for many firms and individuals who are looking to get to that "next step." While InsurTech news is awash with billion-dollar initial public offerings (IPOs) and monumental raises, there are also those InsurTechs that should see surviving 2020 as a mark of success.

COVID-19 has created a situation few of us could have possibly imagined 12 months ago. From an operational perspective, no single firm or even industry initiative could have achieved what COVID-19 has forced many firms and individuals to do. The industry has shown that it can function digitally and has responded well to significant challenges.

Against the backdrop of the dramatic operational changes we are undergoing, our industry has been forced to face a truly unique series of challenges. As far as paid losses go, COVID-19 is the second largest paid loss event our industry has ever experienced, second only to Hurricane Katrina. The expected paid loss sum (to date) of COVID-19 is approximately US\$55 billion (see Figure 1). In addition to this monumental payout, (re)insurer investment returns have taken a significant hit as global markets have suffered from the global pandemic. It is estimated that the global lost investment revenue to our industry is in excess of US\$150 billion, bringing the combined net loss of paid losses (through things like business interruption) and poor-performing investment returns to over US\$200 billion.

Gross written premium in 2020 dropped in almost every single region of the globe (with the exception of China), in some cases as much as a 7% reduction in real GDP growth (see Figure 2). It is predicted that the industry globally has seen a reduction of overall

net income to the tune of 25.2% (relative to the prior year), with net underwriting income down and underwriting expenses up by 4.4% (see Table 1).

Not only has our industry been faced with direct costs and losses at historically unprecedented levels, but also the nature of the workplace has changed dramatically. Staff have, in many cases, been unable to service client needs in person and have had to adapt to working remotely. The impact this has had on operating efficiency (at a human level) has been varied and unpredictable. Distribution of product and services has also been disturbed as brokerages and agencies that travel and rely on in-person offerings have been impacted. Finally, and possibly most important, (re)insurers are now facing the real challenge associated with changing risks. We have historical pricing for auto/motor, we have historical pricing for life insurance, but do we have enough data, expertise and understanding to price for a surge in remote work? Or a surge in the gig economy? Will the travel industry ever recover? It is fair to say that, while our industry has dealt with pandemics and systemic losses in the past of significant magnitude, never before has our industry been presented with so many challenges and pressures on capital and operations all at once at such a large scale.

There is a silver lining, however. While our industry is facing these extreme issues, we also have an unprecedented level of access to technology and technologists who can help us solve these problems. Technology, including a number of InsurTechs, is already showing itself to be the path through this time of great uncertainty. We are already observing technology's role in remote working, remote operations and expense reduction. In the past this has not been an option for us, but perversely COVID-19 has created a situation that forces us to acknowledge the importance of technology.

As we have noted in prior briefings, InsurTechs do still need to survive the uncertainty of this unfamiliar operating (and social) environment in order to capitalize on this opportunity. While COVID-19 has created a platform for InsurTechs to shine, it has also created a temporary environment that has made access to funding difficult. COVID-19 has made the ability to run in-person proof of concepts difficult. And perhaps most important, COVID-19 has made the issue of vendor-client trust a very problematic hurdle to overcome.

Specifically relating to investment, 2020 began with a rude awakening for the InsurTech industry: We observed the lowest quarter of global InsurTech funding since the second quarter of 2018. In Q1 2020, US\$912 million was invested, approximately half of what had been invested the prior quarter. This bucked a trend of big raises throughout all of 2019. It was clear that (re)insurers

were preoccupied with COVID-19 given that the biggest reduction in activity came at the higher investment rounds where corporate venture capital firms typically invest.

The second quarter of 2020, however, bounced back with a very bullish three months of activity — most notably Lemonade's IPO (as the first public InsurTech unicorn) and the acquisition of Spinnaker and Gateway by InsurTechs Hippo and Buckle, respectively. We also saw mega-rounds in the shape of Pie Insurance and States Title — a clear sign that the market was comfortable to continue on its long-term journey of investing into technology firms.

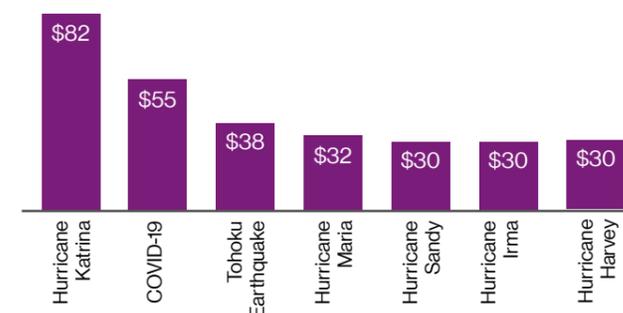
In the third quarter of 2020 any thoughts that the bubble might burst in 2020 were dashed. We observed an unprecedented level of global funding into InsurTech businesses — both in terms of total U.S. dollar amount and transaction volume. In Q3 2020, InsurTech companies globally raised US\$2.5 billion across 104 deals.

**Table 1: U.S. P&C insurers underwriting results 2020**

Measure	% change vs. 2019
Overall net income	-25.2
Net underwriting income	-86
Underwriting expenses	+4.4
Incurred losses and loss adjustment expenses	+2.3
Pre-tax operation income	-17.1

Source: Best's Special Report

**Figure 1: Largest estimated paid (re)insurance losses per event (US\$ billion)**



Source: Swiss Re Sigma Report; Statista.com

**Figure 2: Real GDP growth by region**



Source: Swiss Re Institute  
E = estimates; F = forecasts

This was predominantly driven by six megadeals (accounting for 70% of the total volume raised in the quarter).

### Q4 data highlights: InsurTech funding finishes 2020 at a record high

Global InsurTech investment continued to grow amid a tumultuous year. In 2020, total annual InsurTech funding reached an all-time high of US\$7.1 billion, inking 377 deals — the highest in any year to date. Compared with 2019, total funding increased by 12% while deal volume increased by 20%. In Q4 2020 specifically, InsurTechs raised US\$2.1 billion across 103 deals. Property & casualty (P&C) InsurTechs continued the pattern of raising more funding and deals than life & health (L&H) InsurTechs, attracting 67% of total funding and 73% of all deals in Q4 2020. L&H InsurTech saw a modest 1.6-percentage-point decrease in its share of deals with a pronounced 8.4-percentage-point decrease in total funding compared with the prior quarter, Q3 2020.

Later-stage companies — including Hippo, Unqork, Waterdrop, Oscar Health, Bind Benefits and Newfront Insurance — each received in excess of the US\$100-million-dollar “mega-round” funding mark, creating six mega-rounds for the quarter. These six rounds combined totaled US\$1.1 billion in funding. The share of early-stage deals declined to 47% compared with 57% in Q3 2020, a 10-percentage-point decrease. Mid-stage deals, however, saw a significant uptick with 29% of deals at the Series B or C stage. We reported an increasing dearth of relative investment activity in these rounds, particularly Series C, in our prior *Quarterly Briefing*. It will be interesting to see if Q4 2020’s revelatory results are the beginning of a new trend or a temporary bucking of the continual gap-widening process we have observed over the past few years.

In Q4 2020, we observed InsurTechs from 23 countries raise investor capital compared with 26 in the prior quarter. Of particular note, there has been modest funding activity in previously dormant geographies, including Hong Kong, Brazil and Switzerland.

### Home InsurTechs continued to attract investment

Direct-to-consumer home insurance players continue to raise funding, including Hippo, which raised the quarter’s largest round — a US\$350 million Series F — and Paris-based Luko, which also provides sensor-based D2C home insurance, which raised a sizable US\$60 million Series B. Hedvig, which raised US\$9 million Series A-II, has brought the D2C model to Sweden as well. In Q4 2020, a few InsurTechs targeting more segments of home insurance raised funding, including Openly, which focuses on helping independent agents quote coverage for high-end homeowners. Matic, a digital insurance agency focused on reducing the friction of home insurance in mortgage lending, raised a US\$24.5 million Series C.

### In the shadow of P&C InsurTechs, L&H start-ups are quietly maturing

While the vast majority of the first wave of InsurTech IPOs were P&C-focused, more L&H InsurTechs are readying themselves for public debuts. Midwest Holdings, which provides technology-enabled and services-oriented solutions to distributors and reinsurers of annuity and life insurance products in the U.S., closed its IPO in December 2020. Despite the fact that L&H InsurTechs represented just 27% of total deals this quarter, they represented 50% of later-stage mega-round deals in the past two quarters. In particular, Oscar Health, a digital health provider, raised a US\$140 million Series F and confidentially filed its S-1 in December 2020 for an expected public debut in 2021. Waterdrop, a China-based crowd-funded mutual aid insurance platform that received a US\$150 million follow-on investment from Tencent in consecutive quarters, is already working with investment banks to go public through an IPO. Bind Benefits, an administrator of self-funded and fully insured employer health care plans, raised a large US\$105 million Series B to expand its fully insured product in Florida into new U.S. markets. D2C life insurer Bestow also raised a large US\$70 million Series C as the pandemic reframes the value of coverage.

### Life and health-focused InsurTechs see geographic diversity

L&H InsurTech in 13 countries raised funding in Q4 2020, more than in any other quarter since we started recording. Australia, Switzerland, Israel and South Korea, which have historically had little activity in L&H InsurTech, received funding as InsurTech models gain application in new geographies. There was modest but notable funding activity on the African continent, including South Africa, Kenya and Nigeria. For example, the investment in Curacel, which offers fraud management for health care claims, was the first recorded Nigeria-based L&H deal. Others included South Africa-based life insurance provider OneSpark Insurance and Kenya-based Turaco, which offers simplified health insurance. Chile, which saw its first L&H InsurTech investment in Q3 2020, received its second investment this quarter when Betterfly, a Santiago-based InsurTech that increases life insurance coverage based on good habits, raised a US\$9 million Series A-II from QED Investors.

Another interesting feature of 2020, and perhaps less obvious, is the bifurcation of the Gartner Hype Cycle; it is becoming more obvious that viewing the evolution of InsurTech as one continuous line that peaks and troughs can cloud what is actually going on in reality. It is undoubtedly true that in the earlier days of InsurTech, a lot of commentators, industry participants and InsurTechs themselves were distracted with the underlying technology itself and not its application as it related to traditional business models (and, more important, success criteria). As a result, a lot of InsurTech businesses and initiatives came and went, creating a graveyard mound of technology behind them.

What we experienced was a concurrent overvaluation of latest-tech terminology. In reality, what impact has blockchain had on our industry? Has 3D printing revolutionized the way we work? Has artificial intelligence transformed the value chain of (re)insurance? In most cases, the impact has been isolated and parochial. Artificial intelligence is certainly playing a role in certain parts of the value chain, but only where it is supporting sound business mechanics. In certain cases, the overestimation of these terms and their nebulous application to procuring customers, underwriting risks, managing policies, lowering operating expenses and settling claims temporarily elevated certain InsurTechs to levels of great promise that have simply not materialized. In accordance with this promise, certain InsurTechs have been wildly overvalued by investors (both traditional and nontraditional). A very small number of these firms have even gone public through an IPO and are now scrambling to translate this promise into reality — by meeting traditional success criteria. In the reimagined Gartner Hype Cycle, these companies (both past and present) are best represented as being drivers of expectations in the peak labeled 1 in Figure 3.

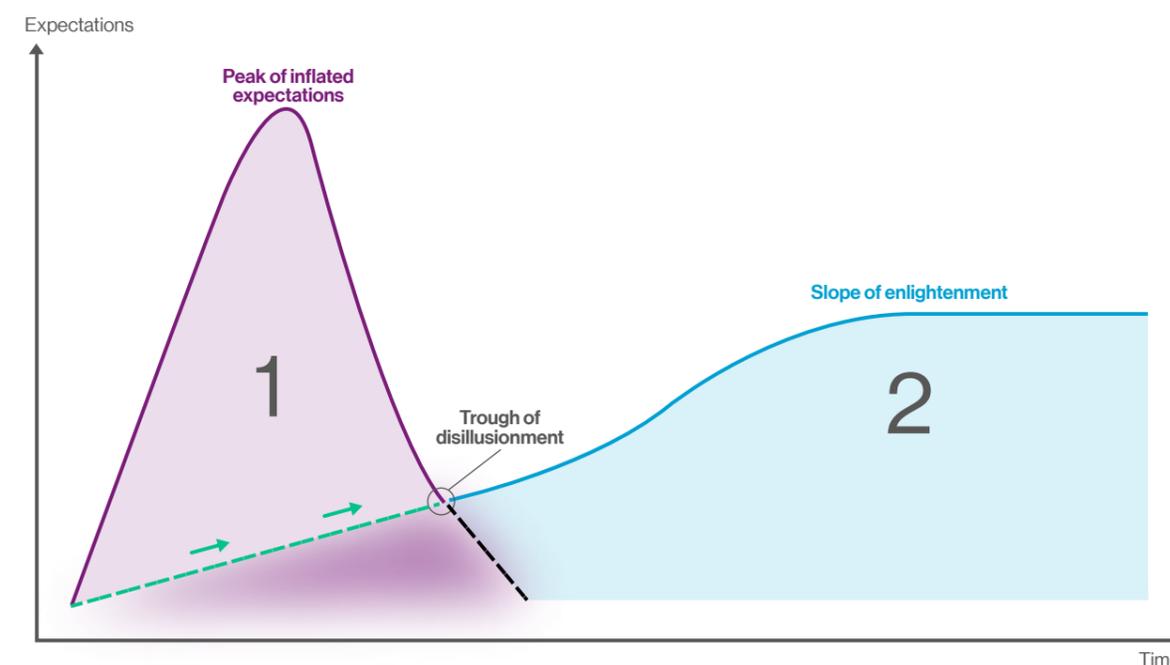
With a successful delivery of these promises, a handful of InsurTechs in the peak will translate into long-standing technology options for our industry, helping to lower expenses and drive business-ready innovations. The majority, that have not — or do not — deliver on these promises, however, will be the principal drivers of the downward slope into the “trough of disillusionment.” What is unlikely to happen is that any of these businesses will bounce back

or have ancillary phoenixes reborn in their embers to support the steady climb of “realistic expectations,” which is labeled 2 in Figure 3.

The good news is there is a very healthy evolution of activity located in the background (or shadow of peak 1). Over the past three to four years, a number of InsurTechs have done an excellent job of learning from the mistakes of others. They have acknowledged that the underlying technology is innovative and has great potential, but they have not lost sight of the end goal: delivering business outcomes for themselves and their partners. Furthermore, many of these firms have acquired (re)insurance DNA through smart hires and have made great strides in building partnerships with the existing landscape rather than assuming the industry is fundamentally flawed and therefore “ripe for disruption.” The hubris surrounding this narrative has, thankfully, started to dry up, as have the unhelpful quotes from Henry Ford and “Field of Dreams.”

We are already seeing a number of companies delivering on their business promises before being burdened with unsustainable valuations. A useful reminder to InsurTechs is to fall in love with the problem you are trying to solve for others, not the technology you have built for yourselves. Those InsurTechs that are driving the sloping upward gradient towards the “Slope of Enlightenment” will do extremely well in our industry. The valuation and expectations of their business will be in line with reality. As such, group 1 (those relying on overvalued terminology) will be relatively short-lived if they cannot morph into group 2, and those firmly already in group 2 will do well over the long term.

Figure 3: The Gartner Hype Cycle reimagined



## 2020: A year in review

Figure 4: Total number of deals across L&H and P&C (bars) vs. the total amount of funding (lines) per quarter

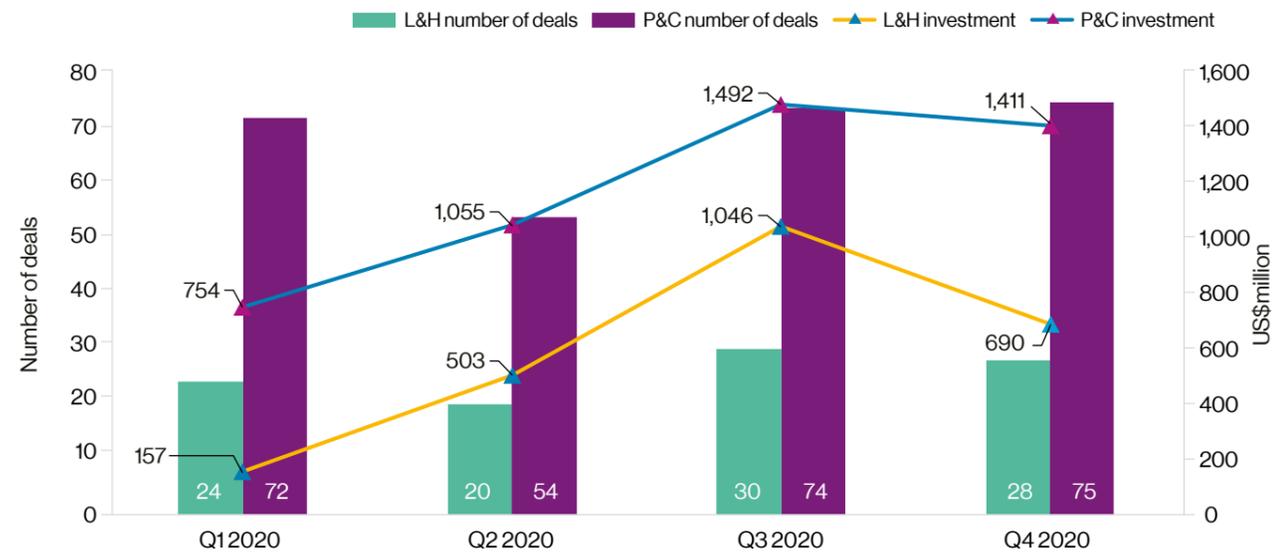
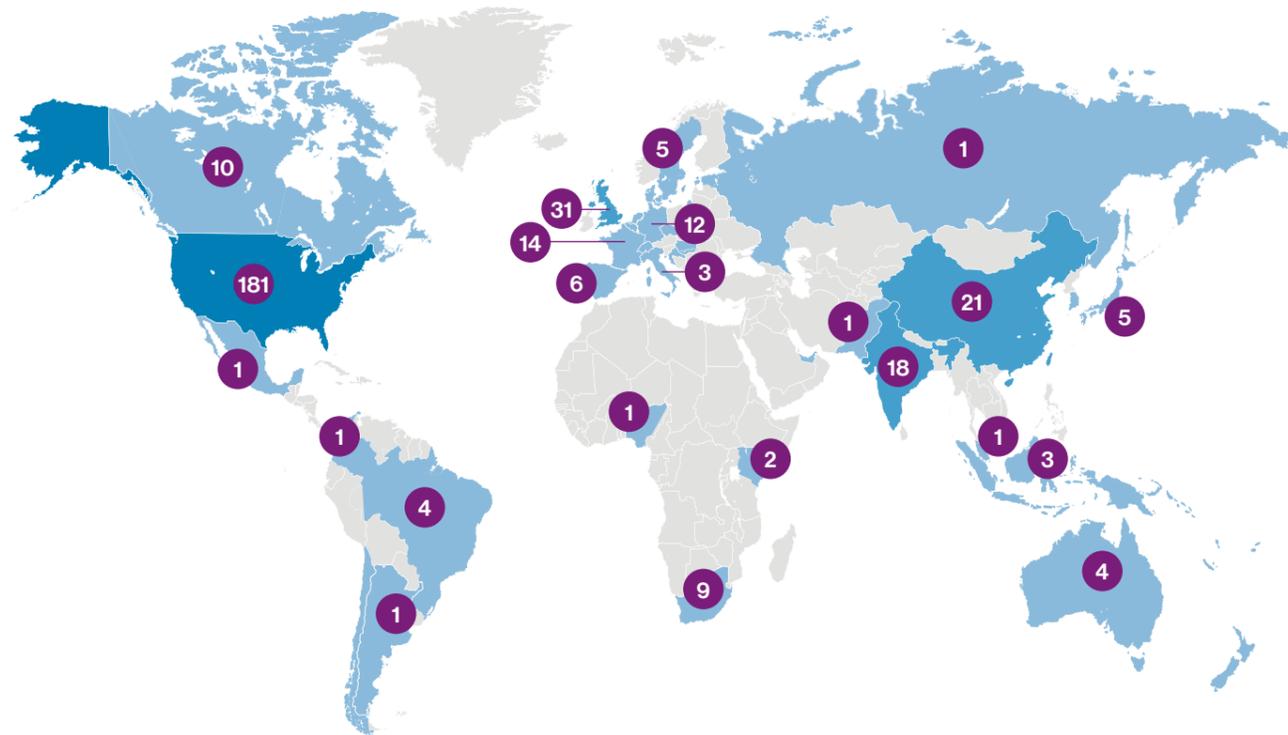


Figure 5: Number of deals in 2020 by geographic location



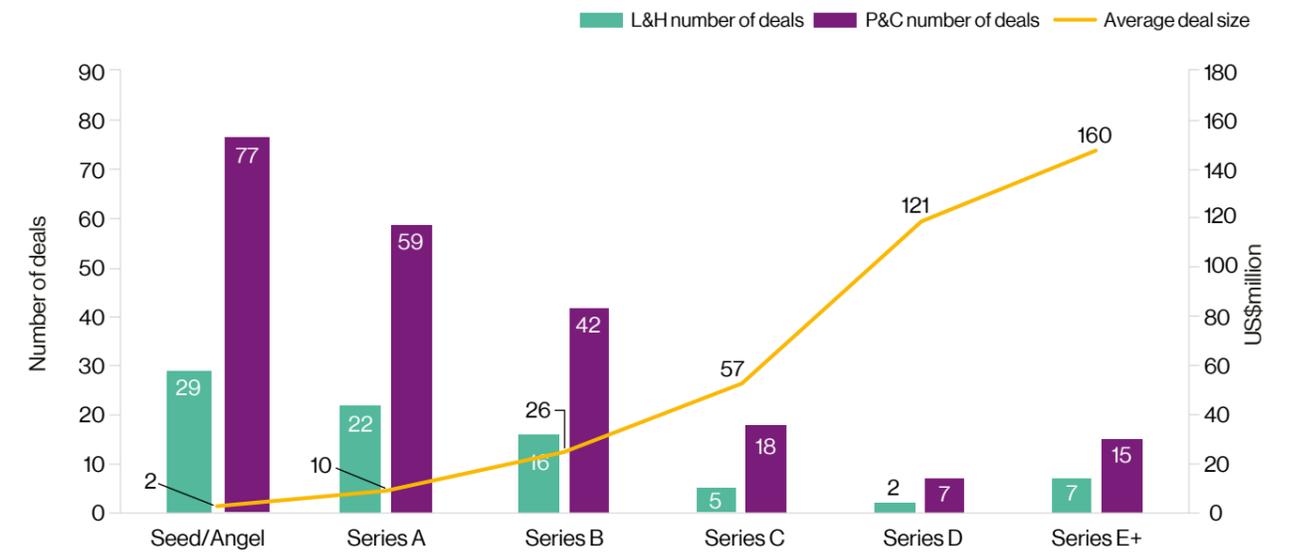
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The highest recorded number of participants in an investment round in 2020 was for Hippo's Q3 2020 US\$150 million Series E round. (Hippo also raised US\$350 million from one investor in Q4 2020 in a Series F round.)



Bright Health and Ki recorded the largest rounds of 2020, with both securing US\$500 million of investment. Both investments took place in Q3 2020 and in the U.S. and U.K. respectively.

Figure 6: Number of deals at each stage vs. the average deal size in 2020\*



\*The graph above omits "other" as a round type

In 2020, there were 744 unique named investors. Below are the top InsurTech investors of 2020 by the number of investments that the fund participated in.\*

### Top venture capital/private equity investors of 2020

#### BrokerTech Ventures

Agentero, Broker Buddha, CogniSure, ConsumerOptix, Goldfinch Health, Loss Run Pro, MakuSafe, ProNavigator, Talage, TrustLayer and Wunderlite

11 investments

#### Bessemer Venture Partners

Hibob, HyperScience (2 investments), Bright Health, Fabric Technologies and Spruce Holdings

6 investments

#### Munich Re Ventures

High Definition Vehicle Insurance, At-Bay (2 investments), Acko General Insurance, Next Insurance and Bought By Many

6 investments

#### Tiger Global Management

Oscar Health, HyperScience (2 investments), Bright Health and Qualia

5 investments

#### Y Combinator

Angle Health, Goodcover, Obie, Alude (2 investments), Vouch Insurance, GIGI, Virgil Insurance, GroMo, Linkage and Inspectify

11 investments

#### CommerzVentures

GetSafe, Hedvig, By Miles, Concurus, Bought By Many and omni:us

6 investments

#### American Family Ventures

One Concern, Turtlemint, Clearcover, Arturo and Branch

5 investments

#### MassMutual Ventures

Turtlemint, PolicyGenius, Qoala, Insurify and Ledger Investing

5 investments

#### Nationwide Ventures

Matic, Planck and Insurify

3 investments

#### IA Capital Group

Flyreel, Smartvid.io, Boost Insurance, Axio, Clearcover, Matic and The Demex Group

7 investments

#### Anthemis

kWh Analytics, Apollo Agriculture, OnSiteIQ, Matic, The Demex Group and Tremor Technologies

6 investments

#### EMC Insurance Group

Betterview and MakuSafe (2 investments)

3 investments

#### Liberty Mutual Strategic Ventures

Blueprint Title, Jupiter Intelligence and SingularCover

3 investments

#### MS&AD Ventures

Jupiter Intelligence, Bambi Dynamic and Socotra

3 investments

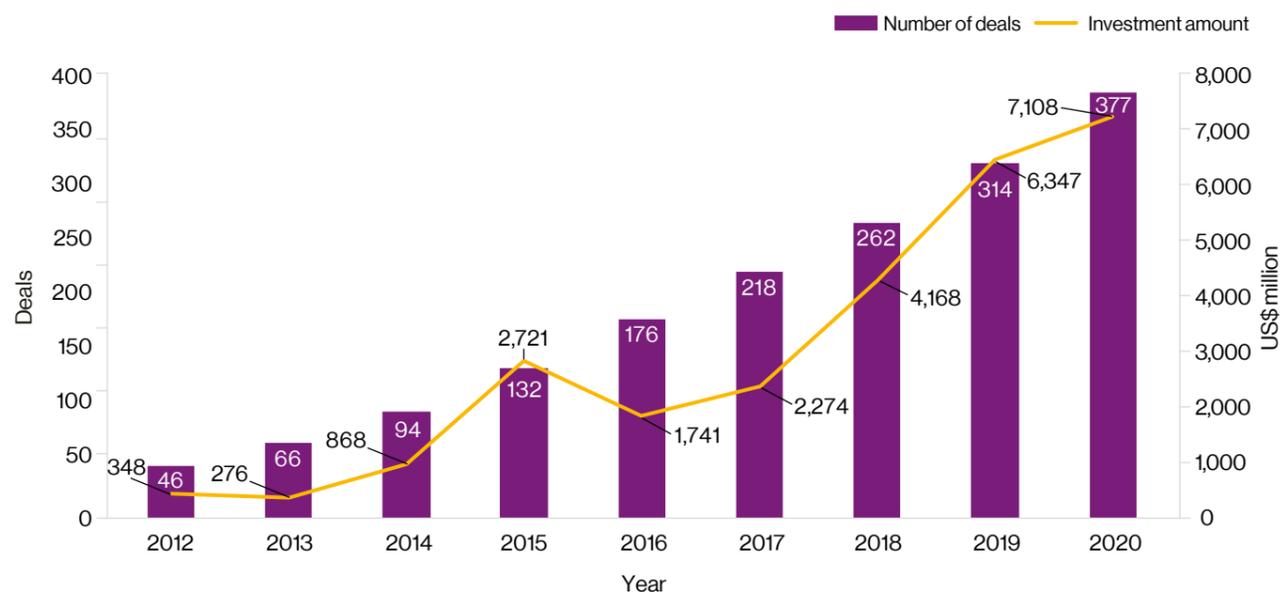
Overall, 2020 has been a fascinating year for InsurTech; anyone who doubted the value and role that technology might play in our industry from an operational perspective has been silenced. Similarly, anyone who doubted the market appetite for gig economy products and small business products has most likely been silenced also. Investment has polarized between numerous small checks and a handful of enormous raises, split between non-industry investors and industry investors, respectively. And to reiterate a consistent message from us throughout the year, many InsurTechs probably feel vindicated that our industry has been forced to realize the value of technology; their issue now, however, as small nascent businesses, is to survive months (possibly years) of market uncertainty.

From a global investment perspective, 2020 began slowly and has rebounded to record US\$7.1 billion total investment into InsurTech. As Figure 7 shows, both deal flow volume and total investment volume are at the highest levels recorded.

So what is in store for 2021? We anticipate there will be another cluster of IPOs from firms looking to make the most of the public market's appetite to invest in new technology firms. It would be remiss not to acknowledge 2020's IPOs with Lemonade, Duck Creek, Root and Midwest Holdings all choosing the path to float publicly. In some cases, InsurTechs have entered the market at a valuation many multiples in excess of their current book value. For example, Lemonade's entry valuation was more than 40 times its book value. Metromile, who is set to float publicly imminently is being priced at 120 times its own book value. With average customer acquisition costs at the US\$300 mark, and combined ratios that are far from flattering, it is fair to say that these valuations are, at least in part, being propped up by a degree of hype and public optimism. Consequently, it could be argued that, from a public investment perspective at least, the convergence of true valuation could temporarily accelerate the downward slope of peak 1 (per our prior comments on the Gartner Hype Cycle). If certain unfavorable drivers can be turned around, however, perhaps

“Many InsurTechs probably feel vindicated that our industry has been forced to realize the value of technology; their issue now, however, as small nascent businesses, is to survive months (possibly years) of market uncertainty.”

Figure 7 : Annual InsurTech funding trends including transaction volume and dollar amount, 2012 – 2020



Despite a difficult start to the year, in particular a challenging Q1, 2020 has recorded the highest number of deals and the largest amount of funding to date.

certain InsurTechs can morph into profitable businesses that do not damage the long-term integrity of technology in our industry.

From a pure public investment standpoint, it remains to be seen what the stoicism of public optimism will be for investing in InsurTech long term. Certain InsurTech firms have fared better than others in the time since they chose the option to go public. It is certainly not an option for all InsurTechs and should not be seen as the pinnacle of success. For example, the acquisition of Risk Genius by Bold Penguin should be seen as a win-win for both parties (especially given the most recent announcement). Similarly, securing big industry partnerships has also proved to be another successful option, for example, Ki (partnering with Brit). We also anticipate that the big tech firms will continue to see our industry as an opportunity to capitalize, whether through a distribution play, an investment opportunity, sales and marketing, or technological leveraging (most likely a combination of all). And finally referencing Figure 7, it is clear that there is a linear gradient in the number of deals being done year-on-year. Continuing on this same gradient, it is quite possible that we will see over 400 InsurTech deals done in 2021.

**This quarterly briefing's contents**

Our 2020 series of briefings set out to focus on the four major lines of business of insurance products sold; auto/motor, personal property/assets and commercial insurance formed the themes of our first three briefings. This *Quarterly InsurTech Briefing*, the last in the 2020 series, will focus on life, accident and health. We will be using the term life, accident and health, or LAH insurance, interchangeably when referring to this area of (re)insurance more generally. Where we specifically mean to highlight life insurance or health insurance, we will be specific. In this particular briefing, we will be featuring the following InsurTechs:

- Efficiency, a U.S.-based digital life insurance platform that allows new products to be digitized and made available for distribution rapidly



- Inclusivity Solutions, a South Africa-based company that addresses the protection gap in emerging markets through digital insurance solutions
- Decent Health, a U.S.-based company that offers affordable health insurance for groups underserved by the current health insurance carrier landscape
- dacadoo, a Switzerland-based comprehensive digital health engagement platform to motivate users to achieve and maintain healthy lifestyle habits
- Player's Health, a U.S.-based sports services organization that provides digital risk management services and reporting tools to sports organizations
- Abi Health, an Ireland-based medical micro-consultation service that gives people secure and compliant access to real doctors via chat apps
- Global IQX, a Canada-based provider of artificial intelligence-driven employee benefit technology

In this quarter's The Art of the Possible, we speak to Stephen Goldstein, Vice President, Client Experience Lead at RGAX, the investment arm of L&H reinsurer, RGA. Stephen discusses RGAX's investment mandate and the changes he has witnessed in the LAH InsurTech space.

In this quarter's Incumbent Corner section, we are delighted to feature two companies that are both doing extremely innovative things with technology. First, we talk with Adrian Gore, the founder of Discovery, about Discovery's Vitality program and his observations of the impact of COVID-19. Our second interview in this feature is with Santosh Gon, Aviva Singapore's chief information officer to hear his perspective on the impact of Aviva Singapore's innovation strategy, role of technology and their recent merger with Singlife.

This quarter's Thought Leadership comes from Willis Towers Watson's Ryan Jessell who discusses the movement to electronic enrollment and the new role of agents and brokers. Ryan is joined by John Jevin at Aetna to discuss Aetna's technological progress and the role of innovation.

In this quarter's Transaction Spotlight, we speak to Hong Kong-based InsurTech Coherent about its recent US\$14 million Series A raise. Coherent is a provider of digital platforms to insurers. Among other things, the raised capital will be used to expand the company's Asian presence and increase customer reach and scale of its business.

We will also be featuring in our Technology Spotlight section Willis Towers Watson's latest technology offering, Optimum SAA, a web-based platform for strategic asset allocation that helps users find their optimal asset allocations and achieve better risk management and investment return.

As ever, we thank you for your continued support.

## Introduction

## The global life, accident and health InsurTech world

This edition of the *Quarterly InsurTech Briefing* focuses on life, accident and health (LAH) insurance. Specifically, we will be assessing the various ways in which technology and InsurTech are attempting to revolutionize this major line of (re)insurance business, the extent to which they have been successful and the expectations for the future.

Broadly speaking, life insurance is insurance that provides protection against the death of an individual in the form of a payment to a beneficiary. Accident and health lines of insurance cover accidental death or personal injury by accident, sickness, ailment or bodily injury. These insurance lines sometimes pay for loss of income or for debt payment if they have been toggled with specific loan repayments. While these are three distinctive classes of life & health/non-property & casualty (P&C) insurance business (which can also extend into certain lines of P&C insurance from time to time, notably general liability), it is fair to say that we are seeing an ever-increasing overlap between the three and thus dealing with them all in this briefing under a unified banner.

Relative to P&C-related InsurTech, there is a clear lack of readily available information on the LAH InsurTech space, despite InsurTechs in LAH having raised more than US\$11.7 billion in funding over the past nine years, only 17% less than P&C over the same time period. As a US\$5 trillion global industry, the LAH space is certainly an attractive proposition for InsurTech firms that are looking to leverage their technology to support incumbent players or originate risk themselves. Similarly, this represents an enormous opportunity for investors who are still looking to InsurTech to make returns. We anticipate that in the past decade, over 300 InsurTech start-ups have been invested in, or partnered with incumbent LAH carriers.

### History of life, accident and health insurance

It is said that the first ever life insurance company, the Presbyterian Ministers Fund in Pennsylvania, was founded some 262 years ago in 1759. The fund sold life insurance policies to protestant evangelical ministers and their families to provide financial protection (and lodgings) in the event of a minister's untimely death.

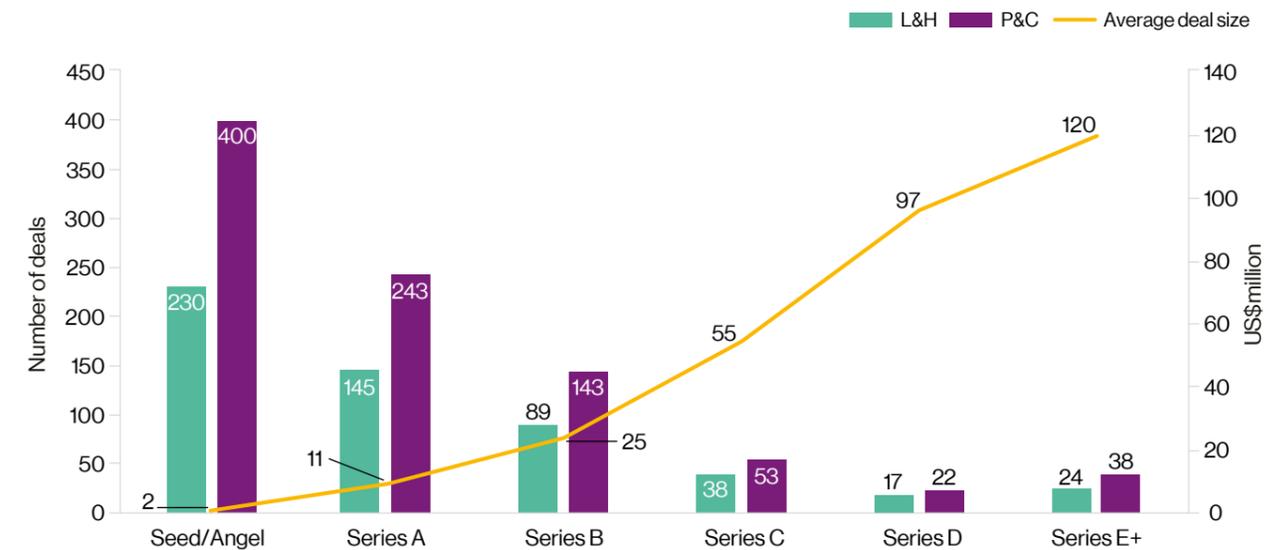
The fund expanded to provide protections for members of church congregations who themselves contributed to a monthly payment into a public fund.

Three years later, the U.K. created its own life insurance company called the Equitable Life Assurance Society in 1762. It is thought to be the oldest "true" mutual insurance company in the world still in existence. While table stakes today, the Equitable Life Assurance Society pioneered the use of local mortality rates against demographic groups to determine "fair" age-based premiums. The Equitable Life Assurance Society was also the first group to introduce whole life and fixed-term policies.

In part a reaction to the growth of industrial expansion, in 1850 the Franklin Health Assurance Company of Massachusetts offered the first accident and health insurance. The purpose of this insurance was to protect the policyholder against lost income due to accidents at work. The earliest coverages were for accidents caused in the steamboat and railway industries. This was soon expanded to cover employees in the mining and lumber industries. Perhaps the best-known insurer that still exists today to enter this market at this embryonic stage was the Travelers Insurance Co., which offered US\$1,000 death benefit and US\$5 a week disability benefit to those employees of employers that had Travelers' policies. By 1900, globally some 50 insurers had sold 500,000 accident policies.

Hospital and medical expense policies were introduced during the first half of the 20th century. During the 1920s, individual hospitals began offering services to individuals on a prepaid basis, eventually leading to the development of Blue Cross organizations in the 1930s. Currently, in most mature (re)insurance markets worldwide, there are (re)insurers that offer LAH products and services to employers and individuals.

Figure 8: Number of L&H and P&C InsurTech deals vs. the average deal size, 2012 – 2020\*



\*This graph does not include the round categorized as "other" in its calculations.

Over the course of the past few centuries, the LAH industry has grown up around a number of different demographic profiling pools from where data is derived to price risk and design products. In general, most countries that have a mature LAH market are experiencing aging populations and, in certain cases, lifestyle and environment choices that are combining together to raise the risk profiles of individuals when coupled with the broader demographic data sets that are available to LAH carriers. As a result, "lower risk" individuals are arguably being penalized for the overall trend of humans living longer and potentially making bad life choices.

In the life insurance market, this issue can largely be addressed with a reestablishment of pricing and triggers. The health and accident markets, however, are not so straightforward. While chronic diseases and related medical expenses (which are highly variable) seem to be on the rise, our industry has made valiant attempts to respond to these issues by making related policies and processes more comprehensive. Unfortunately, in certain cases, this has resulted in the manufacturing of very clunky products (with confusing wordings), painfully bureaucratic processes and a general lack of uniformity across the gamut. Unsurprisingly, this can lead to a confusion in the buying process, a possible pricing mismatch, and an insured's inability to understand policy wordings and structures (which can be hundreds of pages long).

We are now, however, at a crossroads. The role of technology and innovation can look to reverse some of these trends and bring the power of information back to carriers and policyholders alike. In

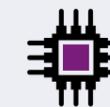
the past couple of years, we have seen a notable rise in InsurTech businesses that are doing a very nice job of bringing physicians, medical professionals and consultants into the decision-making and advisory process. Furthermore, a number of these businesses have shown a great understanding of issues such as certain disease manifestations and regional buying behaviors supported by innovative diagnostic tools, telemedicine, 24-hour chatbot support and, most important data.

In much the same way that we observed with auto/motor, personal and commercial insurance, data relating to individual behaviors (and workplace intelligence) can be read/derived through technology and can be shared; this gives (re)insurers a much better opportunity to understand underlying risks, consumer engagement and, ultimately, portfolio management. Furthermore, the industry is increasingly being shown that other third-party data sources that are potential indicators of risk, which have not been considered historically to be so, are worth factoring into modern pricing. A handful of InsurTechs are consistently demonstrating that certain data sets should be considered in contemporary pricing and are also creating API environments to make the extraction of new data sources possible — not just for themselves but also for incumbent originators of risk.

While the worlds of life and accident — and health more generally — are awash with technological innovations at the moment, we see the following three topics, when driven by technology, to be those holding the greatest potential to truly revolutionize LAH (re) insurance:



1. Wearables and biometric devices



2. Better data augmentation/standardization and intelligence on available life and health records



3. Molecular gene road maps/genomics



### 1. Wearables and biometric devices

As we observed in our first and second *Quarterly Briefings* of 2020, the use of devices and sensors in their application to our industry is not a new concept. We use telematics devices in our cars to monitor our driving and put internet of things devices in our houses to detect potential risks. The world of LAH insurance is undergoing the adoption of wearables and biometrics in the same revolutionary way.

(Re)insurers are doing a fantastic job of rewarding proactive insureds for the increased release of their data (for example, Discovery Insurance's Vitality program).

The types of data that biometric devices and wearables can derive are having a material impact on our industry. Even simple data streams, like the number of steps walked in a day, have been shown to be a great predictor of mortality risk. More sophisticated wearable devices can gather other lifestyle and health data, including average daily calories burned, sleep patterns and glucose levels that can be used for underwriting purposes.

While these are fantastic strides forward, with an abounding number of such devices and data sources, there is a fundamental issue that many (re)insurers face: How do they gather these data and democratize different data sources against underwriting standards? Enter the Insur Techs. Companies such as dacadoo, HealthIQ and Lapetus are building solutions to ingest various types of data derived from wearables that can then be consumed by underwriters directly or go through proprietary underwriting platforms.

It is true that the use of sensors to track individuals' core biometrics is also not new; athletes, for example, have had their vitals tracked in real time for over a decade. What is "new," however, is the ubiquitous use of wearables and other biometric devices in everyday life, whether it is tracking a walk or measuring a resting heartbeat. In certain cases, this has been made possible through education associated with the benefits of knowing the value of this information — but in most cases, this has been made feasible through the massively reduced cost of such devices. In fact, in most instances, the devices themselves are not specifically designed as health wearables but are other forms of devices that have the capability of acting as wearables, notably smartphones.

### The rise of wearable technology: Split of wearable technology used\*



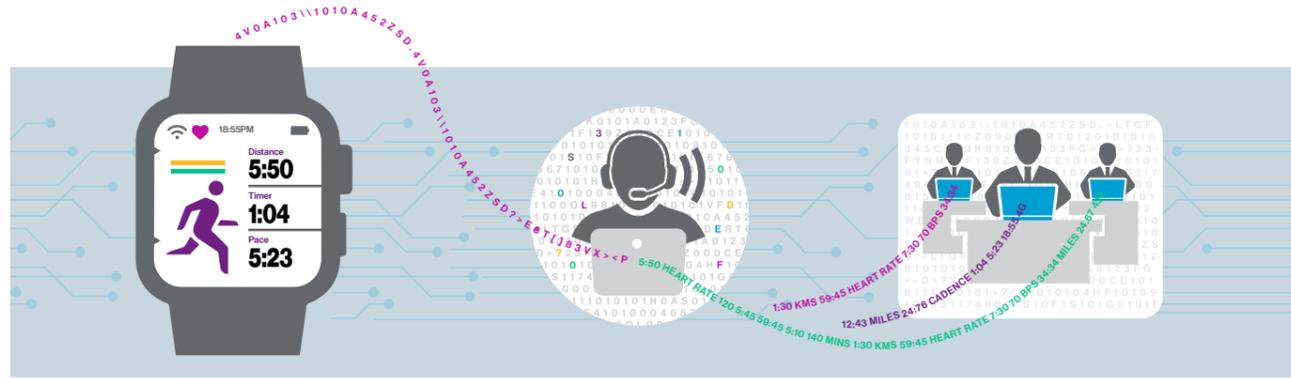
Source: The role of wearables in private medical insurance, Milliman report, March 2020  
 \*The percentages do not add up to 100%, as some respondents use more than one device to record activity.  
 \*\*This percentage refers to respondents who do not track any data at all.

### 2. Data intelligence on available life and health records

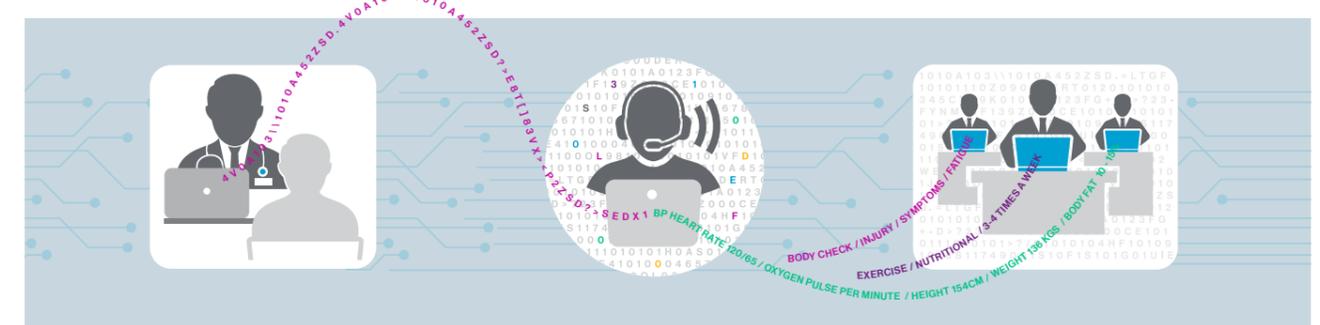
Hospitals across the world have invested enormously in tracking and keeping patient data that are now being used by (re)insurers to better understand how modern hospitals and modern diseases are affecting the life and health of communities of people — would-be insureds. Some of these data come directly from hospitals themselves, but in most cases, the data come via Electronic Health Records (EHRs) held by third parties — an electronic version of a patient's medical history that is maintained by the provider over time and may include all of the key administrative clinical data relevant to that person's care under

a particular provider, including demographics, progress notes, problems and medications.

The issue around data capture, augmentation and delivery that we previously mentioned in the wearables section is true here also. The data from EHRs are often variable. Again, enter the Insur Techs. Firms such as Qrvey have done an excellent job of working with EHR providers to create an analytics solution to allow (re)insurers the ability to best understand the underlying data that are being presented relative to their own underwriting guidelines and customer engagement. Similarly, Insur Techs such as Human API are allowing (re)insurers the ability to build new services, products and solutions by capturing and augmenting EHR data from a variety of hospitals and other health providers.



Examples of wearable devices/InsurTech companies:



Examples of life and health record data intelligence tech/InsurTech companies:



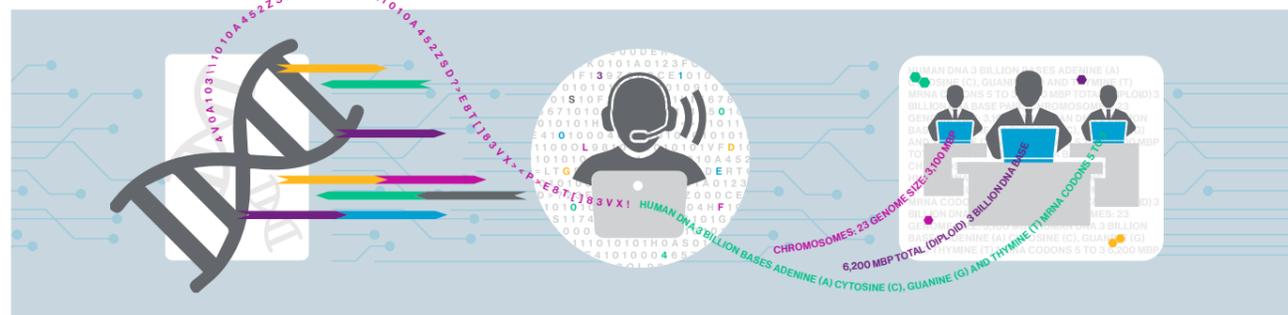
### 3. Molecular gene road maps/genomics

And finally, the third major area where LAH-related InsurTechs can make a clear impact is in the world of genomics — the study of all of a person's genes (the genome), including interactions of those genes with each other and with the person's environment. Unlike EHRs and biometric devices, genomics offers a brand new way of looking at the health and mortality rate of an individual at a molecular level. Genetic data can tell insurers more about mortality probabilities unmeasured by the traditional underwriting process, such as disease susceptibility and other genetic predispositions.

The study of genomics allows life & health insurers to understand a very subtle but important area between demographic and behavioral data. Genomics can be used as a road map to help

understand what is statistically likely (or unlikely) to happen to a person as he or she ages or is exposed to certain environments.

Where InsurTechs in this area have, and are set to have, the biggest impact is not only performing genomic reviews themselves but also helping (re)insurers understand the impacts that certain tendencies or traits might have on specific risk profiles. There is an inherent underlying issue of moral hazard as it relates to certain statistical biases, but where genomics is certainly helping all parties understand how to price new (or better understood) conditions is the extent to which genomic data can add useful context to all parties. Far more importantly, genomics can help educate around better behaviors that can be directly involved in risk reduction and in some cases mitigation. A number of InsurTechs are adding significant value to (re)insurers already in this space; for example, FOXO BioScience (FKA Yousurance) uses genomics to quantify insured's health road map data to be used in the underwriting process.



Examples of molecular gene road maps/genomics InsurTech companies:



The impact of these three areas of innovation as it relates to technology and InsurTech cannot be overstated. The ability to extract real-time data, augment it, and make it intelligible and actionable holds the key to unlocking unlimited potential for those that ultimately underwrite the risks. As these data relate to behavior, underlying genes and communities at scale, InsurTechs can support (re)insurers in this space in creating products and solutions for members of our society that are truly reflective of reality. It can also assist in reducing claims through improved behavior and risk mitigating activity.

It would be remiss not to acknowledge that the vast majority of LAH InsurTechs today do not necessarily play in these three areas.

Many LAH InsurTechs that are making a contemporaneously successful impact in our industry are focusing their attention on the distribution of existing products and direct access to tele-advisory services — two huge areas of importance in our industry but not necessarily innovative at the core of the risk itself. In the U.S. in particular, we have seen a rise in digital originators of LAH risks, aggregators, lead generators and advisory firms in the past couple of years — in some cases attracting sizeable sums of investment. It will be interesting to observe who from this cohort of InsurTechs can make the most of the three core drivers of innovation (as we see them) and deliver these solutions to their clients. In some cases, we predict that they may even beat some incumbents in this race.

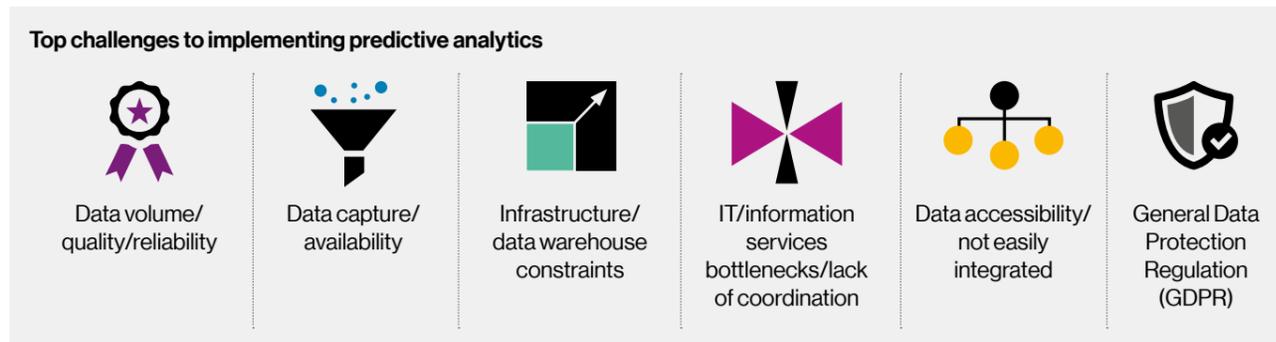
### The incumbent landscape and its use of technology

Prior to putting together this report, Willis Towers Watson conducted the 2020 Life Insurance Predictive Analytics Survey of 40 global LAH (re)insurers. The survey found that 80% of those firms currently using predictive analytics have experienced a positive business impact in at least one area — with the largest impacts being on generating sales and revenue as opposed to reducing expenses.

Group risk and individual risk are the areas with the greatest current use of predictive analytics at over 30%, with a similar percentage expecting to be doing so within the next two years. The most important driver for the use of predictive analytics is in-force management, followed by improving the customer experience and then drivers around competitive pressures, growth and technology.

The report also found that life insurers are attempting to use alternative data sources such as electronic health records, biometrics and genomics to boost underwriting efficiency and accuracy where they can. The traditional underwriting process to buy life insurance is often painful for customers and costly for insurers.

It would appear, therefore, that our own predictions of where the greatest impacts for technology in the LAH insurance space are already being requested by a number of incumbents. InsurTechs that are positioning themselves to capitalize in any of these three core areas will find that the incumbent audience in our industry will likely meet them with open arms. (Re)insurers are already seeing the huge benefits that these particular innovations, supported by appropriate technology, can make. If we look at the snapshot of survey results below, we can see which challenges stand in the way of incumbents making the most of predictive analytics (for underwriting) in the world of LAH. InsurTechs that wish to work with incumbents would do well to bear these types of challenges in mind as they wish to emphasize fully the ways in which their solutions can make the maximum impact for a mutual success story.



### And finally, the impact of COVID-19 on LAH InsurTech

It would be impossible to talk about LAH (re)insurance in any guise in the context of 2020 without mentioning COVID-19. From an overall sales perspective, demand for traditional LAH products has dropped, but there has been a rise in demand for protection products. How resilient "traditional" underwriting remains if COVID-19 (and its associated effects) persists is yet to be seen, but again, this offers InsurTechs an enormous opportunity to support the incumbent landscape as we try to make sense of nontraditional moving vectors as an industry. Similarly, the extent to which COVID-19 affects predictive analytics and models that have been trained in a non-COVID-19 world is yet to be seen. As a firm,

we actually expect this pandemic to accelerate the use of analytics implementation and subsequent digitalization and automation of all parts of (re)insurers' businesses.

For InsurTechs themselves, 2020 has ushered in a huge demand for the use of telemedical services — and InsurTechs have delivered. In Q2 of 2020, we observed funding into life & health (L&H) start-ups grow to 32%, up 17 percentage points from Q1 amid the rush to get life insurance coverage and the movement toward telehealth brought on by COVID-19. Bestow, for example, a Texas-based direct life insurance provider raised a US\$50 million Series B to enable customers to apply for coverage online and eliminate the need for medical exams and blood tests.

## Some noteworthy LAH InsurTech partnerships, deals and funding from Q4 2020:

### 1. Singlife has acquired a 75% stake in Aviva Singapore.

The deal, which is expected to close by January 2021, will be one of the largest insurance deals ever recorded in Singapore. Aviva plc will retain a 25% equity stake in the new combined entity, which will be known as Aviva Singlife.

### 2. Midwest Holding Inc. closes its IPO at US\$70 per share.

Midwest Holding is a financial services company focused on providing technology-enabled and services-oriented solutions to distributors and reinsurers of annuity and life insurance products in the U.S.

Midwest Holding Inc. closed its underwritten public offering of 1 million shares of its voting common stock at a price to the public of US\$70 per share. The aggregate net proceeds to Midwest Holding are expected to be approximately US\$65.1 million, after deducting underwriting discounts and commissions.

Midwest intends to use the net proceeds of the offering to support the growth of its insurance subsidiary, American Life & Security Corp., including possible product expansion and for general corporate purposes.

### 3. Chubb and Nubank have partnered to launch a digital life insurance.

The offering, called Nubank Vida, is underwritten by Chubb and will be made available to Nubank's 30 million customers across Brazil. Basic coverage includes natural or accidental death and funeral assistance, as well as living benefits covering hospitalization for accident, disability for accident and funeral assistance for family members.

### 4. AIA Group has announced a strategic partnership with ZA Tech.

The partnership with ZA Tech, a technology venture founded by ZhongAn, will see AIA leveraging ZA Tech's expertise to develop and distribute scenario-based digital products with greater speed. The initial focus will be on Malaysia, and they plan to extend the partnership across other AIA markets. It will include digital life & health insurance.

### 5. MassMutual's LifeScore Labs and Antara Health have partnered to explore risk scoring in health care

LifeScore Labs, a subsidiary of MassMutual, and health care start-up Antara Health have collaborated to explore how risk scoring can affect health outcomes in emerging markets.

### 6. Bestow launches Protect API.

Designed with an insurance-as-a-service approach, Bestow's Protect API enables companies to directly offer life insurance coverage within their apps or sites, with complete control of the customer experience. The first partner to integrate the new Protect API into its platform is Tomorrow, a start-up that combines legal, financial and insurance services in one easy-to-use app.

### 7. Prudential Financial has launched a US\$300 million venture fund.

PruVen Capital, a global, multistage venture firm backed by Prudential Financial, as the sole limited partner, has launched its first fund with US\$300 million in capital to invest in emerging technology start-ups in North America, Europe, Japan, Singapore and Australia. PruVen Capital will invest in start-ups in the InsurTech, fintech, healthtech, real estate tech and enterprise information technology verticals.

### 8. PartnerRe has partnered with InsurTech Ladder.

MGA Ladder utilizes machine learning to instantly underwrite life insurance online. Ladder's policies are currently issued by Fidelity Security Life Insurance Company and Allianz Life Insurance Company of New York. The partnership with PartnerRe enables Ladder to expand Ladder's reinsurer relations.

### 9. Majesco has acquired ClaimVantage.

Majesco, a global provider of cloud insurance platform software, announced that it has acquired ClaimVantage, a global provider of enterprise claims software as well as absence and accommodation management for the LAH market segment.

### 10. Ethos Life launches final expense / guaranteed issue whole life.

The new product from Ethos Life will be offered by AAA and is available to individuals between the ages of 65-85, with coverage that ranges from US\$10,000 to US\$25,000.

### 11. Lemonade launches term life insurance.

Lemonade's new term life insurance will be issued by North American Company, with policies starting at US\$9 per month. Available term options are 10 and 20 years with up to US\$1 million in coverage.

A snapshot of some global InsurTechs operating in the LAH space:



An aerial photograph of an outdoor paved area. At the top, there is a drainage strip with several rectangular openings. Below it is a large area of grey, irregularly shaped paving stones. In the bottom right corner, there is a large, curved planter filled with dense green foliage. A man in a blue shirt and a woman in a black top are running on the paving stones. Several white rectangular boxes are overlaid on the image, highlighting specific areas: one on the drainage strip, one on the paving stones, and one on the green wall planter.

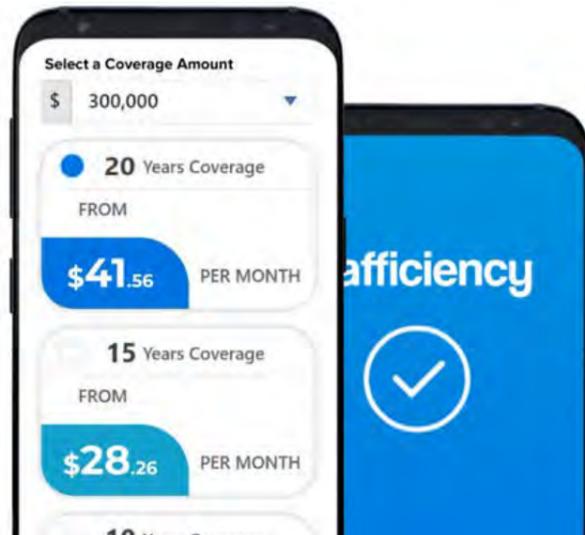
## Case Studies



Afficiency has developed a digital life insurance platform that allows new products to be digitized and made available for distribution rapidly, completely via API. Headquartered in New York, the company has been partnering with insurance carriers and reinsurers since 2018 to bring new innovative products to market. All of Afficiency's life insurance products are digitally underwritten and issued to applicants within seconds.

## Life insurance via API

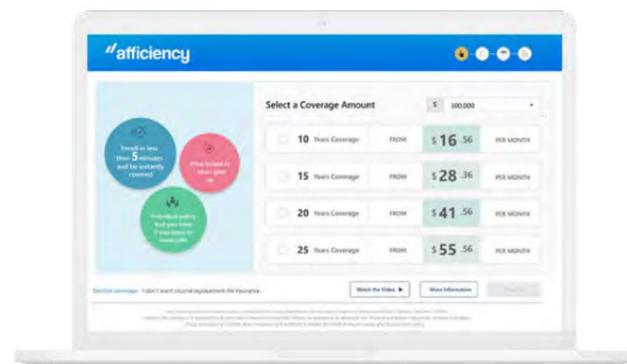
Afficiency is built to power existing online consumer-facing storefronts via API. The Afficiency platform provides quoting, underwriting, payments and an issued policy in minutes. No individual is ever sent to an offline or manual underwriting process.



## Expanded options for distributors

Before Afficiency, many of its distribution partners were unable or unwilling to get into the complexities of life insurance. Leveraging Afficiency's APIs, distributors can issue life insurance products in their own user experience (UX) — even in preexisting sites or applications. This allows for a consistent customer experience throughout the distributor's ecosystem.

Because Afficiency's products are easy to integrate, and easy to apply for, they work well for a diverse range of distributors. Afficiency's partners include online property & casualty agencies, direct-to-consumer life & health agencies, mortgage providers, banks, traditional distributors and robo-advisors, to name a few.



## Know when to make an offer: ApproveAPI

Afficiency has leveraged millions of data points, including historical underwriting data, to build its proprietary ApproveAPI score. ApproveAPI allows distributors to decide when to present life insurance as an option to customers. This score uses machine learning for continuous enhancement over time. This significantly improves distributor ROI and the customer experience by providing options that will create a positive experience.

Leveraging ApproveAPI allows distributors to significantly increase their pull through, thus decreasing cost of acquisition and increasing lifetime value. ApproveAPI is available to all Afficiency distribution partners.

"Afficiency was founded with the goal of providing life insurance to everyone on the platforms they already trust. We've launched with great success and anticipate announcing many new partnerships in 2021."

Mark Scafaro, CEO, Afficiency



Founded in 2015 in South Africa, Inclusivity Solutions designs, builds, operates and innovates digital insurance solutions that enable financial inclusion and address the protection gap in emerging markets, specifically focusing on hospital cash products and medical association gap protections. Inclusivity Solutions partners with mobile operators, banks, insurance companies and other financial institutions to deliver insurance cover through mobile phones and other digital mediums. The company's solutions currently have more than 750,000 end users and sign up an average of 20,000 new customers a month.

## Inclusivity Solutions' value proposition

Inclusivity Solutions delivers its partners:

- A cloud-based digital insurance platform that facilitates the entire insurance value chain
- Deep specialist insurance services that serve to ensure a best-fit product for its partners' businesses and their customers

At the core of Inclusivity Solutions' offering is a cloud-based platform called ASPin that can extend to complement or substitute the digital capabilities of the insurance value chain for insurers and financial service providers. Hosted in the cloud, the ASPin software-as-a-service platform plugs directly into the partners' core systems via APIs. ASPin enables emerging market insurers the opportunity to launch, distribute and monetize next generation insurance products quickly, without the complexity of building and operating them themselves.

Unique to Inclusivity Solutions is the deep expertise that its team brings in applying leading digital insurance research and design practices to create best-fit products for low-to-middle income customers (premiums are typically between US\$1 and US\$5

per month) that are both customer- and market-centric while simultaneously addressing its partners' business imperatives. By overlaying their optional digital insurance actuarial, analytics and customer experience specialist services, Inclusivity Solutions' partners have the flexibility to tailor the insurance services to address their capability gaps.

## Inclusivity Solutions' impact

Inclusivity Solutions currently has live products in four markets:

- Riziki Cover, Kenya: A hospital cash product offered through Equitel and Equity Bank
- Indemnité Hospitalisation, Côte d'Ivoire: A hospital cash and life product offered through Orange Money
- Ingoboka Cash, Rwanda: A hospital cash product offered through Airtel Rwanda
- Thandizo, Zambia: A MSME property damage, income protection and life product offered through First National Bank and Hollard Insurance

"Whilst the humanitarian and economic devastation of the COVID-19 pandemic is undeniable, it is our firm belief at Inclusivity Solutions that if we focus on designing products that meet the actual risks that matter, and work with distribution partners that have the foresight to include insurance into their financial services portfolio, we can rapidly extend the safety net of insurance to the majority of underserved consumers in emerging markets."

Jeremy Leach, Founder and CEO, Inclusivity Solutions





Launched in 2017, Decent aims to offer affordable health insurance for groups underserved by the current health insurance carrier landscape. Decent's operations are built on a best-in-class software-as-a-service infrastructure that enables concierge service features, including having members assigned to a specific customer service representative, live chat customer support and 24-hour small business quote returns. Currently, Decent's affordable small business health insurance plans are available throughout Texas (initially to companies in or serving the technology industry), often 40% cheaper than comparable options.

### Decent's overview

- Decent helps small businesses work together to achieve "self-insurance." The company has partnered with the Texas Freelance Association to offer small business owners access to the type of self-insured plans that have previously only been available to some of the largest companies in America.
- Decent partners with direct primary care providers allowing members to get free and easy-to-access primary care. This is important as there has been a significant rise over the past 30 years in U.S. consumer use of emergency rooms and urgent care centers for non-emergencies that could be taken care of by a primary care physician. These are expensive points of care that bring additional costs to the consumer and the insurance carrier and eventually a rise in premiums. Decent addresses this by providing unlimited free primary care, and its members are responding with vastly improved utilization trends.
- On average, today US\$0.40 of every health care dollar goes toward administrative fees. Decent is building an efficient system to lower these unnecessary "paperwork" fees and reduce costs for its policyholders.

### What Decent offers

All of Decent's plans are Affordable Care Act (ACA)-compliant and built around convenient, free primary care. To date, Decent has an overall Net Promoter Score of 77 from members, more than five times the health insurance industry average. Members may select a direct primary care physician, which allows them to receive unlimited and free access to same-day appointments with a local doctor, or they may choose a virtual direct primary care doctor. The virtual direct primary care doctor is available by phone, tablet or computer. All of Decent's virtual health plans are offered at a discounted rate providing more affordability to small businesses. The "virtual health plan" is the first of its kind in the U.S., offering extra savings for those who prefer connecting to their dedicated primary care doctor via a smartphone or computer.

### Funding

In August 2020, Decent raised US\$10 million in Series A funding led by QED Investors. In total, Decent has raised more than US\$18 million since it launched two years ago.



**Affordable options**  
ACA-compliant plans up to 40% below market rate



**Patient health first**  
Get unlimited free primary care visits



**Available for everyone**  
No medical underwriting or screening to block access



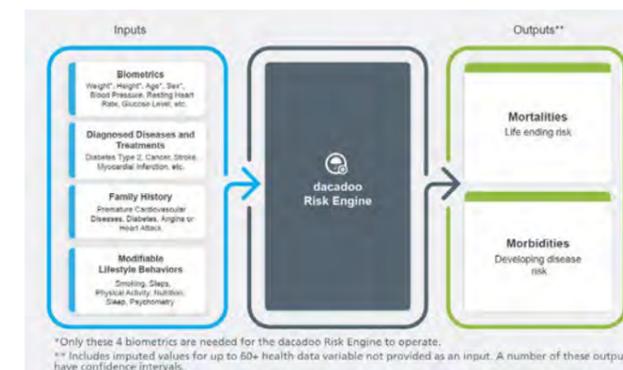
dacadoo develops and operates a comprehensive Digital Health Engagement Platform to motivate users to achieve and maintain healthy lifestyle habits. Founded in 2010, dacadoo is based in Zurich, Switzerland, with client services offices in the U.S., Australia and Japan.

### About dacadoo

The platform combines motivational techniques from behavioral science with functions from digital, automated, AI-based health coaching and real-time health scoring as well as online gaming and social networking to activate and engage its users. The Digital Health Engagement Platform can integrate into third-party wearables and tracking apps. dacadoo has licensed its platform to over 35 of the top 100 life & health (L&H) insurers and corporate wellness organizations globally. Through dacadoo's Connect, Score, Engage offering, the company supports L&H companies to motivate their clients to lead healthier lifestyles through its software-as-a-service-based platform. Available in over 16 languages, dacadoo's technology is provided as a fully branded, white label solution or it can be integrated into customers' products through its API.

### The dacadoo Risk Engine

dacadoo also provides customers access to its Risk Engine, which estimates relative risk on mortality and morbidity in real time and enables accelerated underwriting for insurers.



dacadoo's Risk Engine pushes out a Health Score, which represents overall holistic health numerically between 0 and 1,000. The score is based on more than 300 million person years of data from scientific research and supports automation in underwriting in seconds. The Risk Engine processes more than 80 data points, grouped into four categories: biometrics, diagnosed diseases, family history and modifiable lifestyle behaviors. With as few as four data points — height, weight, age and sex — the Risk Engine produces full estimation sets with over 60 values for each person. These estimated values include the risk of a person dying from several diseases (mortalities) and getting sick from several diseases (morbidities), as well as missing data values. The score increases or decreases in real time, depending on how a user's physical health, emotional wellbeing and lifestyle behaviors change over time.

In the future, insurers will be able to use the Risk Engine for dynamic data gathering in the insurance application processes. Insurers will be able to reduce or skip interview questions based on the client's previously provided answers by dynamically asking the next most relevant questions first and ending the interview as soon as a desired threshold is reached.



"The life & health (L&H) industry is getting serious about their digital transformation. This means that the L&H industry will be moving from a payer-only partner to an insurance-as-a-service provider. The industry and the key stakeholders have concluded that in a stakeholder-based economy, it is mission critical for the insurance industry to really show #WeCare towards clients and their health. COVID has made this an even more emerging need."

Peter Ohnemus, President and CEO, dacadoo

# Case Studies: Player's Health



Player's Health is a sports services organization that provides digital risk management services and reporting tools to sports organizations to comply with the needs of the changing athletic environment and related responsibilities. Founded in 2015 in Minneapolis and based on team athletes' personal experiences, the company works toward creating the safest environment for athletes, including tools to manage health, injury, abuse and risk.

Player's Health partners with some of the largest sports organizations and national governing bodies in the U.S. to ensure the company reaches as many athletes as possible.

## About Player's Health

Player's Health provides cutting-edge software solutions that present sports organizations with the digital tools to assist them with abuse incident reporting, prevention, training, injury management and organization risk assessments, analysis and benchmarking services. The company's turnkey risk management and insurance solutions for organized athletics enable athletes to succeed both on and off the field.

As part of this offering to customers, Player's Health provides them with a Circle of Care that is built to provide safety and protection for athletes. This platform allows Player's Health to collect, aggregate and analyze information and generate the insights required to create a safer sporting experience and environment for athletes.

By combining technology and data collection with sector knowledge and experience in insurance, sports and risk management, Player's Health has established a new service category in the sport and recreation sector.

## Player's Health's Circle of Care

### Abuse and misconduct reporting

- Incidents of physical, emotional and sexual abuse against athletes continue to show up in youth sports. PH Protect is a straightforward and convenient web and mobile app built for sports organizations that allows members to report abuse at any time, ensuring them that the incident is documented, protected and seen by the right people.

### Injury tracking and management

- Too often, athletes are rushed into playing too soon after an injury. Organizations, trainers and coaches need to be held accountable for putting the safety of their athletes above winning. The PH Rehab application allows organizations to track their athletes' injuries, monitor recovery progress and ensure all their athletes are medically cleared to play their sport.

### Insurance solutions with PH Cover

- Player's Health specializes in offering sports insurance coverage that gives its clients all the customizable options they need without any unnecessary policies or overhead. Users are able to get a quote, purchase a plan and obtain insurance for any aspect of a sports organization within minutes.

### PH Claims

- Player's Health allows its customers to submit a claim quickly via its desktop/mobile platform. This can then be digitally verified by a coach and approved for a claim with just a few easy clicks. Claims are then able to be instantly verified and sent to the organization's broker. Player's Health has the resources to work with our clients to create customizations, such as intake questions and information workflows, that will decrease redundant paperwork, calls and administrative burdens.



"Abuse in sports is not something that is going away. It won't, unless we give organizations the tools to make it happen, and we want them to know how easy it can be to make sure they're protecting their children."

Tyrre Burks, Founder and CEO, Player's Health



Abi Global Health has created Abi, a medical micro-consultation service that gives people secure and compliant access to real doctors via chat apps. Founded in 2016 and headquartered in Dublin, Ireland, Abi Global Health supports insurance companies, employers, nongovernmental organizations and governments to improve access to professional health care.

## About Abi Global Health

Abi Global Health's medical micro-consultation service, Abi, delivers evidence-based medical information to its users from the company's invitation-only network of doctors, all supported by cutting-edge artificial intelligence and machine learning algorithms. The users can ask real doctors any health question and receive personalized medical answers that help them decide whether or not their concern requires further medical attention, empowering people to make better decisions about their health. Abi helps people avoid unnecessary in-person medical visits for 70% of consultations and reduces physician time per case by more than 85% compared with consultations by chat, voice or video.

## Benefits

- **Enhance efficiency:** Abi uses innovative artificial intelligence and machine learning algorithms that enhance doctors' effectiveness by dramatically increasing the efficiency of each medical consultation. Unlike most other telemedicine services, Abi does not require the user to download an app and is integrated into popular chat apps such as WhatsApp, Telegram, Viber, Skype and SMS. As a result, Abi has 10 to 20 times higher engagement rates than typical telemedicine apps.
- **Drive engagement:** Abi has 10 to 20 times higher engagement rates than typical telemedicine apps due to an interface integrated directly into popular chat apps.
- **Reduction of costs:** Abi helps improve insurers' loss ratio by helping customers to avoid unnecessary in-person medical visits. When a medical visit is necessary, Abi integrates with a customer's existing provider network to ensure that the insurer keeps its customers in network.



<b>Secure and compliant access to trusted doctors</b>	<b>Abi supports governments &amp; NGOs around the world</b>
<b>No new app to download</b>	<b>Easily available</b>
<b>Directly to Abi doctors</b>	<b>Supporting real doctors with cutting-edge technology</b>

"The global pandemic has created an opportunity for insurance companies to prove their value to their customers and deploy innovative technologies to meet them where they are. Our insurance partners provide the Abi micro-consultation service to their customers to improve engagement and deliver value, while at the same time driving operational efficiency and improving claims ratio."

Kim-Fredrik Schneider, CEO, Abi Global Health



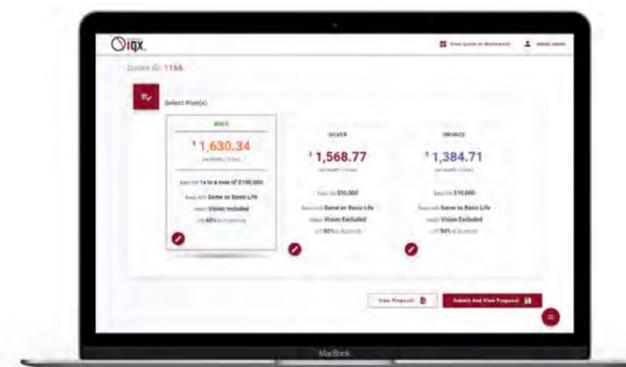
A provider of artificial intelligence (AI)-driven employee benefit technology, Global IQX offers a suite of business configurable modules and microservices that digitize, streamline and automate new-business and renewal processes for employee and voluntary benefits. Founded in Canada, the company covers true group and experience rating for all group and voluntary products from small to large national accounts.

## Digital innovation for group insurers

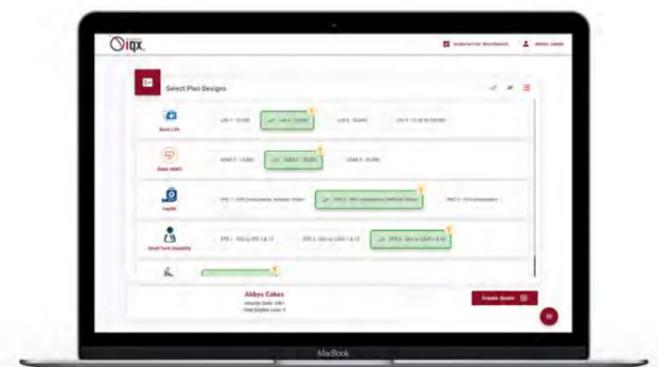
The IQX platform combines AI with rule, content and rating engines to enable dynamic proposal and policy creation and automate renewals, among other key benefits that save time and cut costs. Global IQX is recognized as a dominant provider of life & health new business and underwriting systems, with several U.S. and Canadian carriers currently using the platform to quote, rate, onboard and renew group benefit products with experience rating and census data.

## AI-powered components

The IQX Platform is differentiated by its optional AI layer, which adds additional functionality and intelligent recommendations to existing components. The AI Census Scrubber is used to correct and supplement census data automatically during quoting, and IQX Express Quote can use predictive analytics to recommend optimal plan design for new business based on past successful plan design, group size and SIC code. Several more AI components are planned for release in 2021.



IQX Quick Quote allows brokers and sales users to produce accurate quotes in five clicks or fewer.



IQX Express Quote with an alternative benefits plan recommended by AI based on success criteria.

## Rate all products for all group sizes

One of the fastest rating engines in the market, IQX rating enables the quoting of multiple products with census data from small groups to large national accounts, including multiple classes and divisions. Global IQX Sales & Underwriting Workbench is permission-based and allows users to contribute collaboratively using optional CRM tools for the entire new business and renewal sales cycle.

Optional broker quoting and employee self-service portals allow for a persona-based experience that can also include voluntary benefit recommendations.

## Grow a digital ecosystem

Global IQX offers a scalable, rich suite of out-of-the-box features and optional components that are built to work with existing technology investments. The platform offers a robust set of integration tools, including a production-proven API and preconfigured integration modules for processes including CRM, PAS, claims, payroll and document management to enable automation of business processes across heterogeneous systems.

The IQX API can also show various health, risk and wearable scores to offer rating factors. For example, employees can connect their wearables (e.g. Fitbit) to receive discounts via the Employee Self-Service Portal.



## The Art of the Possible: An Investor's Perspective



**Stephen Goldstein**  
Vice President,  
Client Experience Lead  
RGAX



Stephen Goldstein is Vice President, Client Experience Lead for RGAX, LLC, where he works closely with insurance companies in the U.S., Canada, Mexico and South America to develop need-based solutions.

Stephen's global experience in the insurance and financial services industries spans corporate roles in the U.S., Europe and Asia, with a focus on distribution, operations, audit, market entry, consumer financial advice and corporate strategy.

RGAX was established as the "transformation engine" of Reinsurance Group of America (RGA) — a leading global reinsurer focused exclusively on the life & health industries — and as an extension of RGA's decades-long commitment to innovation. RGAX builds on RGA's legacy of continuous innovation by partnering with clients and entrepreneurs to address existing challenges, explore new opportunities, and build the future of life & health insurance.

## 1. Stephen, while many of our readers will be familiar with the life reinsurer RGA, can you please give us a brief history of RGAX and explain how it came to be the business it is today?

RGAX started primarily as an investor and incubator with a focus on creating transformational change for the life insurance industry. Over the years, we've worked with a variety of individuals and companies, many outside of the insurance industry, to build our entrepreneurial expertise and to augment our insurance knowledge in adjacent areas.

To date, we have placed early-stage investments (Seed and Series A primarily) into a number of InsurTech start-ups globally. In addition, we have invested as a limited partner in select venture capital funds, including Sierra Ventures and Six Thirty. These direct and fund investments have broadened RGAX's exposure within the start-up community and have provided a number of collaboration opportunities for our portfolio companies and venture capital partners over the last five years.

Our in-house Innovation Studio "incubator" has allowed us to build, test and scale ideas from concept to launch. We utilize a structured and repeatable methodology to develop ideas throughout the product pipeline. To date, we have had over 100 concepts go through our Innovation Studio framework, and a number of those ideas are in market today, serving the needs of carriers and reinsurers alike. While some of our concepts have required pivots midway through, and others have been stopped, we always document the lessons learned as a resource for future initiatives.

In 2018, we expanded RGAX's suite of solutions through business acquisition. These entities include technology, outsourcing and consulting solutions that can be applied and utilized across the value chain, including underwriting, claims and reinsurance administration.

Today, RGAX is a global organization with teams in the U.S., Canada, EMEA [Europe, Middle East and Africa] and APAC [Asia Pacific]. We have created an ecosystem of solutions that carriers around the world can connect to and rely on to enhance their own transformation and innovation priorities. Throughout our growth, we strive to never lose sight of our mission of helping people live longer, healthier, more financially secure lives.

## 2. Can you please tell us exactly what it is that RGAX is doing in the InsurTech arena? What types of services, solutions and assets are you offering to hopeful InsurTechs?

Building on the above, RGAX is organized across four key lines of business: Digital Distribution, Consumer Engagement, Data and Analytics, and Insurance Services. All of the solutions we provide are centered around these four categories and are regionalized based on the identified needs of our carrier clients in their specific markets. A few examples of each include:

**Digital Distribution** — In all of the markets in which we operate, we have helped our carrier partners prototype, test and scale up new life insurance products distributed digitally, both D2C and via an agent through digital enablement. In some instances, we have worked with a third party (InsurTech or other tech platforms) to act as the front end of these efforts whereby RGA and RGAX provide



**"With the events of 2020, the rapid adoption of digital engagement capabilities was critical to companies' abilities to sustain sales momentum."**

support on underwriting, pricing and through our innovation methodology to launch products. Through our partnership with companies like Fabric, Ethos, Finaeo and others, we are learning how we can serve to improve customer experience and in turn doing our part in closing the protection gap.

**Customer Engagement** — In Europe, we have partnered with YuLife, an expert in customer engagement. One of the objectives is to understand how learnings from other industries can be applied to protection to improve engagement with health and wellness tools that ultimately enable customers to live healthier lives. We see applications in both the individual and group space and are looking for ways to leverage these insights in other markets. We are also partnering with companies such as TCARE and CareSignal in the U.S., incorporating their offerings into eldercare and employer wellness programs.

Further related to customer engagement, with the events of 2020, the rapid adoption of digital engagement capabilities was critical to companies' abilities to sustain sales momentum. Through our partnership with Asset-Map, we have been enabling companies during this period of transformation, supporting the remote advisor-client engagement experience.

**Data and Analytics** — In the U.S., our Data and Analytics initiatives have been predominately focused on risk scoring solutions for the underwriting market. Some of these tools have been incubated in RGAX then supported through RGA. A primary example of this is our RiskDimensions<sup>SM</sup> solutions suite, which looks across credit-based, medical prescription and digital health data to advance accelerated and now alternative underwriting initiatives. These are being applied in both individual and group insurance markets.

In Japan, RGA and Omniscience have developed an AI-based OCR [Optical Character Recognition] technology solution that can not only digitize the health check data from Japanese health check forms but also extract data in a structured format. Thanks to the cutting-edge AI technology of Omniscience, we have been able to train a machine learning model to extract over 30 common

health check data fields and values used for underwriting, from low-resolution images of a wide variety of Japanese health check forms, with a high accuracy.

This technology solution was recently deployed into a consumer service launched by SOMPO Himawari Life, enabling it to engage consumers in a truly innovative way. SOMPO Himawari Life's consumers can take a picture of their health check forms and automatically get a risk score of lifestyle-related diseases based on the health check data digitized by this solution.

**Insurance Services** — As mentioned, RGAX acquired several entities in 2018, spanning across underwriting, claims and reinsurance administration. Many of these core services help to serve and enhance the existing day-to-day operations of carriers across the world.

As the subsidiary of a reinsurer, we are in a unique situation where we can provide these solutions as stand-alone offerings to the insurance industry, and we can also share the risk.

## 3. Does RGAX sit to serve the core mandates of RGA as a reinsurer, or are you able to utilize the assets of RGA to go one step further and drive innovation from within RGAX? (What kind of relationship does RGA have with RGAX?)

The primary objectives for RGAX are to look around the corner to explore future problems and solutions that are core to RGA and its clients, to invest and partner with entrepreneurs that complement and expand our capabilities to advance our overall organizational goals, and to diversify RGA's earning sources and expand offerings to fit a broader part of the insurance industry value chain.

By taking this multi-pronged approach and by leveraging existing capabilities and assets of RGA, the organization is better positioned to serve clients, from a traditional risk management perspective, but can also support them in moving forward their innovation agendas, many of which these oftentimes overlap.

## 4. Can you tell us a little bit about your current InsurTech portfolio? Why were these companies selected?

Our portfolio companies are listed to the right. These investments have been driven primarily from a strategic intent and were selected because they were solving a significant problem across the value chain. With many of our investments, we have put side letters in place that have outlined potential strategic partnerships between the start-up and RGAX.

### RGAX venture portfolio



## 5. Stephen, you yourself have been involved in InsurTech since the term was coined; specifically in the LAH space, what would you consider to be the single most impacting technological innovation, and why?

I think it's two things, which are often tied together: 1) data and 2) the application of AI to provide meaningful analytics on that data. To provide an example from my personal experience, I started in the insurance industry in 2006 as a financial advisor selling insurance. Two of the most important activities as part of my sales process — prospecting and underwriting — were often both inefficient and time-consuming.

For prospecting, I would do cold-calling and cold-walking (yes, literally going door-to-door and business-to-business to sell). Sure, the cold-calling lists I bought had some filters on them identifying a "good lead," but oftentimes the data was outdated. Underwriting was a pain and almost entirely reliant on fluids.

Today, the use of data and AI in these two areas has been tremendous. We now have the ability to better target the right offer to the right customers. Further, we can connect third-party data sources within the underwriting journey to make the process quicker and more efficient.

Even though the industry has made great strides, the potential has not been fully unlocked. I am very excited to continue to see trends and advancements here.

## 6. Do you think that purchasing behaviors and consumer interactions have fundamentally changed in these lines of business? And if so, do you think they are consumer-driven or technology-driven? How would incumbents be best positioned to respond to these changes?

I think purchasing behaviors and customer interactions have fundamentally changed — overall. These interactions are driven by both the consumer as well as technology. Consumers demand easier, faster and more customization for their goods and services. Technology (in many cases) provides for that and increases the consumer experience to improve throughput.

Individuals buy/listen to people and brands that they trust and want to associate with. Amazon, Apple, Zoom, etc. are all household names today. When these brands offer new features, benefits and solutions, they have a captive audience that already trusts them and may be more inclined to purchase.

TikTok, Instagram and Twitter are all social media platforms that we use and engage with daily. We are following people on these platforms that we trust, are entertained by, want to learn from and/or want to hear dissenting opinions from.

I mention these two groups — the brands and social media platforms — because incumbents of the future need to understand how their customers interact in their day-to-day lives, period. Once they better understand that, then incumbents need to ask how to best engage with their consumers via these platforms (as well as to those who do not).

## 7. What are your predictions for the next five years?

Based on conversations I've had with carriers and start-ups over the past six months, I see a few key trends for the coming years:

1. Speed of transformation has increased dramatically due to the current global landscape. While the trajectory is likely the same, the pandemic has highlighted that the strong companies will be those that are nimble, able and willing to adapt to change.
2. Current innovation is closer to the core and not as much on the fringe. Many CVCs (corporate venture capital) and in-house innovation departments are being tasked with solving problems that are more immediate rather than initiatives that have a longer path to ROI.
3. Greater acceptance of working remotely and the hiring of talent from multiple geographies. This will be important, especially for insurance and technology companies not based in major markets.
4. Wellbeing and wellness initiatives having more clarity and bringing more real value to clients. Wellness has always been something that life & health companies have considered as an ancillary offering/benefit to offer to policyholders. I see wellness being classified in three areas: physical/chronic condition wellness, financial wellness and mental wellness. While there have been offerings in these three areas over the past few years, currently I'm seeing more of a willingness to explore and adopt these initiatives now more than in the past. The question still remains whether consumers will want to share this type of information with their insurer or just go directly to their wellness provider.
5. More life insurers will be offering their product embedded directly into the distributor platforms (both online and face-to-face), with the insurer brand featured less predominantly.

## 8. Finally, if you were going to give some advice to a hopeful InsurTech looking to break into our industry and add value, what would it be?

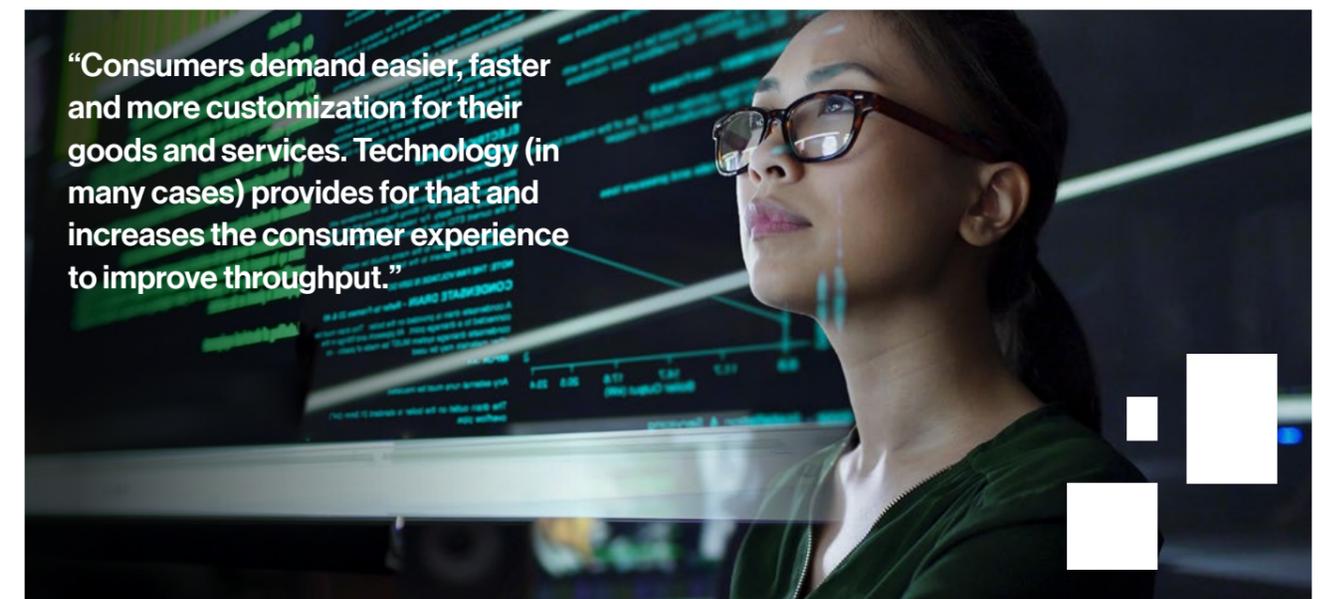
This may sound obvious, but first and foremost, they need to know what specific value they are bringing. If their solution is for consumers, there are a couple questions they can ask themselves:

- What benefit are they providing?
- What cost(s) are they saving?
- How are they helping to provide ease and/or peace of mind?

If their solution is for carriers:

- Are you helping them save costs by removing the need for manual/high-cost processes?
- Can you identify opportunities to improve lapse rates, persistency ratios, and loss ratios or provide the carrier with new data sets for better and more accurate modeling?
- Do you help drive revenue by increasing the number of prospects? Improving conversion rate? Increasing sales volume because of a niche product capturing a new market?

Once you know the value of the solution, it is key to find the optimal way to communicate it so that your audience (either a consumer or a carrier) knows exactly what it is you are doing for them and the steps on how you plan to deliver. Delivering upon what you've committed and ensuring ease of adoption is critical to long-term success.





**Incumbent Corner**



# Incumbent Corner – Case Study 1: Discovery's Vitality program



**Adrian Gore**  
Founder of Discovery



Adrian Gore founded Discovery in South Africa in 1992 – with a core purpose “to make people healthier and enhance, and protect their lives.” Discovery is now multinational and is renowned for Vitality, the largest global platform that creates behavior change and financially integrates this behavior into insurance and financial services pricing. This pioneering model of insurance, coined Vitality Shared Value, is transforming insurance markets and financial services globally and concurrently making a significant share of the global insured population healthier and extending life expectancy. Discovery listed on the Johannesburg Stock Exchange in 1997 and has a market cap of US\$5 billion as of November 2020.

## 1. Adrian, great to have you. Could you refresh our readers on the background of Discovery Vitality and your product offering?

We started Discovery in the early 1990s when South Africa was transitioning out of apartheid. At the time, the country faced a high disease burden, too few doctors and a medical aid system of mandatory enrollment with community rating. These factors created considerable potential for adverse selection and medical inflation. There was a clear need for a sustainable approach that integrated traditional medical aids and health insurance. That led to our vision of building an actuarially sound health insurance organization that focused on demand-side management, namely, making people healthier. We had the idea of incentivizing people to adopt healthier behaviors and embedded that into our business model, which was the genesis of Vitality. Over time, the data and results confirmed the efficacy of this approach.

The Vitality model is unique in that it prices the value created through behavior change into the cost of insurance. It provides clients with personalized goals, rewards them for meeting goals, captures the economic value created or lower claims, and shares that value with clients by using it to fund the incentives and rewards that drive healthier behavior. We call it Shared-Value Insurance because it creates benefits for the insurer, the member and society.

Vitality is proven to drive better health care outcomes, with highly engaged members demonstrating 10% lower hospital admissions, 10% to 30% lower hospital costs and 25% shorter hospital stays. Vitality members in South Africa live 14 years longer than the average insured population, and highly engaged

members show a 76% reduction in mortality. Similarly, in our auto insurance offering, highly engaged Vitality drivers have 63% fewer accidents than the worst or unengaged drivers (SA data).

The Vitality model has been adopted by some of the world's leading insurers, including AIA in Asia Pacific, Generali in Europe, John Hancock and Manulife in North America, Ping An Health in China and Sumitomo in Japan, and has a footprint across 26 markets, covering around 35% of the global insured population.

## 2. Technology and the insights that can be derived from technology are evidently at the heart of what Discovery Vitality does. How have you seen the technology inputs evolving since Discovery Vitality was first launched, and how has this enabled you to develop your underwriting accuracy?

In the beginning, we had to rely on more static processes for monitoring healthy behavior, such as gym visits, but the advent of wearable devices has enabled much more accurate tracking of members' health in real time. We have also invested significantly in systems, processes and partnerships that allow for the automated recording of healthy food purchases, physical activity, driving behavior and other activities. We ensure this is always done with member consent, while applying stringent privacy controls. Over the years we have also invested in the most advanced analytical tools available, including machine learning and neural networks, to analyze the incredibly complex data we receive. In addition, we continue to grow our team of talented data scientists and actuaries to

interpret the results and apply them to behavioral analysis. This enables us to identify and understand the links between nutrition, exercise and the prevention of chronic disease, as well as the ways in which incentives and rewards help people to change their behavior.

The improved quality of data inputs and analysis also enables the business to better underwrite members. For example, traditional insurance models assess risk at the outset of the contract and charge a fixed premium for its duration, despite most risk being due to behavioral choices made during the term of the contract. Discovery is different, as it assesses mortality and morbidity risk dynamically over the course of the policy based on healthy choices members make, with their life insurance premiums flexing based on their Vitality engagement. This allows us to price clients individually at inception and reward them with premium discounts and other rewards on an ongoing basis. It transforms insurance from a static and transactional contract to an engaging relationship aimed at making members healthier.

Discovery's rich data set — more than 40 million life years of personal health-related behaviors, associated risk factors and mortality linkages per condition — has also led to research collaborations with top academic partners like the University of Cambridge and RAND Europe. A recent example is a study conducted with RAND Europe on Discovery's weekly micro-incentives program for physical activity (Active Rewards) as applied in a partnership with Apple Watch, whereby members earn their Apple Watch through exercise. Vitality gives the Apple Watch to clients up front and reduces monthly payments to zero if clients meet their physical activity goals. The study, covering more than 500,000 people across South Africa, the United Kingdom and United States, found that those engaged in the Vitality Active Rewards with Apple Watch program were 34% more active on a sustained basis — equating to an additional five days of activity every month. The results showed that behavior change was evident across demographics and countries and amplified within high-risk populations.

The pace of technological change is constantly accelerating, and we continue to monitor the landscape to integrate the most powerful opportunities into Vitality — for the benefit of members and the business.

“There is no doubt that the global pandemic has created hyper innovation in the patient-centric digital ecosystem.”

## 3. COVID-19 has affected nearly every facet of global society, and our industry in particular is facing a number of very unique issues. Never before, however, has technology been so readily available, and we have in fact witnessed an acceleration of available technology that is being used to support society in general and also our industry directly. Given this observation, what do you perceive the role of technology to be in the future of life, accident and health insurance? Where can it make the biggest impact going forward? How would you advise other life, accident and health (re)insurers to better use the technology that is increasingly being made available to them?

There is no doubt that the global pandemic has created hyper innovation in the patient-centric digital ecosystem. In South Africa alone, we have seen the adoption of telemedicine platforms soar: Discovery Health's analysis of data from 19 administered medical schemes (3.5 million covered lives representing about 7% of the population) shows when comparing data from April – June 2019 to April – June 2020, virtual consultations with general practitioners (GPs) increased 34-fold.

In our view, four key trends are dominating the health care industry:

- The COVID-19 pandemic has disrupted typical health care patterns and created discontinuity in the supply and demand of health care services.
- The global shift to patient-centric care is driving demand for improved health care quality and outcomes.
- Providers and consumers are increasingly leveraging digital health care services and big data capabilities to deliver better health care outcomes, more efficiently.
- In a time of great economic uncertainty, there is a need to focus on broadening the affordability and accessibility of health care to as many people as possible.

Discovery has closely followed these trends both locally and globally, identifying ways for consumers to access health care differently and opportunities for greater efficiencies. For example, in our latest product launch, we announced the adoption and funding of digital health care technology

and tools for members and doctors, integration with health monitoring devices and sophisticated data analytics. This digital health care ecosystem allows members to track their health and wellness based on interactions with the health care system and use of wearables and devices. Data is aggregated in the member’s electronic health record, which they can view through our app, and consent to share with a health care professional. The aggregation of this data also allows Discovery Health to design comprehensive care management programs informed by sophisticated clinical insights and risk segmentation. We also launched a Connected Care at-home offering, whereby members are able to book a remotely guided consultation with a doctor using the TytoHome device, receive an accurate diagnosis and medicine script, then order and track delivery of medication, all from the comfort of their own home.

The pandemic also highlighted the important role the insurance sector can play in helping keep its customers healthy. For example, we re-engineered Vitality into a Vitality At Home offering, to help clients remain active and healthy and continue to reach their goals during lockdowns. We introduced a home workout channel, nutritional guidance and online cooking courses, and added new mental wellbeing assessments and tools. Discovery boosted rewards, such as increasing its HealthyFood benefit to provide 100% cash back for qualifying clients, and rewarded Vitality members with Discovery Miles (virtual currency) as they exercised, literally turning their physical activity into financial benefits. In our motor business, we adjusted clients’ premiums down by 25%, using our telematic insights to identify the clients that had traveled low distances. And on the disease-management front, we implemented real-time monitoring of every Discovery member who tested positive for COVID-19, with live analytics of the drivers, and communicated with them to ensure they remain safe. A total of R12 billion (US\$782 million) was generated in the form of shared value for clients in the 2020 financial year, spanning premium discounts, cash backs, boosts and value-added benefits in managing care.

In terms of broader population health, we extended our technology IP and assets to assist national efforts in South Africa. For example, we partnered with a local telecommunications provider, Vodacom, to make our virtual health care platform (Dr Connect) available to all South Africans. This helped to safeguard the health of both citizens and providers through co-funded virtual consultations with doctors. We were also involved in building South Africa’s contact tracing app, which the government has been rolling out with great success. This move of public health onto technology platforms can be very powerful if used appropriately.

Obviously, challenges remain in that not everyone has equal access to digital tools. It is critically important to fully immerse telemedicine services into the health care landscape to prepare for future pandemics as well as reap the benefits this service offers going forward. We firmly believe the world is at a tipping point that will allow for safer, more efficient and affordable ways of accessing health care in future.

#### 4. In addition, can you comment on the impact the proliferation of technology insights during COVID-19 has had on Discovery Vitality’s underwriting approach? Have you found that people are now more active?

Discovery finds itself in a unique position to analyze a combination of insurance claims and behavioral data to understand the broader impact of the pandemic beyond morbidity and mortality. In terms of changing behaviors, we saw differences in various lifestyle categories at different stages of the pandemic. For example, eating out decreased during initial lockdowns, and home cooking and purchasing of meal kit services increased. On the other hand, outdoor activity decreased early in the pandemic but seems to have picked up again as countries relaxed their restrictions, with subscriptions to at-home workouts decreasing. We recently conducted an analysis of purchasing data for around 320,000 Vitality members on the Vitality HealthyFood benefit in South Africa comparing 2019 to 2020. In the pre-lockdown period of January to March 2020, baskets were deteriorating with 2% less healthy foods purchased compared to 2019; however, during the lockdown period, there was an increase in the percentage of healthy foods purchased compared to the same period in 2019. Overall, members purchased, on average, 6.2% more healthy foods during the lockdown in April to June 2020 than in the same period in 2019. Understanding these trends and their drivers has enabled us to tailor interventions, boost specific rewards and introduce offerings that provide healthier alternatives.

In terms of physical activity, we have seen powerful correlations between the level of physical activity and risk of hospitalization from COVID-19. The pandemic has demonstrated that behavior is important in determining not only noncommunicable disease risk but communicable disease risk as well. For example, in our data analysis of South African cases, we found the following insights highlighting the important role of physical activity:

- A 65-year-old male who does not exercise but who has no other chronic conditions has a 55% higher chance of dying

from a COVID-19 infection than a 45-year old with no chronic conditions.

- In contrast, a 65-year-old male with no chronic conditions who exercises for 30 minutes four times per week has a risk 22% lower than a 45-year-old who does not exercise at all.
- A 65-year-old male who does not exercise and suffers from hypertension has more than double the risk of dying due to a COVID-19 infection relative to a 45-year-old with no chronic conditions.
- If the 65-year-old hypertension patient exercises only once a week, his risk of dying due to COVID-19 is the same as a 45-year-old. One exercise session a week shaves 20 years off his risk.

We continue to explore and analyze these trends in order to provide the best possible guidance and care to members, as health and wellbeing becomes a top priority for people worldwide.

#### 5. You’ve partnered with several leading insurers in very different markets. How does your partnership model work, and what informs your approach?

We chose a capital light licensing model in order to unlock Shared-Value insurance outside of South Africa. The two options available to us at the time of internationalization were through an intellectual property licensing arrangement or to establish an insurance company from scratch in a new market. Our experience had taught us that starting an insurance company in the U.K. (as an example) was capital-intense, so to have rapid rollout with minimal financial downside, we opted to license the wellness to partners that were already incumbents. Our first partner was AIA and the partnership has grown to cover nine markets in Asia Pacific and growing. It is important to note that we had no evidence of success outside of Discovery’s operations and all data was South Africa-specific, which is not necessarily universally applicable. We started with Vitality linked to life & health insurance with the intention of extending to other forms of IP, including Vitality Drive.

An important factor in determining partnerships was that the partner insurer was aligned to our core purpose. Based on this partnership model, we have expanded across multiple countries and industries with a presence in 26 markets over six continents, touching in excess of 20 million lives. Vitality is more relevant than ever given the global focus on health and wellbeing, and we have seen greater strategic alignment across our partnerships, echoing this sentiment.

“We need to navigate this pandemic prudently, humanely and very carefully — but we should also prepare for a world that may be better after COVID-19.”

#### 6. And finally, if you were a budding technology firm/ InsurTech looking to get into the life, accident and health space, or more broadly this geographic area, what advice would you offer?

Whatever business you are in, it’s critical to have a higher purpose: Great organizations are focused on solving society’s problems. I find a quote from Oxford Professor Colin Mayer instructive in this regard: “The purpose of business is not simply to produce profits, it’s to produce profitable solutions to the problems of people and planet.”

My other suggestion is to rethink the way you plan for the future. Most companies rely on scenario planning to determine possible futures in times of uncertainty, but I would argue this is a limited approach. You can’t rely on bounded thinking during times of unprecedented change. In this light, I find the work of late economist George Shackle intriguing. He put forward an approach called Potential Surprise Theory. This theory discourages traditional scenario planning techniques in which the probability of specific scenarios within a bounded distribution are considered. Instead, it suggests considering an unbounded set of possibilities — or plausibilities — both on the upside and downside.

We know the world will be different after COVID-19, but how? Rather than thinking of the probable outcomes, how might we broaden our vision to a range of plausible futures? We’re likely to see continued physical distancing, the return of big government and the possible rollback of globalization. Yet there are positives too. The pandemic is a massively disruptive and tragic event; however, we would be foolish if we failed to consider how we might emerge — beyond solely the downside. There is an opportunity to take this plausibility thinking and reconceive new and positive futures for our work, community and family contexts. In our space, we are preparing for an expanded role; health care and therefore health insurance will be more important, as will wellness, strong immunity and healthy aging. We need to navigate this pandemic prudently, humanely and very carefully — but we should also prepare for a world that may be better after COVID-19.

# Incumbent Corner – Case Study 2: Aviva Singapore



**Santosh Gon**  
Chief Information Officer  
Aviva Singapore



Santosh Gon is the Chief Information Officer for Aviva Singapore. Santosh provides leadership for the continued development of an innovative, robust and secure information technology environment to support the evolving demands of the customers and distributors. He has been leading the digital strategy for Aviva Singapore, implementing a number of strategic initiatives to support the growth in business and delivering a differentiated experience for the customers.

Aviva is a leading international savings, retirement and insurance business, serving 1.5 million in Singapore. They are a provider of Medisave-approved Integrated Shield plans, as well as supplementary plans for the national ElderShield and CareShield Life schemes. Aviva is also one of the biggest providers of employee benefits and healthcare.

## 1. Santosh, great to talk to you. Can you please give us a sense of the extent to which technology is at the heart of Aviva Singapore's operations?

At Aviva, we've made significant investments into advanced analytics and artificial intelligence to kill complex processes and increase overall business productivity — which has given us the ability to scale quickly and stay ahead of disruptions in the insurance landscape. Cognizant of transformation in the digital landscape where customers are increasingly turning to digital channels, and as a company that embeds customer centricity at every level of our business, we have focused our efforts in following areas:

- 1) Digital access for customers and advisors, where they can check policy details or transact digitally at their own convenience 24/7
- 2) Analytics to better understand our customers so as to personalize the most relevant solution to each customer. Predictive analytics also allow us to better manage potential future risks.
- 3) Automate manual tasks to free up resource for value-adding services

4) IoT [internet of things]/digital devices to improve the lives of our customers and community. For customers, we launched an eCall assistance service that provides automated rapid assistance to drivers during emergency situations. For our community and as part of our CR (corporate responsibility) effort, we partnered with the Singapore Red Cross to offer a Home Monitoring and Eldercare system that can send help to elderly members in a medical emergency.

5) AI [artificial intelligence] and smart algorithms to improve processes such as to detect claim fraud, to underwrite more accurately and efficiently

These areas drive two outcomes: efficiency, where we uplift the productivity of employees to create more capacity for the future, and growth, by improving advisor and customer experience. By making Aviva an insurer that is simple and easy to deal with, customers stay with us longer and buy from us more.

**“Our key investments are in data engineering and artificial intelligence (AI) wherein our team of data science practice leverages the investment in data infrastructure to get a holistic view of our customers.”**

## 2. Aviva Singapore has made a number of very large technology investments in the past few years, notably focusing on IoT, data and analytics, innovation propositions and disruptive distribution. To what extent has this investment mandate been driven by customer expectations versus Aviva Singapore's own desire to be one step ahead of the curve?

Aviva Singapore's approach to business has always been driven by a growth mindset. We're always looking to work with disruptive ideas and technologies, backed by great talent who help us think differently and move at pace. The desire to stay ahead is most definitely our own. For example, the use of IoT has unlocked immense possibilities for Aviva. We were the first and only insurer in Singapore to launch an eCall assistance service that provides automated, rapid assistance to drivers during emergency situations. Apart from enabling timely emergency assistance, it also provides us with the necessary data to start post-accident procedures such as claims processing, thereby speeding up processes and enabling greater convenience and satisfaction for our customers.

## 3. What kind of impact have the investments that Aviva has made into technology been realized in Singapore?

Our key investments are in data engineering and artificial intelligence (AI) wherein our team of data science practice leverages the investment in data infrastructure to get a holistic view of our customers. This resulted in a system that allowed us to provide personalized product recommendations by connecting the right adviser to the right customer at the right time, when they are looking for financial advice. Using AI and smart allocation, this system quickly meets the needs of customers by matching customers with a suitable advisor in real time (within 10 seconds). Not only does this reduce waiting time but also the subsequent frustrations that come with the long lead time of getting an email response and scheduling an appointment. By being able to anticipate the needs of the customer, we've seen significant uplifts in conversion rates and higher customer satisfaction.

**“We're always looking to work with disruptive ideas and technologies, backed by great talent who help us think differently and move at pace.”**

## 4. With Aviva Singapore, would you say that you have a history of building, buying or renting technological solutions for the business and your clients?

In the past, Aviva's primary operating model was to build and maintain most of the technology solutions in-house. However, as the technology evolved at a faster pace, the market opened up and InsurTech began gaining momentum. We pivoted to diversify our efforts to leverage key technologies and solutions in the market in addition to developing our own intellectual property.

## 5. This particular briefing focuses on life, accident and health. What would you say are the key concerns and requirements that your clients have in this space? To what extent do you think technology is looking/able to solve these issues?

A concern that customers have is the lengthy and laborious process they have to go through to complete their medical underwriting, which can take up to three months. They have to fill and submit a hard copy health declaration form followed by any other follow-up medical questionnaires — in separate sittings. All communications are also done only via snail mail. To counter this, Aviva developed a dynamic e-underwriting platform that uses algorithms to automatically generate nonlinear questions based on previous health declarations. This dramatically speeds up the process as applicants can complete all their forms in one sitting and the data is transmitted

instantaneously to our underwriters, reducing the time lag between application and inception of policy. This platform has also improved the accuracy of our underwriting.

Customers are also increasingly expecting hyperpersonalization and convenience from their insurance carriers. Online self-service, personalized offers and instant pricing are just a few areas where Aviva has continued to invest by expanding our data infrastructure and developing more comprehensive, top-down capabilities to solve legacy challenges and capture new opportunities. The aforementioned AI and automation capability that Aviva rolled out in 2019 has radically changed the speed with which Aviva deals with customers. A key feature has been its ability to accurately match customers with advisors using a smart allocation system, which simplifies and speeds up the process of scheduling appointments. This has created a win-win situation for customers, who save their valuable time and effort, and advisors who now have more time to prioritize customer service and focus on bringing in better business.

## 6. It would be remiss not to acknowledge the seismic merger you have entered into with Singlife; Singlife itself is arguably an InsurTech. What were the drivers that led to the merger?

Aviva and Singlife are complementary businesses, the combination of which will create a new standard that is greater than the sum of its parts. Aviva Singapore is one of the leading insurers in the market known for its innovative suite of solutions at competitive prices. Singlife has established itself for its digital capabilities and mobile-first focus.

The decision to combine Aviva Singapore and Singlife is underpinned by our shared common goal of responding to the evolving needs of customers and offering Singaporeans a comprehensive range of financial solutions with a superior mobile-first experience.

## 7. And finally, if you were a budding technology firm/ InsurTech looking to get into the life, accident and health space, or more broadly this geographic area, what advice would you offer?

InsurTechs have the potential to be market disruptors, especially at a time when digitalization has surged to the forefront of business and consumer priorities. Beyond innovation, the effectiveness comes down to three key considerations: consumer value, scalability and security.

For consumers, the value of each solution lies in its ability to exceed their expectations and cater successfully to their diverse demands. It needs to elevate their experience with the insurance industry.

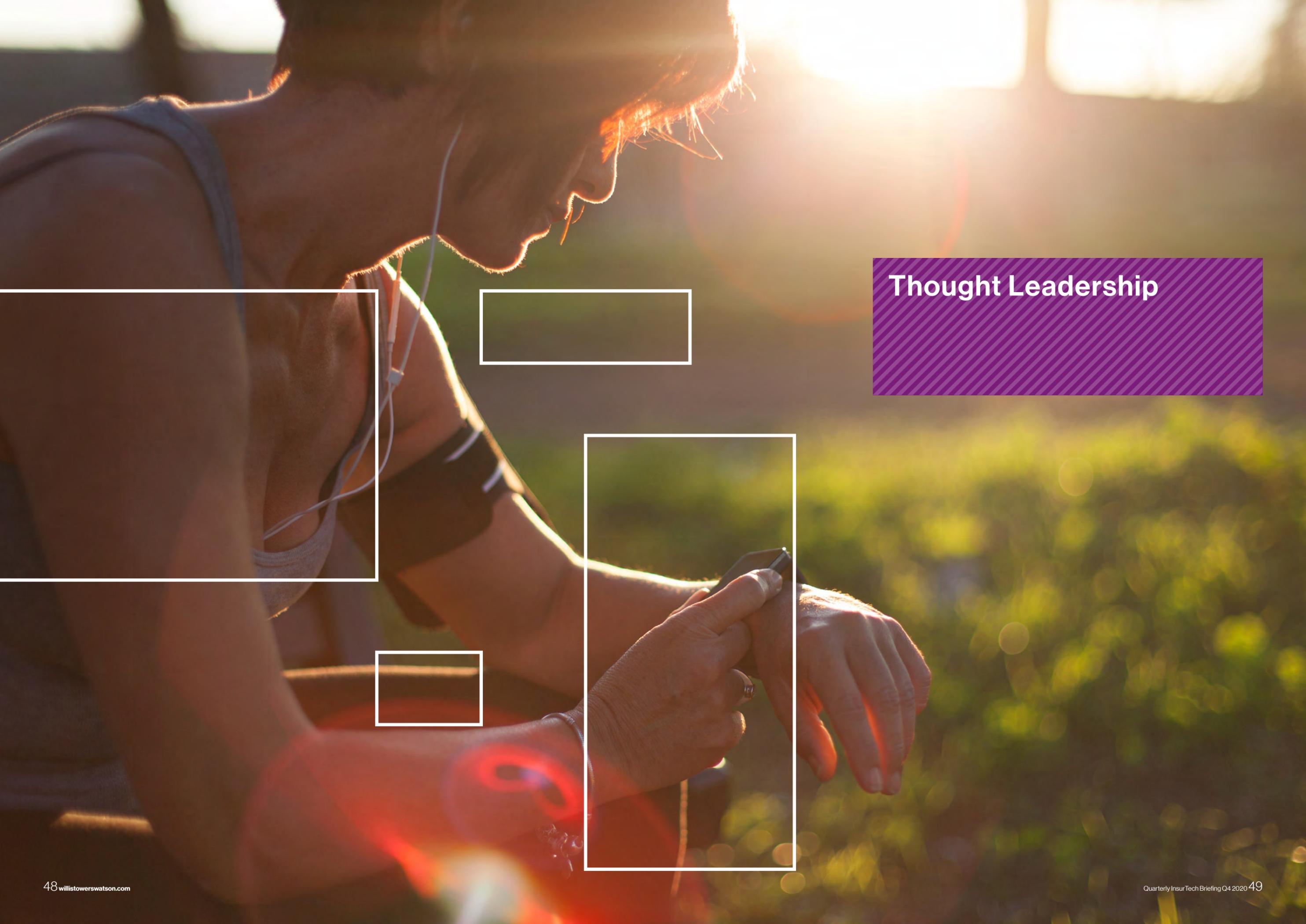
There are times when the problems solved by InsurTechs are very targeted or are tied to limited conditions. For instance, while an InsurTech may be able to address the problem easily for a small company, the outcome might be different for a multinational corporation that tends to have more layers that increase the complexity of the problem. Therefore, companies want a solution that is more holistic and scalable within a large enterprise or even across geographies, and not one that requires frequent changes to suit different markets.

Lastly, companies need security. The increasing reliance on technology and internet has exposed all to more cyber threats and data breaches. InsurTechs need to be confident enough in their ability to safeguard against such dangers to reassure their customers on data security for both their company and users.

“Customers are also increasingly expecting hyperpersonalization and convenience from their insurance carriers. Online self-service, personalized offers and instant pricing are just a few areas where Aviva has continued to invest by expanding our data infrastructure and developing more comprehensive, top-down capabilities to solve legacy challenges and capture new opportunities.”



“In the past, Aviva’s primary operating model was to build and maintain most of the technology solutions in-house. However, as the technology evolved at a faster pace, the market opened up and InsurTech began gaining momentum. We pivoted to diversify our efforts to leverage key technologies and solutions in the market in addition to developing our own intellectual property.”



# Thought Leadership



**Ryan Jessell**  
Senior Director, Head of Individual Marketplace Strategy, Willis Towers Watson

This quarter, Ryan Jessell shares his expert view on the movement to electronic enrollment and the new role of agents and brokers. Ryan is joined by John Jevin at Aetna to discuss Aetna's technological progress, the role of innovation and InsurTech's role.

In 2020 we saw consumers accept, and in many cases seek out, virtual and remote experiences across all aspects of their daily lives — groceries, work, school, health care and so on. Given these tectonic shifts in consumer behaviors across these sectors, it might have come as no surprise if this were the year that insurance purchasers finally moved en masse to self-service, direct-purchase environments and marginalized the role of the traditional insurance agent or broker.

Instead we saw agents and brokers continue to work closely with issuers and technology providers to adapt, maintain and perhaps even expand their role in the insurance value chain — a role that is echoed in the perspectives of insurance leaders, the majority of which still view agents/brokers as their most effective sales channel according to the 2020 World Insurance Report.<sup>1</sup> It is unsurprising then that the initiatives winning priority among insurer technology departments are those that support the role of agents and brokers and seek to simplify their efforts to help customers purchase and manage their insurance policies.

That said, the profile of the life & health insurance agent/broker market has continued its evolution from recent years as the industry has seen a proliferation of large-scale, call center and web-based agencies experiencing explosive growth. This growing partition of the insurance distribution market is perhaps best exemplified by publicly traded participants eHealth, GoHealth, SelectQuote and TRANZACT (a Willis Towers Watson company) as well as an ever-expanding cadre of privately held contenders. These organizations leverage various combinations of traditional and digital media strategies to attract, acquire and retain customers on behalf of insurance companies and in some cases partner agencies. Insurers, in turn, are incented to facilitate smooth

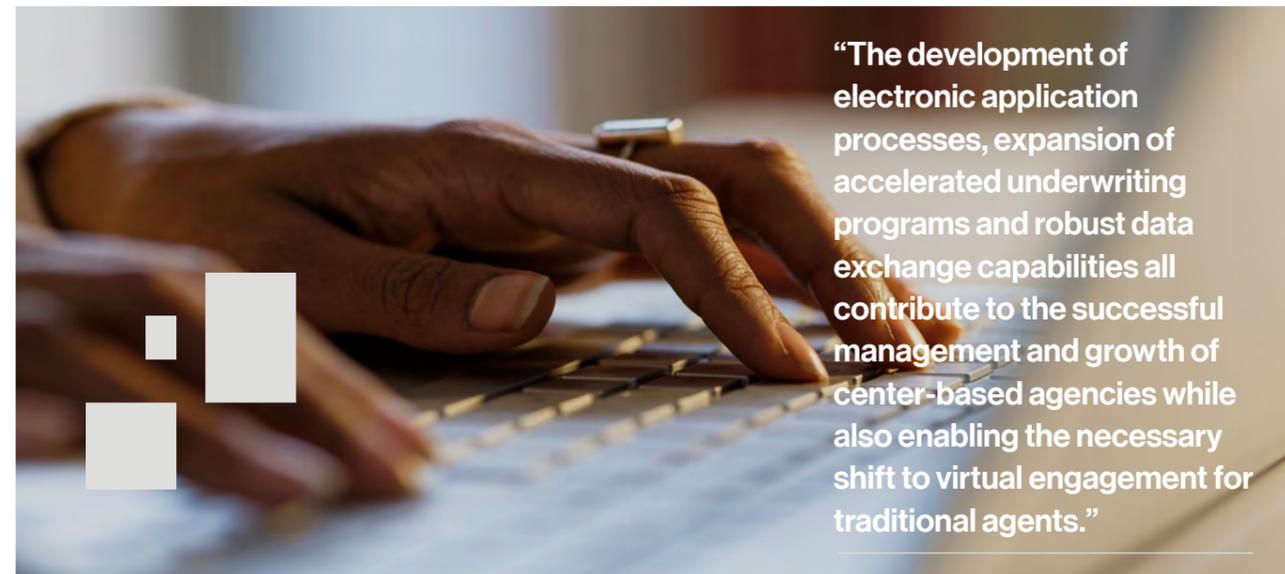
interaction for these center-based agents throughout their transactions and have pursued various technological advances to that end.

In a vacuum, the growth of these larger agency models may have been viewed as a significant competitive challenge for traditional agents; however, the innovations that insurers pursued to streamline interactions for center-based agencies paved the way for the remote and virtual interactions that would be required for traditional agents to adapt throughout the pandemic. In particular, the development of electronic application processes, expansion of accelerated underwriting programs and robust data exchange capabilities all contribute to the successful management and growth of center-based agencies while also enabling the necessary shift to virtual engagement for traditional agents.

This dynamic has played out in a number of ways across various parts of the life & health insurance industry over the years. I had the pleasure of speaking with John Jevin from Aetna about how his company has thought about innovation and InsurTech in the context of Medicare Supplement and Ancillary insurance products, and provide an excerpt from that discussion later on in this piece. We've also seen this codependent innovation environment play out in recent years within the U.S. health insurance market in the wake of reform efforts.

### Connecting brokers, customers and insurers through electronic enrollment

Over the past few years, the U.S. health insurance market has provided a prime example of how established industry stakeholders, regulatory bodies and InsurTech innovators can come together to bring forth advances in the customers' interactions with the insurance world.



**“The development of electronic application processes, expansion of accelerated underwriting programs and robust data exchange capabilities all contribute to the successful management and growth of center-based agencies while also enabling the necessary shift to virtual engagement for traditional agents.”**

Through the Affordable Care Act (ACA), the U.S. mandated the establishment of public insurance marketplaces to facilitate customer shopping and purchasing of health insurance policies that meet the regulatory requirements set under the new law. States were given the option to establish and manage their own State-Based Marketplace (SBM) or leverage the Federally Facilitated Marketplace (FFM) operated by the Centers for Medicare and Medicaid Services (CMS); approximately 70% of these public marketplaces elected to leverage the FFM.<sup>2</sup>

The public-facing website HealthCare.gov was intended to serve as the primary consumer shopping point for marketplaces on the FFM, allowing customers to directly compare all qualified plans available in their area and determine their eligibility for various government support programs; however, CMS quickly realized the large role played by independent agents and brokers as well as the growing role of large-scale web-brokers, including those publicly traded entities noted above. In recognition of this role and to better facilitate positive customer experiences, CMS allowed a pathway for these web-brokers to display plans within their own websites but required a redirect to HealthCare.gov to complete the official application and then a second redirect to return to the web-broker experience. During the 2015 enrollment period, the Association of Web-Based Health Insurance Brokers (AWHIB) estimated that its members handled nearly 13% of all FFM enrollments through this pathway.<sup>3</sup>

However, this “double redirect” process had its drawbacks in the form of customer confusion and broker attribution challenges that lead CMS to announce in 2017 the next evolution of its facilitated enrollment pathway: Enhanced Direct Enrollment, or EDE. This

new pathway would allow approved entities to tap directly into the FFM to facilitate enrollments within their own systems without a redirect to HealthCare.gov. In exchange for this direct access and elimination of the double redirect, entities leveraging EDE would be subject to rigorous privacy and security requirements and ongoing audits.

InsurTechs quickly jumped on the opportunity presented by EDE, with web-brokers HealthSherpa and Stride Health becoming the first EDE-enabled entities in December 2018, and GetInsured and Guidewell following on in 2019. In the 2020 enrollment period, HealthSherpa alone completed 14% of all FFM enrollments processed.<sup>4</sup> For the 2021 enrollment period, HealthSherpa's enrollments have reportedly grown to more than 1.9 million,<sup>5</sup> and the list of EDE-approved entities now includes 11 web-brokers and technology providers. Several of these entities provide platforms that many of the 32 carriers on the EDE-approved list use to access the pathway. What's more, this collection of web-brokers, technology providers and carriers support thousands of traditional agents and brokers of all sizes, affording them efficient access to the individual health insurance market to serve their clients.

The key for InsurTechs looking for opportunity in the life & health insurance markets is to understand the role that they can play in facilitating or enhancing connections among other points in the value chain. At the same time, they must understand that focusing on a single point in the chain — say, the connection between large-scale brokers and insurers — does not mean that the value they provide is limited to those stakeholders directly impacted. Provide tangible value to a single link in the chain and others will adapt to leverage that value and make the rest of the chain stronger.

<sup>1</sup><https://worldinsurancereport.com/wp-content/uploads/sites/6/2020/05/World-Insurance-Report-2020.pdf>

<sup>2</sup>As of 2020, about 60% to 65% of public marketplaces leverage the FFM.

<sup>3</sup><https://www.globenewswire.com/news-release/2015/09/16/1219197/0/en/The-Association-of-Web-Based-Health-Insurance-Brokers-AWHIB-Announces-New-Members-and-2015-Enrollment-Data.html>

<sup>4</sup><https://www.thinkadvisor.com/2020/01/21/healthsherpa-handled-14-of-healthcare-gov-2020-signups-healthsherpa/>

<sup>5</sup>[https://twitter.com/GeorgeK\\_HS/status/1339338236045324289](https://twitter.com/GeorgeK_HS/status/1339338236045324289)



**John Jevin**  
Senior Director of Information Technology,  
Senior Supplemental  
Insurance, Aetna



**Ryan Jessell**  
Senior Director,  
Head of Individual Marketplace Strategy,  
Willis Towers Watson

## Discussion with John Jevin, Senior Director of Information Technology, Senior Supplemental Insurance – Aetna, a CVS Health Company

**Ryan Jessell:** Hello John, could you give us a brief background on you, your role and how you got to where you are?

**John Jevin:** My role in Aetna/CVS Health is overall technology delivery for the Medicare Supplement and Ancillary products business. This involves everything from enrollment and our web presence through the back office, paying claims, billing, issuing policies and so forth. I came to Aetna via acquisition. I was originally part of Genworth Financial, which was a spin-off from GE Insurance. So, thanks to industry disruption I have just celebrated 25 years of continuous service in four different companies. My career has revolved around life & health insurance with carriers and software development companies.

Sounds like you are the perfect person for us to be talking to, given your experience and that you have seen the evolution of the industry. Based on what you have seen from the contemporary innovative technologies, what are the main ones impacting your business model? What is having the most impact and at what part of the value chain that you described (e.g., enrollment all the way through back office)?

The most obvious area where I have seen the biggest change over the course of my career is at enrollment, and especially over the past five to six years. The other aspect that has really exploded is web presence and the amount of data that agents and agencies are looking for. Everyone is into big data; everyone wants to know how sales are performing, client retention, mining existing clients and determining the value proposition for the policyholder.

As a company and as a result of the above, we have gone from simply selling insurance to looking at the whole value proposition for the consumer. How can I build a portfolio around that consumer? I made a single sale, but what can I do retain them? Retention is a key factor in the Medicare business and especially the Medicare Supplement business, as both are such a commodity, which means that price and service are king.

All Medicare Supplement products are the same and the benefits are the same because they are government regulated. The question then becomes, how do we make our Medicare Supplement a better value proposition for an agent and a policyholder? This change becomes keenly apparent at enrollment; when an agent has a choice in carriers, how do we deploy technology to drive speed and simplicity to make Aetna the carrier of choice?

I think you have hit on a great point here, especially with regard to the Medicare Supplement industry. It is probably one of the best examples of a commoditized insurance product. It is a regulated, standard plan designs and so it is all about differentiation — not just with the consumer experience but also with the brokers and distribution experience. Because of course if you can use tech to make it easier for brokers, then it helps them make it easier for consumers.

Absolutely, and even more so as a result of the COVID-19 pandemic. There is definitely a seismic shift with the use of technology in the sale of insurance. It is about getting a broker to choose Aetna or one of our affiliated companies and how we do that — through brand, commissions, service and technology. For us, technology plays a big part in that as it drives the ability to deliver world-class service, speeds processing, and provides more capabilities to agents and policyholders to self-serve.

Our volumes really increased when we were able to deploy online enrollment systems (eApps) out for brokers and then to evolve those systems to be better than the first and second generations. Firms did not want to deal with us on paper as it was an outdated model. They wanted to close sales on the phone because otherwise the process became long and tedious and there was a high risk of not closing the sale. The ability to seal that sale came through technology, and it was key to the growth that we have seen in Aetna.

Are there any particular evolutions that you have done recently? What are some of the recent endeavors that you have completed in your line of business?

You know, it is interesting. You fix one problem and create two more. Moving from paper enrollment to eApp and the volumes that ensued exposed bottlenecks in other parts of our process. So, looking at the back-office process became the next opportunity. Treating digitized applications the same way we processed paper became an issue. Now that we had the application, agents want to see it online immediately and know where it was in the process. My team started to think about other industries and how you can track a package step by step, even track where your pizza was in the process. Why couldn't we do that with an insurance application? Lessons were learned and new tools were quickly developed and deployed.

One of our most recent was around underwriting. We decided to use a third party to move Aetna off the traditional telephone interview calls. Previously, the agent would take the eApp, ask all the medical questions and then either call for a point of sale telephone interview or submit the application and wait for our underwriters to call the applicant. This added more time and uncertainty to the process.

Now, with our automated underwriting feature once the agent has submitted the application, we send the applicant data to our third-party vendor, who pulls in pharmacy data and runs it through their underwriting engine, which we have calibrated with our specific underwriting rules. Within about 90 seconds, on average, we get an underwriting determination: Yes, No, Maybe. For "Maybes," this a flag that we need to ask a few additional questions — far less than the original 15 to 20 minute telephone interview.

Getting automated underwriting in place has been our biggest endeavor in the past 12 to 15 months.

**“(The) worst thing that can happen to a technology company is that innovation is stifled. We've seen that happen in the InsurTech space.”**

So, you mentioned there that you work with a third party to provide that underwriting engine, which is great segue into our next question around your build, buy or partnering/renting strategy. It sounds like in this instance you went with the partner strategy. What are the considerations you have from a technology perspective to think about building, buying or renting technologies?

That is a good question. There are a number of factors, such as whether it is core to us as a business or a commodity transaction. How quickly do we need to get to market, and do we have the subject matter expertise and the capacity to build it? Is this an experiment, something that may not scale? All of these are taken into consideration.

Let's look at an example. With the eApp platform we went with a vendor solution first. We were somewhat behind the competition and we needed to get into that space and get there fast. And it's not an area where we had internal expertise. So a "buy" made sense and by going to a vendor we were able to get to market quicker because they already had a solution in the market.

But over time as our thoughts on electronic enrollment evolved, the vendor solution started to become an anchor: They couldn't make changes quickly enough. We couldn't do things that we wanted to and we outgrew them. And let me be clear: We outgrew them. Our needs evolved and some of the original buy factors turned around. So, after four years, we decided to build internally because it became core to us. We needed to go in a different direction and saw the value in a custom eApp instead of a commodity solution. But I don't think it ends there. There is a timeline on the custom build solution. In the next five-plus years or so, I think the vendor market will mature into the multi-carrier, multi-product eApps and it may make sense for us to return to a buy solution. I think there is an evolution still to happen in this space.

I think that's a great point, John. I think people often think of this decision as, set it and then you are done. But that is not the case, and it is good to hear that you are thinking of it as this fluid, back-and-forth evolution, moving with the vendor market.

You're right and I think that technology leaders cannot be afraid of that. "Oh, did I make the wrong decision?" No, it is not the wrong decision. It was the right decision at the time; however, markets change, business needs shift and leaders need to recognize and respond to them.

As you think about your adoption of technology, how would you place it on the spectrum of proactive to reactive? Are you out there looking to be on the bleeding edge? Where do you like to sit on that spectrum of proactive to reactive?

I'd like to think I am in the middle somewhere. I don't want to be on the bleeding edge, unless there is a critical need. For instance, we are not the first company to tackle automated underwriting by any means, and others had paved the way, but I like to think we can scale it. So, we are somewhat reactive because we are waiting for the smaller companies that are first to market with that technology and demonstrate how successful. We then grab it and try to scale it to our needs. For us, being able to watch new technology in the market and find the right time to say, "Yes, this will now scale for us" is the sweet spot where I want to operate.

As you watch those bleeding-edge developments, do you see that as an opportunity for InsurTechs to carve out a niche for themselves as pushing that bleeding edge? Or do you see that as a threat that they are going to be out there pushing that bleeding edge and really just develop something that doesn't scale? Does the bleeding edge come better from within the industry and these regional players?

Ryan, that is a complicated and sort of multi-faceted question. I do not see bleeding-edge developments as a threat. In fact, I see them as opportunities. It's healthy and needed in our industry. As to where they come from, I believe it's best when it comes from a blend of small InsurTechs and industry veterans. Even better when those InsurTechs have influence or partnerships from outside our industry. We often have legacy thought processes, compliance, legal and other internal barriers that suppress innovation. It's just natural, especially in large organizations. So having niche players who have no boundaries and are hungry to be the next big player in InsurTech is a good thing.

I think one of the great successes is when carriers recognize where these smaller InsurTechs fit in their platform ecosphere, fund and encourage that innovation. And for the niche players it's how to make themselves relevant, especially to the big carriers. They need to understand we are concerned about their ability to scale their product to our needs. So coming in with that understanding and then be open to asking for help to make that happen will open some doors. It troubles me when I see these firms knocking on our door unprepared, not knowing our business, not doing their research and yet they have come to save you with the next best widget. Basic marketing – understand your customer.

We have examples of this ourselves — and as you said, John, it is healthy to have that niche player move it forward even if the niche player gets consumed by the larger environment.

Yes, I've seen it happen. Worst thing that can happen to a technology company is that innovation is stifled. We've seen that happen in the InsurTech space. But we must be careful how we think about it. Whether it's acquisition, merger or investment we need to consider the strategy behind it from their perspective. Still, if that vendor does have significance in your application ecosphere, you have to think about their motivation and your position. I don't think the creativity ever goes away; that is in the people. Best case they are given new tools to expand it. Worst case, they get tied up in legacy standards and processes and start to move on. But that is the risk innovation is built on. The best reward is going to come from the culture created by the transaction. A former company CEO I'm familiar with often said that culture trumps strategy. I certainly agree with that.

Thinking about these outside technology organizations, we have seen a proliferation of tech-based health insurance companies in particular over the past seven years, and also tech-based life insurance companies popping up. How much of a threat do those pose to the traditional market competition being "outsiders" to the traditional market?

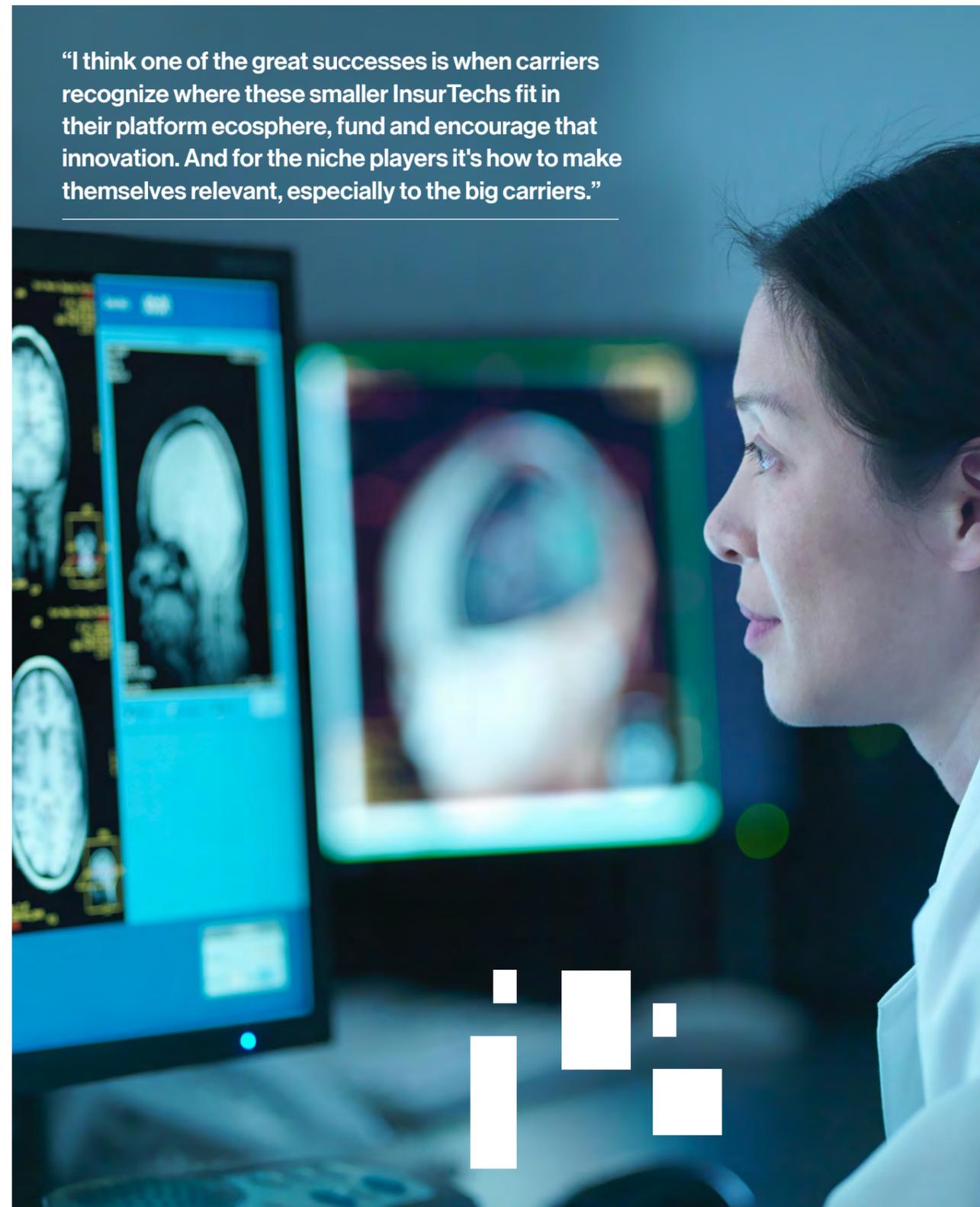
Ryan, I am of the view that those threats are good; in the insurance industry today we need threats to help us be more innovative internally. That threat is an opportunity for us to innovate internally or to partner with those companies whether they are tech companies or just companies offering a different way of doing business.

What seemed like a threat a couple of years ago with the massive call centers coming into the market became a savior in 2020 for those small agencies: They had to shift. Without that initial threat, they may not have been so prepared. What is the next big threat? For me, it is direct to consumer or is that the next big opportunity?

From your perspective, how should an InsurTech firm, or hopeful InsurTech firm, look to position itself for that long-term exit opportunity or partnership opportunity with established market players?

That is an interesting question. First, you have to decide if you want to exit. Some may not have a choice financially, and others can survive over time with a dedicated legacy customer base. Only a few though will find themselves in the sweet spot. And at that point you need to decide what you want to be when you grow up. The second key is recognition of the opportunity. Don't be naïve, and do your research on how you fit together with the established players. Doing your front-end research to know your audience gives me more confidence in the research that has been done on the back end. There is a certain amount of bravado that you have to have, but know your limits.

**"I think one of the great successes is when carriers recognize where these smaller InsurTechs fit in their platform ecosphere, fund and encourage that innovation. And for the niche players it's how to make themselves relevant, especially to the big carriers."**





## Transaction Spotlight



In November 2020, Coherent, a provider of digital platforms and data intelligence engines to insurers, announced a US\$14 million Series A funding round led by global venture capital fund Cathay Innovation, with participation from Franklin Templeton. This is Coherent's first public investment.

## About Coherent

Founded in 2018 and headquartered in Hong Kong, Coherent creates digital platforms that help insurers transform key stages in their business life cycle, including product development, sales and customer engagement. This is achieved through Coherent's four core platforms across three areas:

### 1. Develop

- **Coherent Product Factory:** This no-code solution makes it easy for insurers to create, update and manage their products quickly. Product Factory can transform complex Excel pricing models into deployable code in seconds, which helps insurers reduce the speed to market for new product launches or updates to a matter of weeks rather than months. The solution works with insurers' existing systems such as policy admin systems so there is no need to overhaul existing IT infrastructure.

### 2. Sell

- **Coherent Flow:** Using Flow, insurers can easily create and customize insurance application forms so agents can deliver an enhanced sales experience. During COVID-19, this has enabled agents to continue selling and engaging with customers remotely. The solution's co-browsing and co-editing functionalities allow agents and customers to browse the application form together, in real-time, without the need for face-to-face interaction. E-signatures, easy document uploads and video chat functionalities also help facilitate the application completion process; a process that also includes OTP verification to enhance security. Coherent Flow has auto-underwriting features that mean cases can be fast-tracked, with counter offers and riders easily managed within a centralized system.

- **Coherent Explainer:** Explainer not only helps customers choose the right coverage, but it's a great education tool too for customers. No more generic quotes that aren't relevant to the customer's particular circumstances, Explainer helps to create as personalized quotes as possible for customers, and it's a great accompanying sales tool together with Flow.

### 3. Engage

- **Coherent Connect:** This enables insurers to interact with customers on social messaging platforms. Insurers can send timely, targeted messages to drive customer engagement and retention, and increase the insurers' ROI. Connect is compatible with Facebook Messenger, WeChat, WhatsApp, Viber, Line and Kakao Talk.

## Series A round

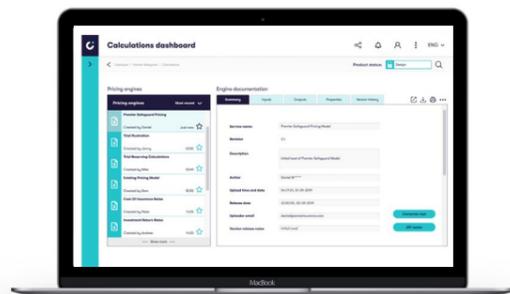
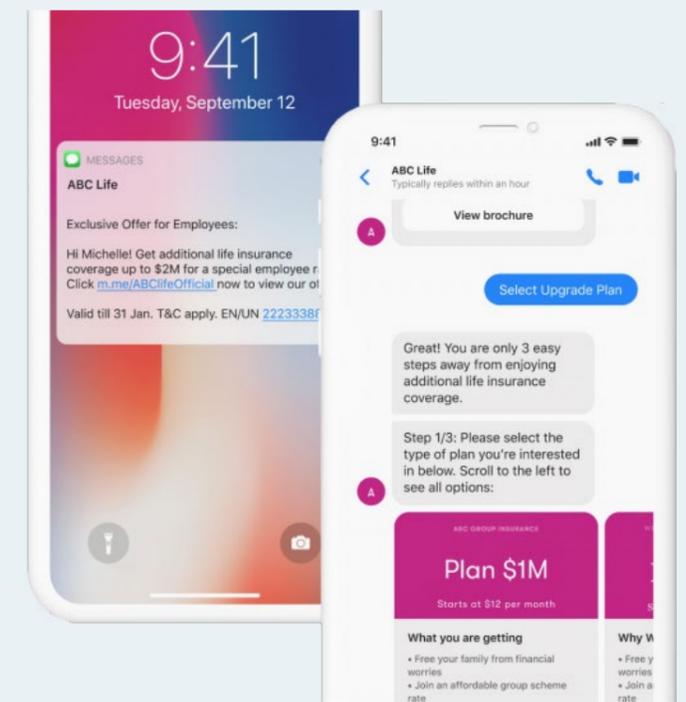
Coherent raised a US\$14 million Series A in September 2020. The round had participation from Cathay Innovation and Franklin Templeton. Coherent will deploy the investment capital to expand the company's Asian presence and increase customer outreach and scale of its business. Coherent plans to add technology and actuarial talent to its growing workforce at its existing offices in Hong Kong, Singapore, Shanghai and Manila plus hire new teams in Japan, the U.S. and Thailand. The increased reach will also extend its customer portfolio, which currently covers large insurers in Hong Kong, Singapore, Indonesia, Mainland China, Japan, the Philippines, Thailand, Brazil and Myanmar.

The investment capital will also contribute to further research and development, bringing continued enhancements to the four core platforms, as well as creating new platforms and technology. This will help Coherent achieve its ultimate goal of helping insurers realize new possibilities and accelerate growth globally.

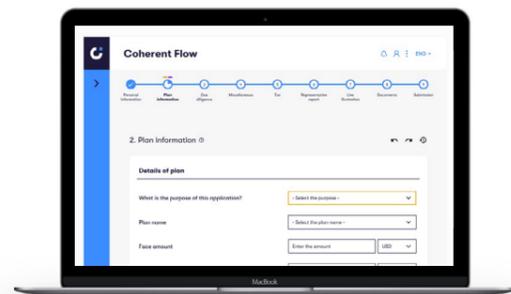
## Coherent: Southeast Asian insurer case study

In summer 2020, Coherent supported a large Southeast Asian insurer to increase the internal adoption rate of the insurer's death benefit policy during COVID-19 among the insurer's own employees. The insurer wanted to increase the conversion rate by approximately 10%.

Using the Coherent Connect platform, which allowed the insurer to reach out to its employees and engage with them more easily, the insurer launched a top-up offer to a small, randomized group of eligible employees. The employees were first sent a text message with a link that opened up in the employees' Facebook Messenger app (which has a high usage in the area). This provided employees with the top-up offer and add-on options for additional hospital income or critical illness products. The employees were then able to select an option and enter their employee number, and then the benefit was directly applied to their policy. The conversion rate at the end of the campaign reached 14%, 4% higher than the insurer's target.



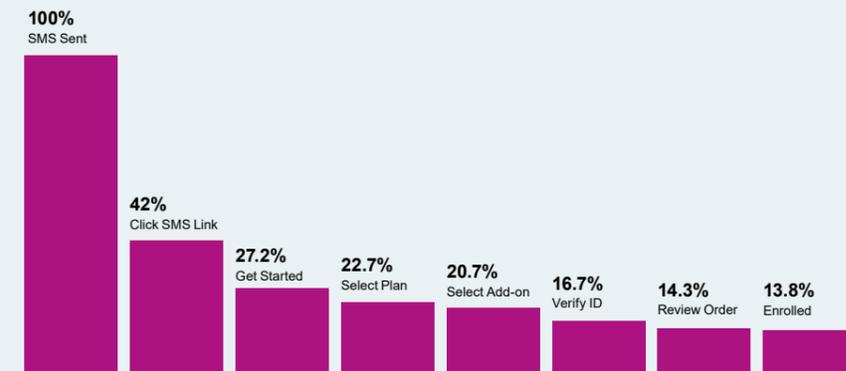
Coherent Product Factory



Coherent Flow

### TOTAL CONVERSION

# 13.8%





# Technology Spotlight

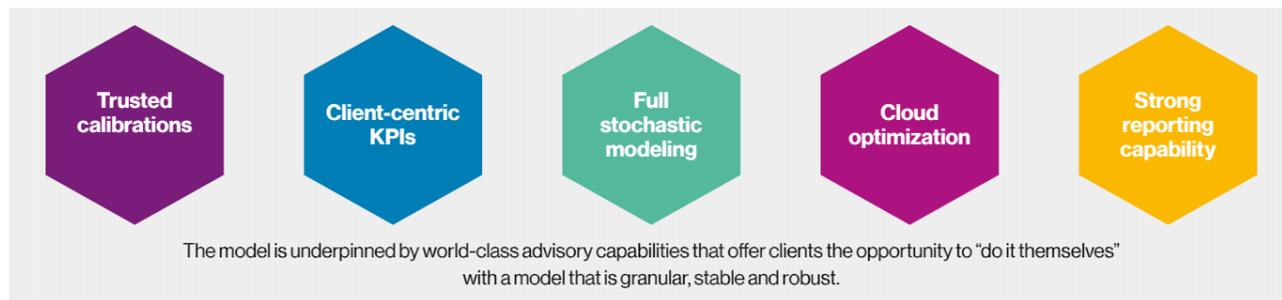
## Willis Towers Watson's Optimum SAA is a web-based platform for strategic asset allocation that helps users find their optimal asset allocations and achieve better risk management and investment return.

The low-yield environment has meant that insurers have struggled to maintain sufficient yield on their investment portfolios. As the currently low yields sink even further, insurers are increasingly turning to strategic asset allocation (SAA) as a known key determinant of investment returns. SAA is a method deployed throughout the insurance, asset and wealth management industries.

Insurers use the technique to find the optimal combination of assets, taking into account asset risk and return characteristics as well as their time horizon and overall objectives and constraints. When harnessed effectively with robust modeling, SAA drives boosted returns and increased risk control. Inferior modelling, however, means less control and less transparency. This, coupled with the unstable optimization techniques we see in the market, may mean insurers do not achieve their asset return potential.

**Willis Towers Watson's Optimum SAA** cuts through the complexity and produces optimized and practical investment portfolios for firms based on key metrics selected by you (related to risk, return and constraints) that reflect your constraints, objectives, investment beliefs and risk appetite.

The five elements essential to any insurance SAA analysis, all of which deeply underpin WTW's Optimum SAA:



### Trusted capital market assumption calibrations and full stochastic modeling

Willis Towers Watson has been delivering investment assumptions to our clients, which now number over 1,000 and represent over US\$2.3 trillion in assets under advisory, for over 30 years. These investment assumptions are also deployed internally to inform decision making for Willis Towers Watson's delegated solutions business, which supports US\$140 billion in assets under management.

Willis Towers Watson's modeling technique maintains the balance among a number of factors, including theory and the current structure of capital markets, incorporating these aspects into a fully stochastic technique, which allows for a full results distribution for each allocation, including tail risk metrics. The stochastic process has the ability to produce 10,000 simulations over a 30-year time horizon for over 40 asset classes.

Figure 1: Distribution of return



### Cloud optimization

Some insurers in this low-yield environment have turned to traditional mean variance optimization (MVO) algorithms to derive

their portfolios. These methods, however, have not been as reliable as some may have hoped. Willis Towers Watson's cloud approach overcomes a number of these known MVO issues as laid out in the table below.

Figure 2: Volatility vs Net return



MVO algorithms	Willis Towers Watson's cloud optimization provides
Are unstable, leading to multiple portfolio solutions generated for the same constraints with differing risk and return outcomes	No risk of finding alternative solutions with each run, as a single run provides all portfolio options
Get stuck at local maximums rather than continuing to search for the global optimal solutions	No risk of local maximum barriers, so the global optimal is found each time
Aim to find one solution (there may be multiple portfolios that provide similar risk and return outcomes within the insurer's appetite, but these may never be found)	Multiple portfolios presented across the risk return spectrum, providing the insurer with more choice and flexibility

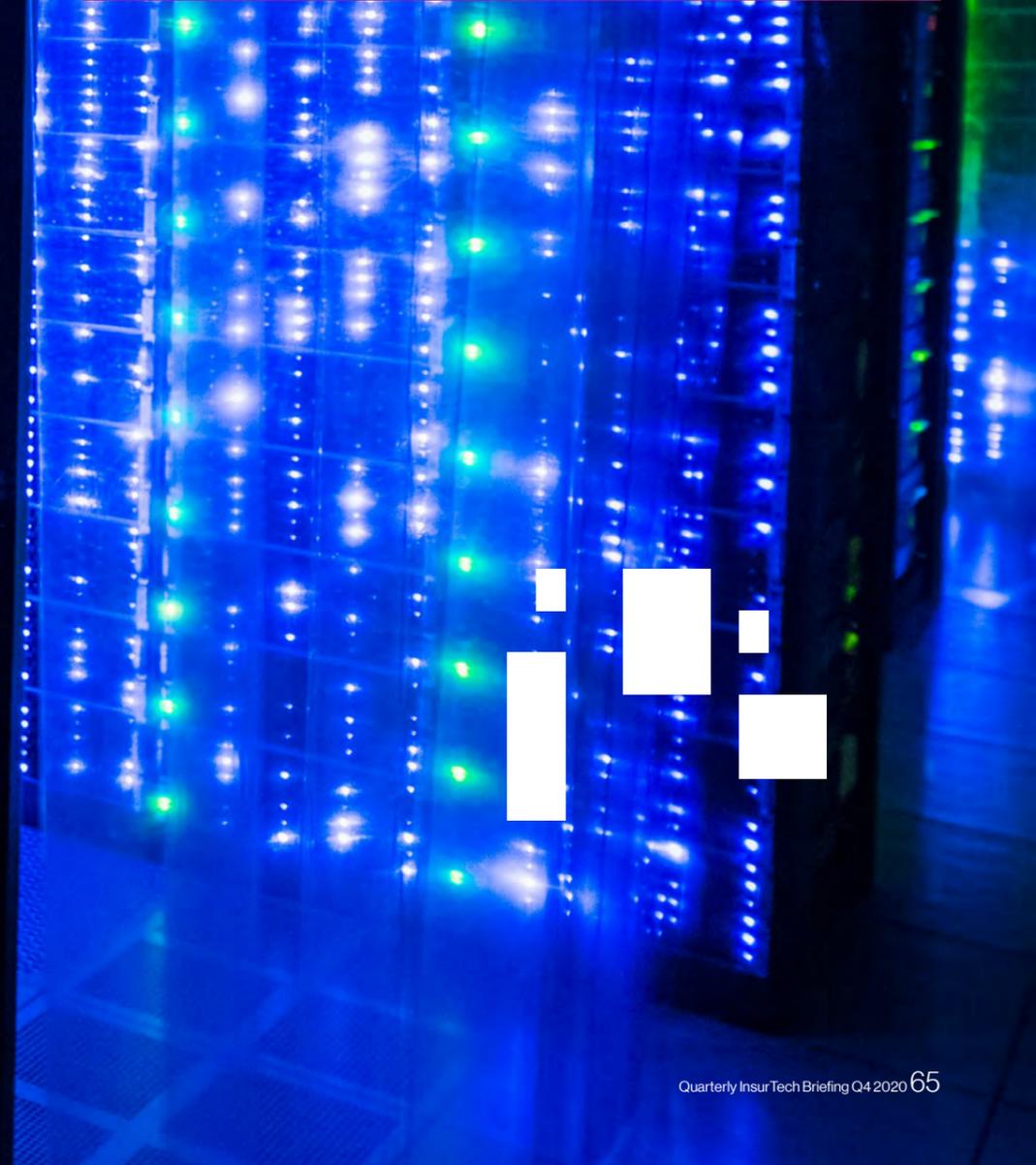
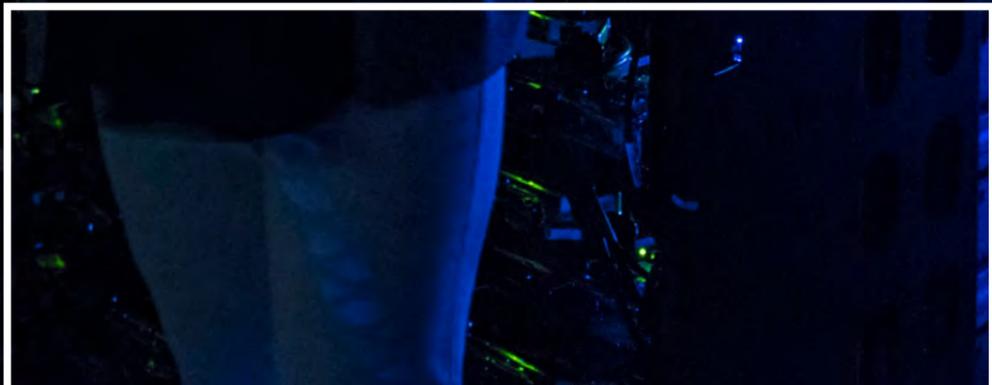
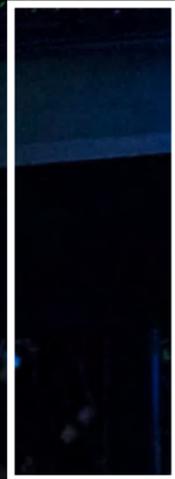
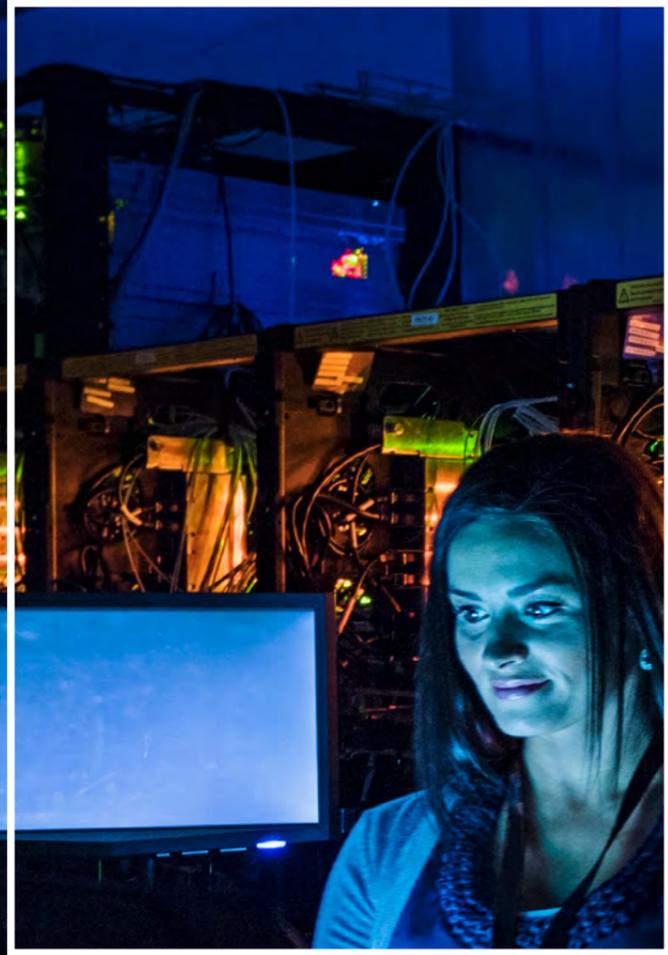
### Client-centric KPIs and strong reporting capability

Finally, the rigorous modeling described above fuels a full range of targeted insurer key performance indicators (KPIs), including Solvency II SCR and liquidity metrics.

These are displayed in the graphical user interface (GUI), which provides capability to download graphics and underlying data. It is through Willis Towers Watson's seamless combination of the five essential SAA elements into a user-friendly GUI that Optimum SAA helps insurers to reach their asset space potential.



# The Data Center



## Global InsurTech funding in Q4 2020 records a slight drop from the prior quarter.

In Q4 2020, InsurTech companies raised US\$2.1 billion across 103 deals — a respective 17% and 1% decrease from Q3 2020.

Matching Q3, Q4 2020 recorded six mega-rounds (investment rounds of more than US\$100 million). These companies were Hippo (US\$350 million), Unqork (US\$207 million), Waterdrop (US\$150 million), Oscar Health (US\$140 million), Bind Benefits (US\$105 million) and Newfront Insurance (US\$100 million). In Q4 2020, mega-rounds were responsible for 50% of total funding, down from 69% in Q3.

In 2020, annual InsurTech funding reached an all-time high of US\$7.1 billion, recording 377 deals. Compared with 2019, total funding increased by 12% while deals increased by 20%.

## Q4 2020 overview

- In Q4 2020, we saw InsurTechs from 23 countries raise investor money compared with 26 in the prior quarter. Notably, Kenya recorded two deals in Q4 2020, the country's first since Q4 2019. These two deals contribute to 75% of the country's total public InsurTech funding. Nigeria recorded its first InsurTech deal since Q3 2015 and the country's first life & health (L&H) deal. This was for a Seed round investment in Curacel that offers fraud management for health care claims.
- The share of early-stage deals declined to 47% compared with 57% in Q3 2020, a 10-percentage-point decrease. Mid-stage deals, however, saw a significant uptick with 29% of deals at the Series B or C stage, up 15 percentage points from last quarter; 11% of deals were later-stage deals that accounted for 39% of Q4 funding.
- The six mega-rounds were predominantly U.S. companies: Five deals were U.S.-based companies, and the remaining deal went to China-based Waterdrop.

## L&H companies continue to mature quietly in P&C's shadow

- L&H InsurTechs represented just 27% of total deals this quarter. The number of L&H deals a quarter remains relatively consistent, with L&H in Q2 recording 27% of deals and 29% of deals in Q3. As usual, property & casualty (P&C) deals received the majority of Q4 funding, with L&H receiving 33% of available dollars this quarter, down eight percentage points from Q3.
- Of the six mega-rounds, 50% were L&H companies — matching Q3 2020. L&H start-ups were responsible for 38% of the mega-rounds' funding, down 11 percentage points from Q3.

- Forty-two percent of L&H funding was at the late-stage, down 32 percentage points from Q3 2020. For P&C investments, 37% were at the late-stage, down 29 percentage points from Q3. For L&H funding, 48% was recording at the mid-stage and 8% at early-stage. For P&C, 48% of funding was at the mid-stage and 9% at the early stage. The remaining deals across P&C and L&H are categorized as other.
- L&H InsurTech in 13 countries raised funding in Q4 2020, more than in any other quarter since we started recording. Australia, Switzerland, Israel and South Korea, which have historically had little activity in L&H InsurTech, received funding as InsurTech models gain application in new geographies. Chile saw its first L&H InsurTech investment in Q2 2020 and received its second investment this quarter with Betterfly, a Santiago-based InsurTech focused on increasing life insurance coverage based on good habits, which raised a US\$9M Series A from QED Investors.
- Direct-to-consumer home insurance players continue to raise funding, including Hippo, which raised the quarter's largest round (a US\$350 million Series F), and Paris-based Luko, which also provides sensor-based D2C home insurance and raised a US\$60 million Series B. Hedvig, which raised a US\$9 million Series A, has brought the D2C model to Sweden as well.
- This quarter, InsurTechs that are targeting more segments of home insurance have raised funding, including Openly, which focuses on helping independent agents quote coverage for high end homeowners, and Matic, a digital insurance agency focused on reducing the friction of home insurance in mortgage lending, which raised a US\$24.5 million Series C.

## B2B start-up dominance slips and distribution-focused companies regain top position

- B2B start-ups secured 46% of the deals in Q4 2020 — a one-percentage-point drop for Q3. Distribution-focused start-ups received 48% of deals, with direct insurers responsible for the remaining 6%.
- In funding amount terms, insurers were responsible for 27% of funding, a 13-percentage-point drop from Q3 2020. B2B companies were responsible for 28%, a 17-percentage-point increase for Q3; distribution-focused start-ups were responsible for 45% of funding, a four-percentage point drop from the previous quarter.
- For P&C investments in Q4 2020, 54% of deals were to B2B-focused companies, 5% went to insurers and 41% went to distribution-focused companies. Compared with Q3 2020, this marks a five-percentage-point increase in B2B deals, a four-percentage-point drop in deals to insurers and a one-percentage-point increase in deals to distribution-focused companies.

- For L&H deals in Q4 2020, 25% of deals were to B2B-focused companies, 7% went to insurers and 68% went to distribution-focused companies. From Q3 2020, this marks an 18-percentage-point drop in B2B deals and a three-percentage-point drop in deals to insurers. It marks a 21-percentage-point increase in deals to distribution-focused companies.

## Q4 2020 recorded 12 deals over US\$40 million, beating the previous high of 11 that was achieved in Q4 2019 and Q2 2020

- 75% of the US\$40-million-plus deals were recorded in the U.S. The remaining deals were evenly spread across China, Israel and France. The 12 deals accounted for 68% of the quarter's total funding, a nine-percentage-point drop from Q3.

## The largest deal of the quarter was a US\$350 million Series F investment into Hippo by Mitsui Sumitomo Insurance Venture Capital. Hippo offers intuitive and proactive home insurance by using data, including municipal building records, and technology, such as satellite imagery and smart home devices, to streamline the quoting and onboarding experience.

### The subsequent largest investment rounds were:

- A US\$207 million Series C investment in Unqork, a no-code, software-as-a-service (SaaS) platform that digitizes the client life cycle and enables financial services and insurance companies to bring complex, regulated products to market without writing a single line of code. The round had participation from Aquiline Capital Partners, BlackRock, Broadridge Financial Solutions, capitalG, Eldridge, Fin Venture Capital, Goldman Sachs, Hewlett Packard Enterprise, Schonfeld Strategic Advisors, Sunley House Capital Management and World Innovation Lab. Unqork has now raised US\$367.17 million.
- A US\$150 million Series D-II investment in Waterdrop (also known as Shuidi Huzhu) from Tencent Holdings. Waterdrop is an insurance platform that plans to solve the problem of high medical fees faced by most patients. This comes off the back of the company's US\$230 million Series D completed in Q3 2020. The company has now raised US\$630.25 million.
- A US\$140 million Series F investment in Oscar Health, a technology-driven, consumer-focused health insurance company. The round had participation from Baillie Gifford & Co., Coatue Management, Dragoneer Investment Group, Founders Fund, Khosla Ventures, Lakestar, Reinvent VC and Tiger Global Management. The company has now raised US\$1.63 billion.

## Strategic tech investments by (re)insurers decrease 34% from Q3 2020. This is the first drop in investments since Q1 2020.

- U.S.-based technology dominance slips this quarter, receiving 47% of deals, down 25 percentage points from Q3. Israel was responsible for 16% of deals and China for 11%.
  - Canada, France, Germany, India and the Netherlands all recorded one strategic tech investment by (re)insurers.

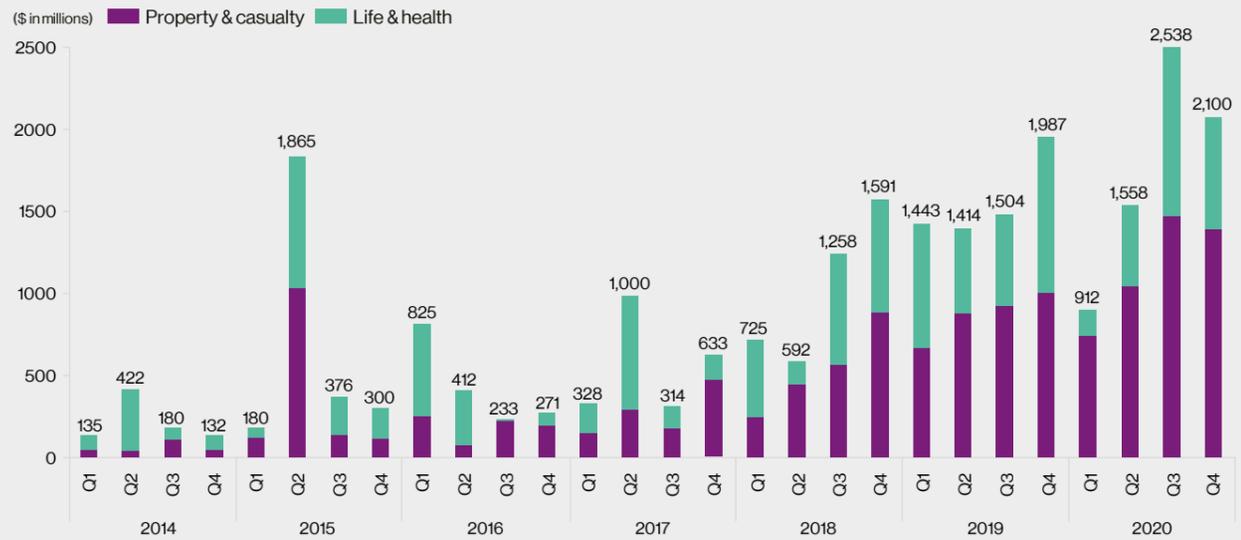
## Q4 2020 saw 26 (re)insurer partnerships, down six from Q3 2020.

### Select partnerships include:

- Tokio Marine Holdings has strengthened its commercial partnership with catastrophe risk modeler RMS, enabling its global entities to leverage data and technology-based insights of risk across all perils and markets.
- Willis Towers Watson has partnered with social business intelligence and data analytics firm Polecat Intelligence. Through the partnership, both companies will develop insurance solutions that will help organizations respond to the rapidly changing challenges they now face.

## InsurTech by the numbers

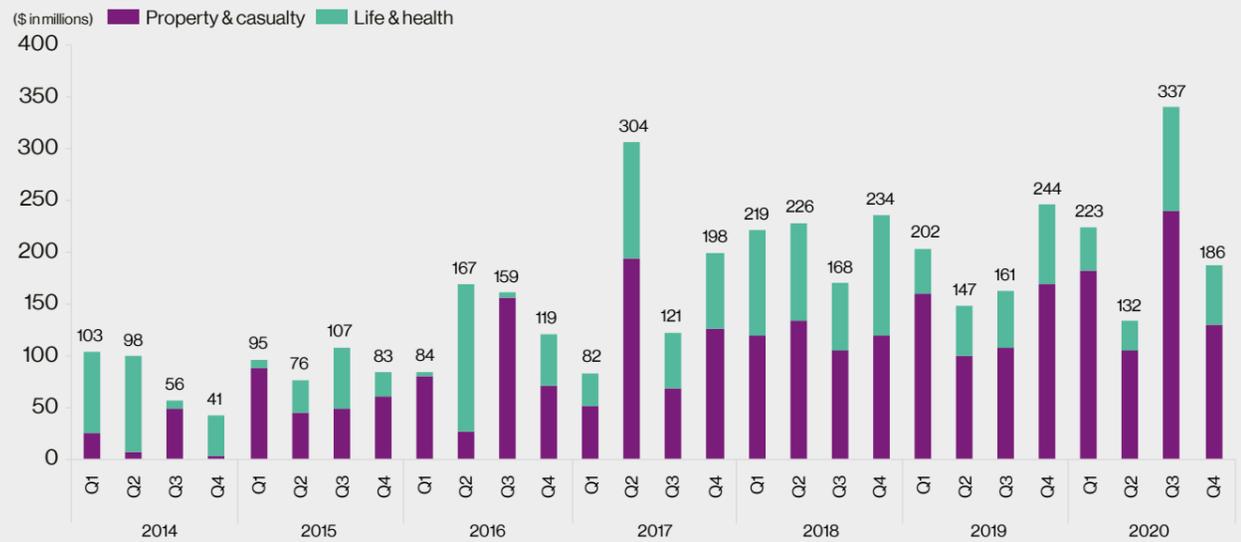
### Quarterly InsurTech funding volume – all stages



#### Dealcount

P&C	10	7	16	8	17	13	16	21	44	18	33	29	26	37	29	45	44	47	40	41	58	49	52	40	72	54	74	75
L&H	9	15	14	15	11	19	15	20	16	17	6	13	17	32	21	11	24	26	17	23	29	20	31	35	24	20	30	28

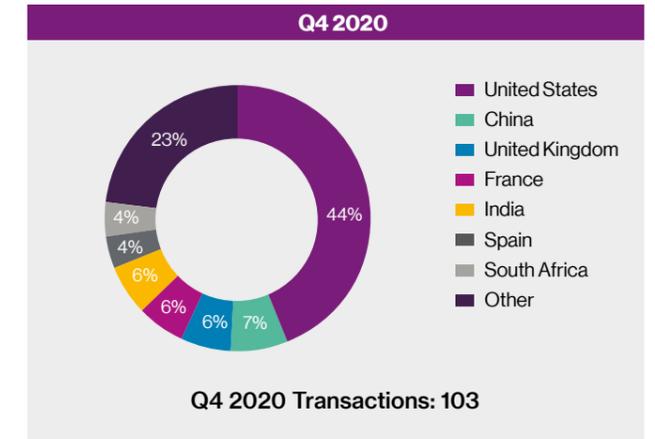
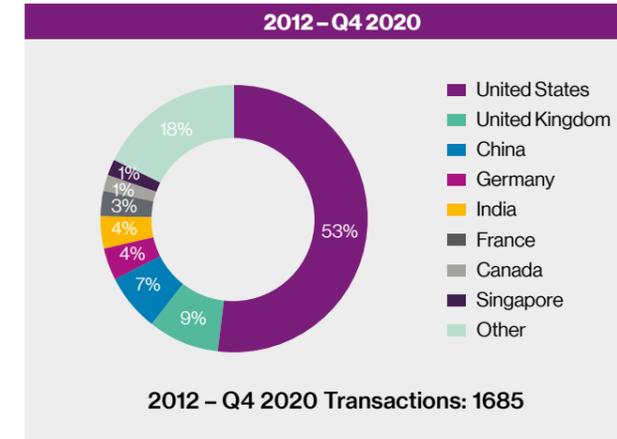
### Quarterly InsurTech funding volume – early stage



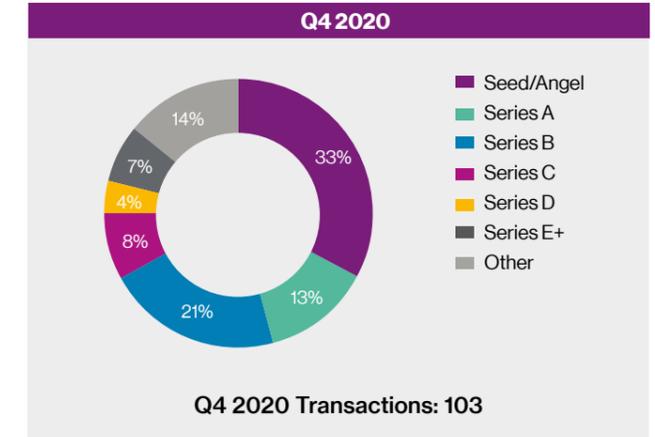
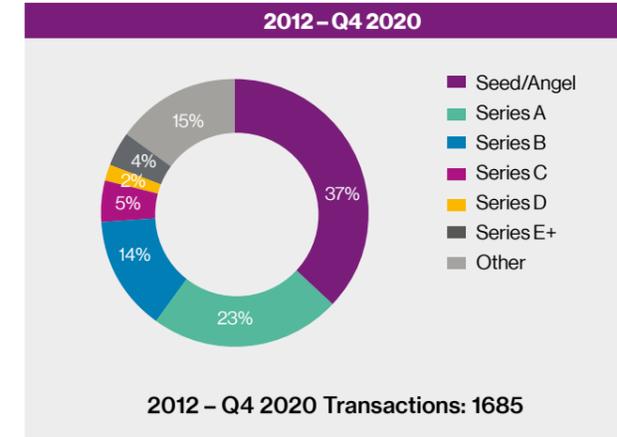
#### Dealcount

P&C	5	3	10	6	13	7	9	16	35	9	25	21	18	25	21	25	32	31	22	25	36	27	35	20	35	25	42	34
L&H	6	8	11	8	5	9	11	16	6	10	3	10	11	11	13	7	15	20	11	15	20	12	19	16	14	6	17	14

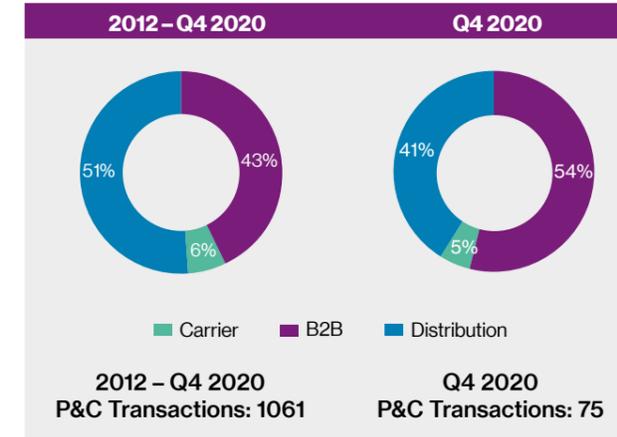
### Quarterly InsurTech transactions by target country



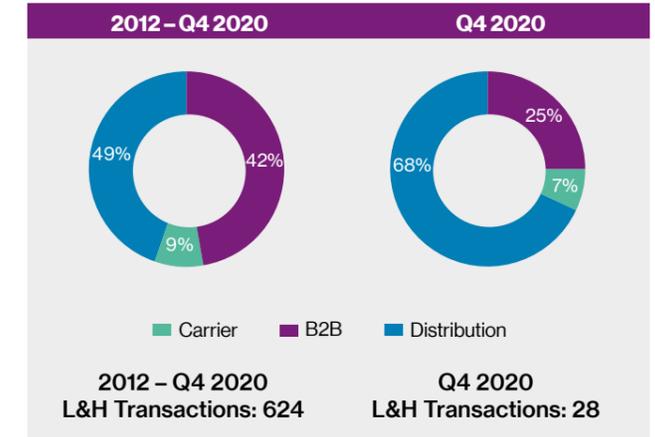
### Quarterly InsurTech transactions by investment stage



### P&C InsurTech transactions by subsector



### L&H InsurTech transactions by subsector



## Q4 2020 InsurTech transactions – P&C

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
10/5/2020	Lokky	1.18	1.18	<ul style="list-style-type: none"> <li>Angels4Impact</li> <li>Undisclosed Angel Investors</li> <li>Vittoria Hub</li> </ul>	<ul style="list-style-type: none"> <li>Lokky offers a technology platform for the insurance sector that offers tailored products for small entrepreneurs. Designed and built by industry professionals, Lokky adopts new technologies to analyze customer requirements and understand their real insurance needs, automatically identifying the right products to manage business risks.</li> </ul>
10/5/2020	Lya Protect	0.65	0.65	<ul style="list-style-type: none"> <li>Kreaxi</li> <li>Undisclosed Angel Investors</li> </ul>	<ul style="list-style-type: none"> <li>Lya Protect is an InsurTech platform that accelerates the digital transformation of insurance brokers.</li> </ul>
10/6/2020	Unqork	207	367.2	<ul style="list-style-type: none"> <li>Aquiline Capital Partners</li> <li>BlackRock</li> <li>Blue Seed Collective</li> <li>Broadridge Financial Solutions</li> <li>capitalG</li> <li>Eldridge</li> <li>Fin Venture Capital</li> <li>Goldman Sachs</li> <li>GS Growth</li> <li>Hewlett Packard Enterprise</li> <li>Schonfeld Strategic Advisors</li> <li>Sunley House Capital Management</li> <li>Undisclosed Investors</li> <li>World Innovation Lab</li> </ul>	<ul style="list-style-type: none"> <li>Unqork is a no-code, software-as-a-service (SaaS) platform that digitizes the client life cycle and enables financial services and insurance companies to bring complex, regulated products to market without writing a single line of code. The company's patent-pending technology includes advanced calculations, decisions, UI design and workflow for risk assessment, and digitization layered on top of legacy IT systems.</li> </ul>
10/7/2020	+Simple	23.55	36.4	<ul style="list-style-type: none"> <li>Anthemis</li> <li>IDInvest Partners</li> <li>Mundi Ventures</li> <li>Olivier Duha</li> <li>OneRagtime</li> <li>Plug and Play Accelerator</li> <li>Rothschild Family</li> <li>Speedinvest</li> </ul>	<ul style="list-style-type: none"> <li>+Simple is a digital insurance broker dedicated to small and midsize enterprises and the self-employed.</li> </ul>
10/9/2020	Motoreto	0.24	0.24	<ul style="list-style-type: none"> <li>B4Motion Venture</li> <li>Cupido Capital</li> <li>Habichuelas</li> <li>Tom Horsey</li> <li>Undisclosed Angel Investors</li> </ul>	<ul style="list-style-type: none"> <li>Motoreto is a Spanish online car portal that helps users find and purchase used cars in Spain, as well as purchase insurance, and more.</li> </ul>
10/12/2020	Cover Genius	10.79	18	<ul style="list-style-type: none"> <li>Belfer Family</li> <li>Jasper Tans</li> <li>King River Capital</li> <li>Leap Capital</li> <li>Marinya Capital</li> <li>Regal Funds Management</li> </ul>	<ul style="list-style-type: none"> <li>Cover Genius offers a "full-stack" insurance distribution platform for mobility, retail, travel and shared-economy partners. The company's technologies include XCover, a distribution platform providing coverage for any line of insurance in any country, language and currency, and XClaims, an API for instant payment of approved claims, handling tens of thousands of instant claim payments in several currencies via a variety of payment methods.</li> </ul>
10/12/2020	Hedvig	9.08	23.52	<ul style="list-style-type: none"> <li>Cherry Ventures</li> <li>CommerzVentures</li> <li>D-Ax</li> <li>Nicklas Storakers</li> <li>Novax</li> <li>Obvious Ventures</li> <li>Philian Invest</li> <li>Sophia Bendz</li> <li>Sven Hagstromer</li> <li>Tacito Partners</li> </ul>	<ul style="list-style-type: none"> <li>Hedvig is a Swedish homeowners insurance provider that offers a mobile app aimed at simplifying the way users report damage and receive compensation.</li> </ul>
10/12/2020	Clearwater Analytics	-	-	<ul style="list-style-type: none"> <li>Dragoneer Investment Group</li> <li>Durable Capital Partners</li> <li>Permira</li> <li>Summit Partners</li> <li>Warburg Pincus</li> <li>Welsh Carson Anderson &amp; Stowe</li> </ul>	<ul style="list-style-type: none"> <li>Clearwater Analytics provides web-based investment accounting and portfolio reporting and analytics for corporate treasuries, insurance companies, asset managers and custody banks. Clearwater's daily-aggregated and reconciled solutions deliver the highest level of portfolio transparency available on the market today for clients such as Cisco Systems, Facebook, Netflix, Oracle, Starbucks and Yahoo!.</li> </ul>

Note: Blue font denotes current round investors.

## Q4 2020 InsurTech transactions – P&C

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
10/13/2020	DealerPolicy	20	51.5	<ul style="list-style-type: none"> <li>3L</li> <li>InsurTech NY</li> <li>MTech Capital</li> <li>Paycheck Protection Program</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>DealerPolicy enables car-buying customers the opportunity to purchase insurance by connecting them with licensed insurance agents while at the dealership or after they arrive home with their car. The company delivers these benefits through a combination of partnerships with car dealers, a growing insurance carrier network and access to licensed agents.</li> </ul>
10/15/2020	Nanyan Information	37.14	68.37	<ul style="list-style-type: none"> <li>BlueRun Ventures</li> <li>BOC International</li> <li>Cenova Ventures</li> <li>SIG Asia Investments</li> <li>Starr Companies</li> </ul>	<ul style="list-style-type: none"> <li>Nanyan Information is a Shanghai-based online insurance service company that operates 618 insurance platform, a platform that offers cloud architecture, cloud storage and cloud computing solutions for insurance companies.</li> </ul>
10/15/2020	Matic	24.5	31.5	<ul style="list-style-type: none"> <li>Anthemis</li> <li>Clocktower Technology Ventures</li> <li>Cultivation Capital</li> <li>Fenway Summer Ventures</li> <li>Franklin Madison</li> <li>IA Capital Group</li> <li>ManchesterStory Group</li> <li>Mr. Cooper</li> <li>MTech Capital</li> <li>National General Holdings</li> <li>Nationwide Ventures</li> <li>Plug and Play Accelerator</li> <li>Plug and Play Ventures</li> <li>Protect America</li> <li>The K Fund</li> </ul>	<ul style="list-style-type: none"> <li>Matic is a technology-driven insurance agency focused on helping lenders and loan officers better integrate homeowners insurance into the lending process.</li> </ul>
10/15/2020	Smartvid.io	5	23.9	<ul style="list-style-type: none"> <li>Alumni Ventures Group</li> <li>Autodesk</li> <li>Borealis Ventures</li> <li>Building Ventures</li> <li>Castor Ventures</li> <li>Companion Ventures</li> <li>Converge</li> <li>GPU Technology Conference</li> <li>IA Capital Group</li> <li>Launchpad Venture Group</li> <li>Paycheck Protection Program</li> <li>Plug and Play Accelerator</li> <li>Sony Innovation Fund</li> <li>Stage 1 Ventures</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Smartvid.io is a cloud-based media hosting platform that uses machine learning to help teams manage, collaborate and analyze industrial videos and photos.</li> </ul>
10/16/2020	HyperScience	80	189	<ul style="list-style-type: none"> <li>Acequia Capital</li> <li>Battery Ventures</li> <li>Bessemer Venture Partners</li> <li>Bond</li> <li>BoxGroup</li> <li>Dcode Accelerate</li> <li>Felicis Ventures</li> <li>FinTech Innovation Lab</li> <li>FirstMark Capital</li> <li>Gaingels</li> <li>Global Founders Capital</li> <li>Penna &amp; Company</li> <li>Plug and Play Accelerator</li> <li>Plug and Play Japan</li> <li>QBE Ventures</li> <li>Scott Belsky</li> <li>Shana Fisher</li> <li>Slow Ventures</li> <li>Stripes Group</li> <li>SV Angel</li> <li>TD Ameritrade</li> <li>Third Kind Venture Capital</li> <li>Tiger Global Management</li> </ul>	<ul style="list-style-type: none"> <li>HyperScience automates manual document processing for global financial services, insurance, health care and government organizations. Its proprietary solution classifies documents and extracts data. Structured data files are then sent downstream for processing, decreasing wasted manual effort, and increasing output and productivity.</li> </ul>

Note: Blue font denotes current round investors.

## Q4 2020 InsurTech transactions – P&C

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
10/19/2020	Sravni	-	-	<ul style="list-style-type: none"> <li>Baring Vostok Capital Partners</li> <li>Goldman Sachs</li> <li>Tinkoff Digital</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Sravni is the operator of a platform that allows users to compare financial products of Russian banks. The company provides a price comparison website where users can check banking and insurance prices. The mobile application also allows to check exchange rates, as well as locations of nearest bank offices and ATMs.</li> </ul>
10/20/2020	Newfront Insurance	100	100	<ul style="list-style-type: none"> <li>Argo Ventures</li> <li>Axel Springer Plug &amp; Play</li> <li>Founders Fund</li> <li>Meritech Capital Partners</li> </ul>	<ul style="list-style-type: none"> <li>Newfront Insurance is a modern commercial insurance brokerage. It combines brokers with time-saving technology to simplify insurance. Its brokers work alongside domain experts to deliver customized services. Its online application, customer portal, benchmarking, claims management, centralized billing and certificate automation eliminates hassle.</li> </ul>
10/20/2020	Dimpl	4.73	4.73	<ul style="list-style-type: none"> <li>Bpifrance</li> <li>Elaia Partners</li> <li>IDInvest Partners</li> </ul>	<ul style="list-style-type: none"> <li>Dimpl is an InsurTech company that specializes in reducing late payments.</li> </ul>
10/21/2020	Click2Sure	-	-	<ul style="list-style-type: none"> <li>AlphaCode</li> <li>Greenlight Capital Re</li> <li>SixThirty</li> <li>Team Africa Ventures</li> <li>Undisclosed Angel Investors</li> <li>Webber Wentzel Ignite Incubator</li> </ul>	<ul style="list-style-type: none"> <li>Click2Sure as a digital insurance broker has developed a range of specialized policies across a range of categories. Click2Sure has developed a range of APIs that enable cross-selling of product insurances directly at the point of sale. Its APIs integrate into the checkout process of e-commerce, traditional retail stores, via direct mailers, web/mobile interface and bundled policies attached to high-value items.</li> </ul>
10/21/2020	TPL Insurance	-	-	<ul style="list-style-type: none"> <li>DEG</li> </ul>	<ul style="list-style-type: none"> <li>TPL Insurance sells general insurance products directly to the consumer and is based in Pakistan.</li> </ul>
10/22/2020	Pier	14.5	22.1	<ul style="list-style-type: none"> <li>BTG Pactual</li> <li>Canary VC</li> <li>Mercado Livre</li> <li>Monashees+</li> </ul>	<ul style="list-style-type: none"> <li>Pier is a digital insurance distribution platform.</li> </ul>
10/22/2020	Confianza	1.2	1.2	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Confianza provides a single point of entry Application Architecture Solution for insurance providers to quickly assess risk rate and write policies.</li> </ul>
10/26/2020	Bewica	-	0.18	<ul style="list-style-type: none"> <li>Angel Academe</li> <li>FinTech Innovation Lab</li> <li>Innovate UK</li> </ul>	<ul style="list-style-type: none"> <li>Bewica offers comprehensive and affordable cyber insurance and risk assessment for small and midsize businesses.</li> </ul>
10/29/2020	Superscript	11	27.42	<ul style="list-style-type: none"> <li>Atami Capital</li> <li>Beazley</li> <li>Beazley Investments</li> <li>BGL Group</li> <li>Concentric</li> <li>EarlyMarket</li> <li>London Co-Investment Fund</li> <li>Nire Capital</li> <li>Seedcamp</li> <li>UK Future Fund</li> </ul>	<ul style="list-style-type: none"> <li>Superscript provides business insurance designed specifically to meet the fast-changing needs of small businesses.</li> </ul>
10/29/2020	Goodcover	7.5	9.5	<ul style="list-style-type: none"> <li>BoxGroup</li> <li>Broadhaven Capital Partners</li> <li>Fuel Capital</li> <li>Global Founders Capital</li> <li>Goodwater Capital</li> <li>Liquid 2 Ventures</li> <li>Transatlantic Holdings</li> <li>Undisclosed Angel Investors</li> <li>Y Combinator</li> </ul>	<ul style="list-style-type: none"> <li>Goodcover operates as a managing general agent, which means it writes the policy, sets the pricing and builds its own risk assessment model but partners with insurance carriers to hold the back-end capital and write on its book.</li> </ul>
10/29/2020	Steadily	3.7	3.7	<ul style="list-style-type: none"> <li>Matrix Partners</li> <li>Next Coast Ventures</li> <li>Nine Four Ventures</li> <li>SV Angel</li> </ul>	<ul style="list-style-type: none"> <li>Steadily offers landlord insurance for rental properties and protects against fire, water, theft and legal liability. Steadily is simple, fast and affordable landlord insurance.</li> </ul>
10/30/2020	VIPR	-	-	<ul style="list-style-type: none"> <li>Management Buyout (MBO)</li> <li>Tenzing Private Equity</li> </ul>	<ul style="list-style-type: none"> <li>VIPR is a provider of software solutions for the insurance market.</li> </ul>

Note: Blue font denotes current round investors.

## Q4 2020 InsurTech transactions – P&C

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
11/1/2020	Kover.ai	5	6.62	<ul style="list-style-type: none"> <li>Afore Capital</li> <li>Foundation Capital</li> <li>MetLife Digital Accelerator</li> <li>Techstars Ventures</li> <li>West Loop Ventures</li> </ul>	<ul style="list-style-type: none"> <li>Kover.ai creates autonomous insurance that runs at near-zero cost.</li> </ul>
11/1/2020	Linkage	0.13	0.13	<ul style="list-style-type: none"> <li>Y Combinator</li> </ul>	<ul style="list-style-type: none"> <li>Linkage provides an API that enables users to connect their payroll account with any app for income and employment verification. It helps in the prevention of fraud in insurance claims.</li> </ul>
11/2/2020	Marshmallow Financial Services	30	31.2	<ul style="list-style-type: none"> <li>Investec</li> <li>Outrun Ventures</li> <li>Passion Capital</li> <li>Simmons &amp; Simmons</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Marshmallow Financial Services is developing insurance products that aim to use better data and technology to provide more fairly priced insurance cover to non-U.K. nationals.</li> </ul>
11/3/2020	App Orchid	2.5	6.45	<ul style="list-style-type: none"> <li>Moneta Ventures</li> </ul>	<ul style="list-style-type: none"> <li>AppOrchid uses cognitive computing and next generation user experience as a means of providing multi-device apps across the enterprise value chain. Using data science, artificial intelligence and natural language interface, analysts can now develop powerful business apps and solutions with minimum IT oversight and governance. AppOrchid has put together an expansive ecosystem of customers, partners, developers and innovators to help build intelligent big data apps across enterprise functions.</li> </ul>
11/4/2020	Vouch Insurance	28.7	98.35	<ul style="list-style-type: none"> <li>500 Startups</li> <li>Index Ventures</li> <li>Ribbit Capital</li> <li>Silicon Valley Bank</li> <li>Y Combinator</li> </ul>	<ul style="list-style-type: none"> <li>Vouch Insurance offers start-ups with the technology, advice and risk-mitigating tools they need to thrive. The company offers an insurance product that integrates with business tools.</li> </ul>
11/4/2020	Betterlife	27.35	27.35	<ul style="list-style-type: none"> <li>Hopson</li> </ul>	<ul style="list-style-type: none"> <li>Betterlife is a company that uses technology to build an ecosystem; uses financial services and brokers as the core of the transaction; connects third parties and platforms; and solves real estate, home, automobile, medical, education, pension, finance, insurance and tourism for new middle-class families.</li> </ul>
11/4/2020	Assurely	3.7	5.07	<ul style="list-style-type: none"> <li>ATX Venture Partners</li> <li>Scout Ventures</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Assurely is a platform that creates and customizes insurance products for marketplaces. Assurely has developed an insurance product called CrowdProtector to protect investors on crowdfunding platforms.</li> </ul>
11/4/2020	Nayms	0.12	0.12	<ul style="list-style-type: none"> <li>NadFiFin</li> </ul>	<ul style="list-style-type: none"> <li>Nayms offers a smart contract platform for the placement, trade, reporting and settlement of insurance risk.</li> </ul>
11/5/2020	Ushur	25	37	<ul style="list-style-type: none"> <li>8VC</li> <li>Plug and Play Accelerator</li> <li>Plug and Play Ventures</li> <li>Third Point Ventures</li> </ul>	<ul style="list-style-type: none"> <li>Ushur is a service engagement platform that digitally transforms enterprise workflows by automating back-end processes and customer conversations. It is designed for high-contact industries such as insurance, logistics and financial services.</li> </ul>
11/5/2020	Eloa	5.9	7.37	<ul style="list-style-type: none"> <li>APRIL Group</li> <li>Undisclosed Angel Investors</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Eloa is a digital platform for the distribution of loans and insurance focused on customer relations.</li> </ul>
11/5/2020	Tidal Finance	-	1.95	<ul style="list-style-type: none"> <li>AU21</li> <li>Hypersphere</li> <li>Kenetic Capital</li> <li>KR1</li> <li>NGC Ventures</li> <li>QCP Capital</li> </ul>	<ul style="list-style-type: none"> <li>Tidal Finance is an open marketplace for programmable insurance building on Polkadot ecosystem.</li> </ul>
11/5/2020	Hydrogen	-	-	<ul style="list-style-type: none"> <li>EML FinLab</li> <li>MassChallenge</li> <li>MasterCard Start Path</li> <li>Plug and Play Accelerator</li> <li>Route 66 Ventures</li> </ul>	<ul style="list-style-type: none"> <li>Hydrogen provides a modular financial API platform that helps developers build and manage savings, investing, insurance and wellness applications.</li> </ul>
11/10/2020	Coherent	14	14	<ul style="list-style-type: none"> <li>Cathay Innovation</li> <li>Franklin Templeton</li> </ul>	<ul style="list-style-type: none"> <li>Coherent creates digital platforms and products that enable the insurance industry to be future-ready.</li> </ul>

Note: Blue font denotes current round investors.

## Q4 2020 InsurTech transactions – P&C

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
11/10/2020	Solstice Innovations	4.5	4.95	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Solstice Innovations is a Seattle, Washington-based online insurance platform.</li> </ul>
11/11/2020	Inspektlabs	–	0.6	<ul style="list-style-type: none"> <li>Barclays Accelerator</li> <li>Better Capital</li> <li>Chiratae Ventures</li> <li>Kunal Bahl</li> <li>Rohit Bansal</li> <li>Titan Capital</li> <li>Undisclosed Angel Investors</li> </ul>	<ul style="list-style-type: none"> <li>Inspektlabs uses inspection-as-a-service software to automate photo or video-based inspection of any asset using artificial intelligence. It primarily serves insurance, banking and e-commerce companies. The company's software enables companies to perform damage detection, damage assessment, asset valuation, claim assessment and fraud detection.</li> </ul>
11/11/2020	Insurance Samadhan	–	0.03	<ul style="list-style-type: none"> <li>Chiratae Ventures</li> <li>India Accelerator</li> <li>Venture Catalysts</li> </ul>	<ul style="list-style-type: none"> <li>Insurance Samadhan is a grievance redressal platform for insurance policyholders. The platform helps policyholders to resolve the genuine grievance of fraud selling, claim settlement and more.</li> </ul>
11/12/2020	FinChatBot	1.6	2.22	<ul style="list-style-type: none"> <li>Compass Capital</li> <li>Compass Venture Capital</li> <li>INV Fintech</li> <li>Kalon Venture Partners</li> <li>Richard Marsden</li> <li>Saviu Ventures</li> </ul>	<ul style="list-style-type: none"> <li>FinChatBot develops a chatbot platform, Holly, an artificial intelligence available on all platforms. FinChatBot aims to increase insurance companies' conversion rates while also gathering more information about their potential customers.</li> </ul>
11/13/2020	Mylo	11	39	<ul style="list-style-type: none"> <li>Guggenheim Partners</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Mylo is a trusted guide to the right insurance for small business and individual needs. With Mylo, users can compare plans tailored to their situation and budget, all in one convenient spot.</li> </ul>
11/13/2020	AssureGuru	0.1	0.1	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>AssureGuru is a digital insurance agency/broker that provides auto, home, landlord, rental, business, pet and umbrella insurance.</li> </ul>
11/17/2020	Turtlemint	30	61	<ul style="list-style-type: none"> <li>American Family Ventures</li> <li>Blume Ventures</li> <li>Dream Incubator</li> <li>GGV Capital</li> <li>MassMutual Ventures</li> <li>Nexus Venture Partners</li> <li>Sequoia Capital India</li> <li>SIG Capital</li> <li>Trifecta Capital</li> </ul>	<ul style="list-style-type: none"> <li>Turtlemint is an online insurance seller that offers motorcycle insurance from various providers, allowing users to compare different plans.</li> </ul>
11/17/2020	Bdeo	5.94	7.07	<ul style="list-style-type: none"> <li>Big Sur Ventures</li> <li>BlackFin Capital Partners</li> <li>F10 FinTech Incubator &amp; Accelerator</li> <li>K Fund</li> <li>South Summit</li> <li>Startupbootcamp FinTech</li> </ul>	<ul style="list-style-type: none"> <li>Bdeo leverages artificial intelligence to digitize the interaction between insurance companies and policyholders, offering a comprehensive solution that spans from automatic policy subscription to the digitalization of claims management through automatic damage detection.</li> </ul>
11/17/2020	Multiverse Computing	1.78	1.78	<ul style="list-style-type: none"> <li>EASO Ventures</li> <li>Mondragon Ventures</li> <li>Penja Strategy</li> <li>Quantonation</li> <li>Seed Gipuzkoa</li> </ul>	<ul style="list-style-type: none"> <li>Multiverse Computing provides hyper-efficient software for companies wanting to gain an edge with quantum computing and artificial intelligence.</li> </ul>
11/18/2020	Flyreel	10	16	<ul style="list-style-type: none"> <li>Donan Engineering</li> <li>Gradient Ventures</li> <li>Guidewire Software</li> <li>IA Capital Group</li> <li>Rev1 Ventures</li> <li>State Auto Labs</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Flyreel has developed an AI-assisted underwriting solution for commercial and residential properties.</li> </ul>
11/19/2020	Neodigital	–	–	<ul style="list-style-type: none"> <li>ALSTIN Capital</li> <li>Coparion</li> <li>Deutsche Rückversicherung</li> <li>Elevat3 Capital</li> <li>SchneiderGolling &amp; Cie</li> </ul>	<ul style="list-style-type: none"> <li>Neodigital is an online insurance portal that distributes private liability, accident and household products via independent brokers in Germany.</li> </ul>

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## Q4 2020 InsurTech transactions – P&C

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
11/24/2020	Hippo	350	709	<ul style="list-style-type: none"> <li>Bond</li> <li>Christopher Hill</li> <li>Comcast Ventures</li> <li>Dragoneer Investment Group</li> <li>Felicitas Ventures</li> <li>Fifth Wall Ventures</li> <li>FinTLV</li> <li>GGV Capital</li> <li>Hillhouse Capital Management</li> <li>Horizons Ventures</li> <li>ICONIQ Capital</li> <li>Innovius Capital</li> <li>Jacob Gibson</li> <li>Josh Stench</li> <li>Lennar</li> <li>Lennar Ventures</li> <li>Louis Beryl</li> <li>Mark Lefanowicz</li> <li>Matt Humphrey</li> <li>Michael Ovitz</li> <li>Mitsui Sumitomo Insurance Venture Capital</li> <li>Moderne Ventures</li> <li>Munich Re Ventures</li> <li>Pete Flint</li> <li>Pipeline Capital Partners</li> <li>Plug and Play Ventures</li> <li>Propel Venture Partners</li> <li>Ramtin Naimi</li> <li>Ribbit Capital</li> <li>RPM Ventures</li> <li>Sinai Ventures</li> <li>Soo Boon Koh</li> <li>Standard Industries</li> <li>Warren Hogarth</li> <li>Zeev Ventures</li> </ul>	<ul style="list-style-type: none"> <li>Hippo offers intuitive and proactive home insurance by using data, like municipal building records, and technology, such as satellite imagery and smart home devices, to streamline the quoting and onboarding experience, for such products as protection for possessions like appliances, consumer electronics and home offices.</li> </ul>
11/24/2020	Novidea	15	15	<ul style="list-style-type: none"> <li>2B Angels</li> <li>JAL Ventures</li> <li>KT Squared</li> <li>Salesforce Ventures</li> </ul>	<ul style="list-style-type: none"> <li>Novidea is a data-driven platform provider for the insurance industry. Novidea's end-to-end platform provides real-time business intelligence and seamless workflow management for brokers, agents, managing general agents, bancassurance and corporate risk management.</li> </ul>
11/24/2020	InsurAce	1	1	<ul style="list-style-type: none"> <li>DeFiance Capital</li> <li>Hashed</li> <li>Huobi DeFi Labs</li> <li>LuneX Ventures</li> <li>ParaFi Capital</li> <li>Signum Capital</li> </ul>	<ul style="list-style-type: none"> <li>InsurAce is a decentralized insurance protocol, aiming to provide reliable, robust and carefree DeFi insurance services to the DeFi users, with a very low premium and sustainable investment returns.</li> </ul>
11/24/2020	OneShield	–	6.3	<ul style="list-style-type: none"> <li>Bain Capital Credit</li> <li>Earlybird Venture Capital</li> <li>KKR</li> <li>Pacific Lake Partners</li> <li>Psilog Group</li> </ul>	<ul style="list-style-type: none"> <li>OneShield delivers core business software solutions to the global P&amp;C and general insurance industry. The company's portfolio of products includes enterprise-class policy management, billing, rating, product configuration, and reporting and analytic solutions that leverage a tool-based open architecture and single data model platform to streamline your business. OneShield Insurance Software automates and simplifies the complexities of core systems with targeted solutions, seamless upgrades and collaborative implementations.</li> </ul>
11/25/2020	Cobertoo	–	0.02	<ul style="list-style-type: none"> <li>Helvetia Venture Fund</li> <li>Startupbootcamp FinTech &amp; Cybersecurity</li> </ul>	<ul style="list-style-type: none"> <li>Cobertoo offers mobile phone insurance plans with a charity donation component to monthly fees.</li> </ul>
11/29/2020	Ignatica	–	–	<ul style="list-style-type: none"> <li>Chinaccelerator</li> <li>SOSV</li> </ul>	<ul style="list-style-type: none"> <li>Ignatica empowers multinational, regional and digital insurers to define their future success with speed, agility and intelligence. By removing the product launch and policy administration burdens, Ignatica enables clients to create more niche and cost-effective products, shift their resources to acquiring new customers and make sure all their customers are satisfied.</li> </ul>

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## Q4 2020 InsurTech transactions – P&C

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
11/30/2020	Justsafe	–	1.61	<ul style="list-style-type: none"> <li>Addor Capital</li> <li>BOC International</li> <li>Lingang Technology Investment</li> <li>Ningbo Phoenix Venture Capital</li> <li>PreAngel</li> <li>Puhua Capital</li> <li>Shenzhen Capital Group</li> <li>Xinghong Asset Management</li> </ul>	<ul style="list-style-type: none"> <li>Justsafe specializes in IoT and terminal security solutions for banks, insurance companies, energy, governments and other industries.</li> </ul>
12/1/2020	Energi	2.15	34.93	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Energi is a provider of specialized insurance programs to targeted sectors of the energy industry in the United States and Canada. The company's core insurance programs provide traditional property &amp; casualty insurance coverage and related risk management services. Its specialized insurance risk management expertise in the energy sector enables the company to provide differentiated safety, loss prevention and claims management services.</li> </ul>
12/7/2020	Luko	60	84.44	<ul style="list-style-type: none"> <li>Accel</li> <li>Assaf Wand</li> <li>Bruno Rousset</li> <li>eFounders</li> <li>EQT Ventures</li> <li>Founders Fund</li> <li>Kima Ventures</li> <li>Mundi Lab</li> <li>Munich RE</li> <li>Orange Ventures</li> <li>Speedinvest</li> </ul>	<ul style="list-style-type: none"> <li>Luko offers home insurance through an online platform. The company aims to circumvent the need to make a claim in the first place using sensors, data and machine learning.</li> </ul>
12/7/2020	simpleurance	18.21	87.51	<ul style="list-style-type: none"> <li>Allianz X</li> <li>Born2Grow</li> <li>Fines Holding</li> <li>German Startups Group</li> <li>Groger Management</li> <li>Ilgner.Leeheim.de</li> <li>KfW</li> <li>Mountain Partners</li> <li>ODDO BHF</li> <li>Rakuten Ventures</li> <li>Rheingau Founders</li> <li>Route 66 Ventures</li> <li>Tokio Marine Holdings</li> </ul>	<ul style="list-style-type: none"> <li>simpleurance is an eCommerce provider for product insurances, enabling customers to buy products online and purchase corresponding insurance coverage at the checkout. The company's solutions enable cross-selling of product insurances directly at the point of sale in eCommerce, and integrates into the checkout process of online shops to offer a one-click experience for customers.</li> </ul>
12/7/2020	Apollo Agriculture	3.57	11.71	<ul style="list-style-type: none"> <li>Accion Venture Lab</li> <li>Anthemis</li> <li>Flourish Ventures</li> <li>FMO</li> <li>Leaps by Bayer</li> <li>Mastercard Foundation</li> <li>Newid Capital</li> <li>Rabobank</li> <li>To Ventures Food</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Apollo helps farmers in emerging markets increase their profits. The company uses agronomic machine learning, remote sensing and mobile technology to help farmers access credit, high-quality farm inputs and customized advice.</li> </ul>
12/8/2020	At-Bay	34	87	<ul style="list-style-type: none"> <li>Acrew Capital</li> <li>Khosla Ventures</li> <li>Lightspeed Venture Partners</li> <li>LocalGlobe</li> <li>M12</li> <li>Munich Re Ventures</li> <li>Qumra Capital</li> <li>Shlomo Kramer</li> </ul>	<ul style="list-style-type: none"> <li>At-Bay is an insurance company for the digital age. At-Bay combines security and insurance expertise to deliver better insurance products and security services to its clients.</li> </ul>

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## Q4 2020 InsurTech transactions – P&C

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
12/8/2020	GetSafe	30	58	<ul style="list-style-type: none"> <li>Acton Capital Partners</li> <li>Apollo Capital</li> <li>btoV Partners</li> <li>Capnamic Ventures</li> <li>CommerzVentures</li> <li>Earlybird Venture Capital</li> <li>German Accelerator Tech</li> <li>Global Founders Capital</li> <li>HW Capital</li> <li>iptiQ</li> <li>Iris Capital</li> <li>Marcus Wolsdorf</li> <li>Partech Partners</li> <li>Robert Haselsteiner</li> <li>Rocket Internet</li> <li>Saarbruecker21</li> <li>Swiss Reinsurance Company</li> </ul>	<ul style="list-style-type: none"> <li>Getsafe is an InsurTech start-up from Heidelberg using technology and AI to help people identify, organize and protect what they care most about in life. With a few clicks, customers can learn about, buy and manage insurance on their smartphone.</li> </ul>
12/8/2020	Battleface	12	12	<ul style="list-style-type: none"> <li>Drive Capital</li> <li>Fintech Ventures Fund</li> <li>Greenlight Re Innovations</li> <li>Tangiers Group</li> </ul>	<ul style="list-style-type: none"> <li>Battleface specializes in insurance services for travel to remote, unstable or dangerous parts of the world. The company's tech-driven platform is designed to service a growing number of contractors, explorers, journalists, humanitarian workers, freelancers and similar who are underserved by traditional insurance solutions.</li> </ul>
12/10/2020	Mioo Cycling	0.82	0.82	<ul style="list-style-type: none"> <li>41an Invest</li> <li>Fredrik Åhlberg</li> <li>Johan Attby</li> <li>Jon Wimmercraz</li> <li>Kimmo Björnsson</li> <li>Per Emanuelsson</li> </ul>	<ul style="list-style-type: none"> <li>Mioo has developed a consumer service for bike service and insurance on a subscription model for users and a marketplace for suppliers.</li> </ul>
12/12/2020	Aerobotics	–	12.7	<ul style="list-style-type: none"> <li>#cocreateSA</li> <li>4Di Capital</li> <li>AgFunder</li> <li>AngelList</li> <li>FMO</li> <li>Google for Startups Accelerator</li> <li>Naspers</li> <li>Nedbank Capital</li> <li>Paper Plane Ventures</li> <li>Proparco</li> <li>Savannah Fund</li> <li>Startupbootcamp InsurTech</li> <li>VivaTech</li> <li>XL Africa</li> </ul>	<ul style="list-style-type: none"> <li>Aerobotics is a data analytics company, making use of aerial imagery and machine learning algorithms to solve specific problems in multiple industries, namely agriculture, agri-insurance and mining.</li> </ul>
12/14/2020	PLNAR	3.5	11	<ul style="list-style-type: none"> <li>Capital Factory</li> <li>Central Texas Angel Network</li> <li>Colopl Next</li> <li>Dallas Venture Partners (DVP)</li> <li>Fraser McCombs Capital</li> <li>Holt Ventures</li> <li>ManchesterStory Group</li> <li>MicroVentures Marketplace</li> <li>Paycheck Protection Program</li> <li>Plug and Play Accelerator</li> <li>The Venture Reality Fund</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>PLNAR generates fully measured 3D models of any room in real-time. PLNAR's virtual claim solution helps insurance carriers settle small property claims faster, by enabling adjusters to be more productive and by facilitating the migration of the carrier to a desk claims model.</li> </ul>
12/14/2020	hokan	2.4	4.25	<ul style="list-style-type: none"> <li>500 Accelerator</li> <li>500 Startups</li> <li>Archetype Ventures</li> <li>BEENEXT</li> <li>MID Venture Capital</li> <li>Plug and Play Japan</li> <li>Saison Ventures</li> <li>Sansan</li> <li>Sony Innovation Fund</li> </ul>	<ul style="list-style-type: none"> <li>ALLINS is the developer of hokan, an AI-powered tool that can analyze insurance policies and offer recommendations. Users just need to upload photos of contracts and documents, and the program automatically digitizes the information and feeds that into the software. In turn, the tool can create charts, graphs and other visual representations of the provided data.</li> </ul>

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## Q4 2020 InsurTech transactions – P&C

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
12/16/2020	B3i Services	–	26.27	<ul style="list-style-type: none"> <li>Achmea</li> <li>Aegon</li> <li>Africa Re</li> <li>Ageas</li> <li>Allianz</li> <li>AXA XL</li> <li>China Pacific Insurance</li> <li>Deutsche Rückversicherung</li> <li>Generali Group</li> <li>Hannover Re</li> <li>IRB Brasil Resseguros</li> <li>Liberty Mutual Group</li> <li>MAPFRE</li> <li>Munich RE</li> <li>SBI Investment</li> <li>SCOR Global P&amp;C</li> <li>Swiss Reinsurance Company</li> <li>Tokio Marine Holdings</li> <li>Turk Reasurans</li> <li>Undisclosed Investors</li> <li>Vienna Insurance Group</li> <li>Zurich Insurance Group</li> </ul>	<ul style="list-style-type: none"> <li>B3i Services provides insurance solutions on a blockchain platform offering opportunities for efficiency, growth and quality across the value chain to benefit all participants including end customers.</li> </ul>
12/17/2020	Openly	40	62.77	<ul style="list-style-type: none"> <li>Advance Venture Partners</li> <li>Gradient Ventures</li> <li>Greenlight Re Innovations</li> <li>Hanover Insurance International Holdings</li> <li>Obvious Ventures</li> <li>PJC</li> <li>Plug and Play Accelerator</li> <li>Techstars</li> <li>Techstars Ventures</li> </ul>	<ul style="list-style-type: none"> <li>Openly offers an insurer platform selling modern products through independent agents.</li> </ul>
12/21/2020	Qualia	65	160.18	<ul style="list-style-type: none"> <li>8VC</li> <li>Barry Sternlicht</li> <li>Bienville Capital</li> <li>Clocktower Technology Ventures</li> <li>Formation 8</li> <li>Menlo Ventures</li> <li>Tiger Global Management</li> </ul>	<ul style="list-style-type: none"> <li>Qualia is a digital real estate closing technology company that provides the infrastructure to streamline the home closing experience. The company offers a suite of products that brings together buyers, sellers, lenders, title, escrow and real estate agents onto a secure, shared platform.</li> </ul>
12/21/2020	XILO	2	2.05	<ul style="list-style-type: none"> <li>Acceleprise</li> <li>Act One Ventures</li> <li>New Stack</li> </ul>	<ul style="list-style-type: none"> <li>XILO eliminates data entry for insurance agencies by auto-populating client data and integrating data into your insurance AMS, Rater, CRM and Acord Forms.</li> </ul>
12/22/2020	GloveBox	0.15	0.15	<ul style="list-style-type: none"> <li>Plug and Play Accelerator</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>GloveBox is a centralized mobile and web application allowing insurance policyholders to access their policy documents, pay a bill, initiate a claim and so much more regardless of which carrier their policies are written with. The company strives to enhance the customer experience for the insurance client while reducing service costs and increasing overhead for both agencies and carriers.</li> </ul>
12/23/2020	Tidal Finance	1.95	1.95	<ul style="list-style-type: none"> <li>AU21</li> <li>HiperSfera</li> <li>Kenetic Capital</li> <li>KR1</li> <li>NGC Ventures</li> <li>QCP Capital</li> </ul>	<ul style="list-style-type: none"> <li>Tidal Finance is an open marketplace for programmable insurance building on Polkadot ecosystem.</li> </ul>
12/23/2020	Covie Systems	0.11	0.11	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Covie Systems makes insurance data more accessible and easier to work with by empowering the next class of innovative builders to craft a better experience around insurance, eliminate inefficiencies and effectively manage risks.</li> </ul>
12/23/2020	Chico Data	–	–	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Chico Data is a data and risk control platform service-oriented insurance technology service provider.</li> </ul>

Note: Blue font denotes current round investors.

## Q4 2020 InsurTech transactions – L&H

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
1/0/1900	Integrity Life of Australia	30.8	40.77	<ul style="list-style-type: none"> <li>Daido Life Insurance Company</li> <li>Leadenhall Capital</li> <li>Schroders</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Integrity Life of Australia is an insurance group dedicated to making life insurance what it should be.</li> </ul>
10/13/2020	DeadHappy	3.53	8.45	<ul style="list-style-type: none"> <li>e.ventures</li> <li>Octopus Ventures</li> <li>Seedrs</li> </ul>	<ul style="list-style-type: none"> <li>DeadHappy is an InsurTech company that aims to remove the taboo surrounding death by offering more flexible life insurance policies.</li> </ul>
10/14/2020	Osmind	2	2.2	<ul style="list-style-type: none"> <li>20 20 Fund</li> <li>Alice Zhang</li> <li>General Catalyst</li> <li>Jeffery Leiden</li> <li>Pear</li> <li>Undisclosed Angel Investors</li> <li>What If Ventures</li> <li>Y Combinator</li> </ul>	<ul style="list-style-type: none"> <li>Osmind wants to use its practice management and monitoring software to help mental health professionals deliver care to at-risk underserved populations. It provides anonymized insights for pharma/insurance companies to ensure that these treatments are effective.</li> </ul>
10/21/2020	Nava	20	20	<ul style="list-style-type: none"> <li>Thrive Capital</li> </ul>	<ul style="list-style-type: none"> <li>Nava is a new kind of benefits brokerage on a mission to bring high-quality, affordable health care to all Americans. Built by a cross-functional team of technology, insurance and employee benefits experts, Nava combines modern health care tools, year-round employee advocacy and ongoing measurement to deliver effective plans.</li> </ul>
10/21/2020	Groove Health	0.21	1.81	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Groove Health provides a digital platform for health insurance companies, hospital systems and self-insured employers to improve medication adherence using predictive analytics and personalized patient engagement.</li> </ul>
10/21/2020	Bind Benefits	105	248	<ul style="list-style-type: none"> <li>Ascension Ventures</li> <li>Lemhi Ventures</li> <li>Undisclosed Investors</li> <li>UnitedHealth Group</li> </ul>	<ul style="list-style-type: none"> <li>Bind delivers a new, condition-first health plan design that creates an intuitive fit between people's health insurance and the way they actually use health care. Through the unique Bind design and experience, users see their treatment options, compare costs, choose the most cost-effective pathway and can add coverage as needs change.</li> </ul>
10/22/2020	Junling Health	–	–	<ul style="list-style-type: none"> <li>Sherpa Venture Capital</li> </ul>	<ul style="list-style-type: none"> <li>Junling Health is a third-party insurance technology and risk control service company.</li> </ul>
10/26/2020	Truth4Life	0.3	0.3	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Truth4Life offers a prepaid debit card with no credit check and up to US\$10,000 of life insurance included.</li> </ul>
10/28/2020	Fabric Technologies	0.13	0.71	<ul style="list-style-type: none"> <li>Bessemer Venture Partners</li> <li>BoxGroup</li> <li>Brainchild Holdings</li> <li>CNO Financial Group</li> <li>Guardian Life Insurance Company of America</li> <li>Maveron</li> <li>Nippon Life Insurance</li> <li>Paycheck Protection Program</li> <li>Red Sea Ventures</li> <li>RGAx</li> <li>Samsung Ventures</li> <li>Securian Ventures</li> <li>Silicon Valley Bank</li> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Fabric is a digital insurance company that sells life, accident and health insurance products.</li> </ul>
11/1/2020	GroMo	0.13	0.71	<ul style="list-style-type: none"> <li>Ramakant Sharma</li> <li>Utsav Somani</li> <li>Y Combinator</li> </ul>	<ul style="list-style-type: none"> <li>GroMo provides access to financial products such as loans, insurance and investments to the underserved cities through a digitally enabled social commerce model.</li> </ul>
11/2/2020	vlot	1.1	1.11	<ul style="list-style-type: none"> <li>Kickstart Accelerator</li> <li>Plug and Play Accelerator</li> <li>SixThirty</li> <li>Spicehaus Partners</li> </ul>	<ul style="list-style-type: none"> <li>vlot is a B2B2C platform opening up an agile and integrated world of risk analysis, coverage and life planning.</li> </ul>

Note: Blue font denotes current round investors.

## Q4 2020 InsurTech transactions – L&H

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
11/11/2020	Turaco	2	3.3	<ul style="list-style-type: none"> <li>Catalyst Fund</li> <li>GAN Ventures</li> <li>Mercy Corps</li> <li>Musha Ventures</li> <li>Novastar Ventures</li> <li>Undisclosed Angel Investors</li> <li>Villgro Kenya</li> <li>Zephyr Acorn</li> </ul>	<ul style="list-style-type: none"> <li>Turaco offers health loans bundled with insurance. It ensures that their clients can get care whenever a medical emergency arises.</li> </ul>
11/12/2020	QantEv	1.78	1.78	<ul style="list-style-type: none"> <li>Elaia Partners</li> <li>Entrepreneur First</li> <li>Investisseurs &amp; Partenaires</li> </ul>	<ul style="list-style-type: none"> <li>QantEv optimizes provider networks for health insurers.</li> </ul>
11/17/2020	ArthurAI	15	18.3	<ul style="list-style-type: none"> <li>Acrew Capital</li> <li>AME Ventures</li> <li>Homebrew</li> <li>Hunter Walk</li> <li>Index Ventures</li> <li>Jerry Yang</li> <li>Plexo Capital</li> <li>Undisclosed Investors</li> <li>Work-Bench</li> </ul>	<ul style="list-style-type: none"> <li>ArthurAI partners with the companies in industries such as financial services, insurance and health care to develop and deploy enterprise-grade artificial intelligence (AI) systems. It specializes in centralized AI monitoring and explainability and helping businesses build and maintain control over production AI.</li> </ul>
11/18/2020	Everyday Life Insurance	0.12	0.12	<ul style="list-style-type: none"> <li>InsurTech NY</li> <li>Techstars</li> </ul>	<ul style="list-style-type: none"> <li>Everyday Life Insurance uses technology to make life insurance smarter and more inclusive.</li> </ul>
11/18/2020	Stride Health	–	50.68	<ul style="list-style-type: none"> <li>DCM Ventures</li> <li>F-Prime Capital</li> <li>Kleiner Perkins Caufield &amp; Byers</li> <li>Mayo Clinic</li> <li>Moderne Ventures</li> <li>Mohr Davidow Ventures</li> <li>New Enterprise Associates</li> <li>Paycheck Protection Program</li> <li>Portag3 Ventures</li> <li>Rock Health</li> <li>Venrock</li> </ul>	<ul style="list-style-type: none"> <li>Stride Health is a health insurance recommendation engine. Stride Health quickly builds a health profile for each patient, then delivers a financial forecast for their "health year." Stride's algorithm then filters to find a recommendation with preferred doctors, prescription drugs and even the clinical efficacy of all of the doctors included.</li> </ul>
11/20/2020	PlumHQ	4.04	4.97	<ul style="list-style-type: none"> <li>Abhijit Gupta</li> <li>Alvin Tse</li> <li>AngelList</li> <li>Gemba Capital</li> <li>Incubate Fund India</li> <li>Nitin Jayakrishnan</li> <li>Ram Sahasranam</li> <li>Sudheendra Chilappagari</li> <li>Surge</li> <li>Tanglin Venture Partners</li> <li>Tracxn Labs</li> <li>Undisclosed Angel Investors</li> </ul>	<ul style="list-style-type: none"> <li>PlumHQ offers an online platform that provides employers and employees with customizable health insurance plans, pricing and health care experience.</li> </ul>

Note: Blue font denotes current round investors.

## Q4 2020 InsurTech transactions – L&H

Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
11/23/2020	Waterdrop	150	630.25	<ul style="list-style-type: none"> <li>BlueRun Ventures</li> <li>Boyu Capital</li> <li>China Capital Investment Group</li> <li>Chuxin Capital Partners</li> <li>Cosun Venture Capital</li> <li>DianLiang Capitals</li> <li>Gaorong Capital</li> <li>IDG Capital</li> <li>Meituan Dianping</li> <li>Sinovation Ventures</li> <li>Swiss Reinsurance Company</li> <li>Tencent Holdings</li> <li>Yuri Milner</li> <li>ZhenFund</li> </ul>	<ul style="list-style-type: none"> <li>Waterdrop, also known as Shuidi Huzhu, is an insurance platform that plans to solve the problem of high medical fees faced by most patients, especially those with a critical illness. When a user is diagnosed with a serious disease like cancer, the platform will crowdfund the medical fees from all of its users.</li> </ul>
11/30/2020	MyRealPlan	4.4	7.82	<ul style="list-style-type: none"> <li>Capstone Partners</li> <li>Hana Financial Investment</li> <li>Hancom Investment</li> <li>InterVest</li> <li>Mirae Asset Venture Investment</li> <li>SBI Investment Korea</li> <li>TheVentures</li> <li>TIPS Program</li> <li>Woori Technology Investment</li> </ul>	<ul style="list-style-type: none"> <li>MyRealPlan is an online to offline platform that connects users to insurance plans and companies using data-based algorithms, helping them to receive personalized insurance coverage.</li> </ul>
12/1/2020	OneSpark Insurance	–	–	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>OneSpark provides tech-based insurance products for the main market. The company has developed proprietary tech across the business while leveraging off a number of established SaaS companies to optimize processes.</li> </ul>
12/7/2020	Centivo	34	68	<ul style="list-style-type: none"> <li>B Capital Group</li> <li>Bain Capital Ventures</li> <li>Bessemer Venture Partners</li> <li>Company</li> <li>Company Ventures</li> <li>Define Ventures</li> <li>F-Prime Capital</li> <li>HarbourVest Partners</li> <li>Ingleside Investors</li> <li>Jim Foreman</li> <li>Ken Goulet</li> <li>Kevin Hill</li> <li>Maverick Ventures</li> <li>Nassau Street Ventures</li> <li>Oxeon Partners</li> <li>Rand Capital</li> <li>Undisclosed Angel Investors</li> </ul>	<ul style="list-style-type: none"> <li>Centivo is a new type of self-funded health plan built specifically for employers and their employees and families. Centivo targets zero health care trend and improved health care outcomes by rewarding members and providers for smart choices and actions while delivering an exceptional member experience.</li> </ul>
12/7/2020	Laguna Health	6.6	6.6	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> </ul>	<ul style="list-style-type: none"> <li>Laguna Health is a digital health insurance company helping people realize their recovery potential.</li> </ul>

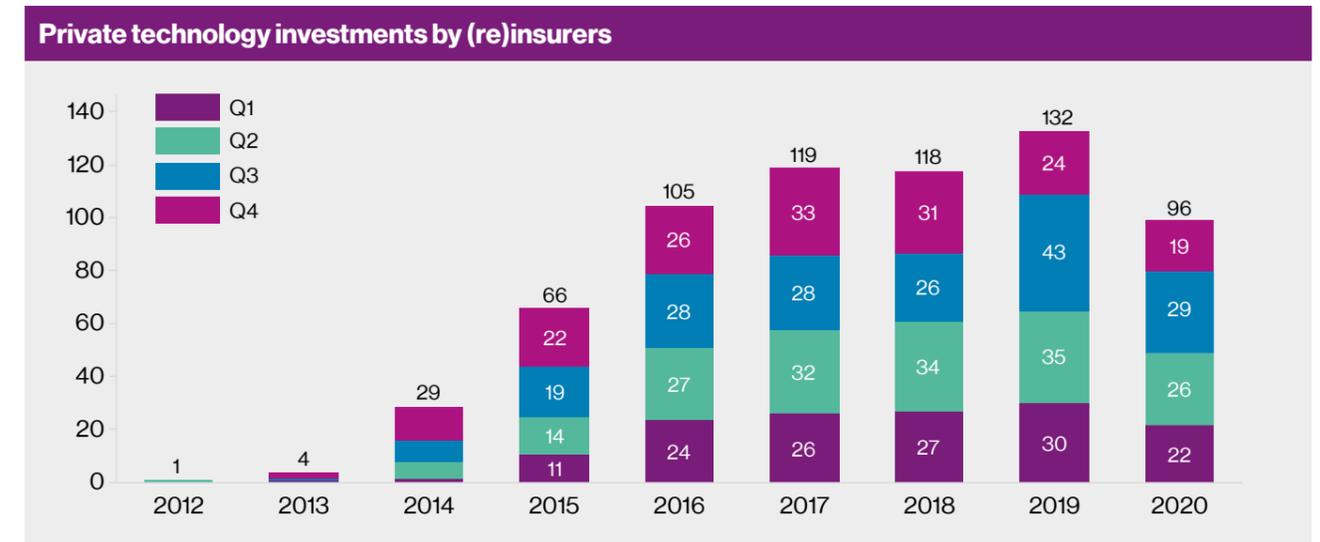
Note: Blue font denotes current round investors.

## Q4 2020 InsurTech transactions – L&H

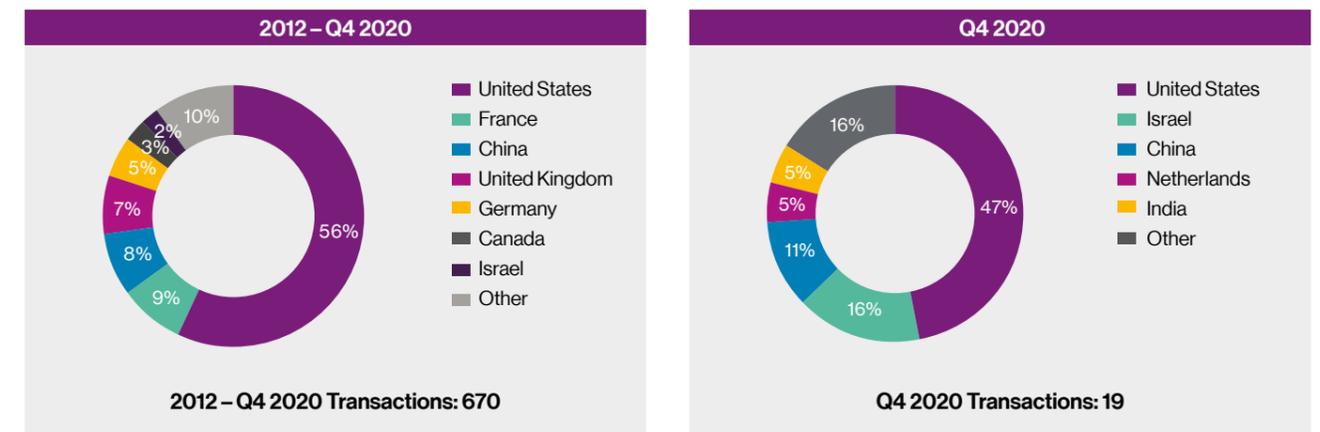
Date	Company	Funding (US\$M)		Investor(s)	Description
		Round	Total		
12/10/2020	Hibob	70	115	<ul style="list-style-type: none"> <li>Arbor Ventures</li> <li>Battery Ventures</li> <li>Bessemer Venture Partners</li> <li>Cerca Partners</li> <li>Eight Roads Ventures</li> <li>Entree Capital</li> <li>Israel Growth Partners</li> <li>LocalGlobe</li> <li>Perpetual Capital Partners</li> <li>Presidio Ventures</li> <li>SEEK</li> <li>Sumitomo Corporation</li> <li>Taavet Hinrikus</li> </ul>	<ul style="list-style-type: none"> <li>Hibob, aka bob, is a cloud-based system that integrates human resources, benefits, pension, auto-enrollment and data in one secure online data storage platform. The company's platform improves the workflow of managing and engaging employees, saving hours of administration. The company has offices in Tel Aviv, London and New York.</li> </ul>
12/16/2020	Bestow	70	138.1	<ul style="list-style-type: none"> <li>8VC</li> <li>Breyer Capital</li> <li>Core Innovation Capital</li> <li>Morpheus Ventures</li> <li>New Enterprise Associates</li> <li>Sammons Financial</li> <li>Undisclosed Investors</li> <li>Valar Ventures</li> </ul>	<ul style="list-style-type: none"> <li>Bestow is a full-stack insurance technology company that builds products and software that make life insurance accessible to millions of families. In addition to its direct-to-consumer arm, Bestow provides industry-first APIs enabling partners to offer customized life insurance coverage to their customers.</li> </ul>
12/17/2020	Oscar Health	140	1632.5	<ul style="list-style-type: none"> <li>8VC</li> <li>Alphabet</li> <li>Baillie Gifford &amp; Co.</li> <li>BoxGroup</li> <li>Brainchild Holdings</li> <li>Breyer Capital</li> <li>Brian Singerman</li> <li>capitalG</li> <li>Coatue Management</li> <li>Darwin Ventures</li> <li>Dragoneer Investment Group</li> <li>Fidelity Investments</li> <li>Formation 8</li> <li>Founders Fund</li> <li>General Catalyst</li> <li>Goldman Sachs</li> <li>Google Ventures</li> <li>Horizons Ventures</li> <li>Khosla Ventures</li> <li>Lakestar</li> <li>Ping An Ventures</li> <li>Red Swan Ventures</li> <li>Reinvent VC</li> <li>Stanley Druckenmiller</li> <li>SV Angel</li> <li>Thrive Capital</li> <li>Tiger Global Management</li> <li>Undisclosed Angel Investors</li> <li>Verily Life Sciences</li> <li>Wellington Management</li> </ul>	<ul style="list-style-type: none"> <li>Oscar is a technology-driven, consumer-focused, health insurance company using technology and personalized service to give members transparency into the health care system and empower them to choose quality, affordable care. The Oscar member experience includes a personalized concierge team that helps members do everything from finding a doctor to processing a claim; a 24/7 Doctor on Call service for members on the go; and an integrated, curated network of physicians and hospitals.</li> </ul>
1/0/1900	Curacel	-	0.04	<ul style="list-style-type: none"> <li>Consonance Investment Managers</li> <li>Dubai100</li> <li>Facebook Accelerator</li> <li>Google for Startups Accelerator</li> <li>Kepple Africa Ventures</li> <li>Startupbootcamp AfriTech</li> </ul>	<ul style="list-style-type: none"> <li>Curacel works with African insurers to reduce fraudulent payouts and increase the efficiency of their claims processes. The company's solution has applicability per the company in health, auto and travel insurance.</li> </ul>
12/24/2020	Baoxian Chacha	1.53	2.94	<ul style="list-style-type: none"> <li>Undisclosed Investors</li> <li>Zhongjin Huicai Investment Management</li> </ul>	<ul style="list-style-type: none"> <li>Baoxian Chacha, developed by Fengping Technology, is a third-party online platform that provides insurance product comparison, planning, reviews, interpretation and customization.</li> </ul>
12/31/2020	Betterfly	9	17.5	<ul style="list-style-type: none"> <li>Albatross Capital</li> <li>Grupo Prisma</li> <li>Katapult Impact</li> <li>QED Investors</li> <li>Start-Up Chile</li> </ul>	<ul style="list-style-type: none"> <li>Betterfly, formerly Burn to Give, is a digital health and Insur Tech company that uses data science and machine learning to automatically track and reward individual good habits with no-cost life insurance coverage and charitable donations.</li> </ul>

Note: Blue font denotes current round investors.

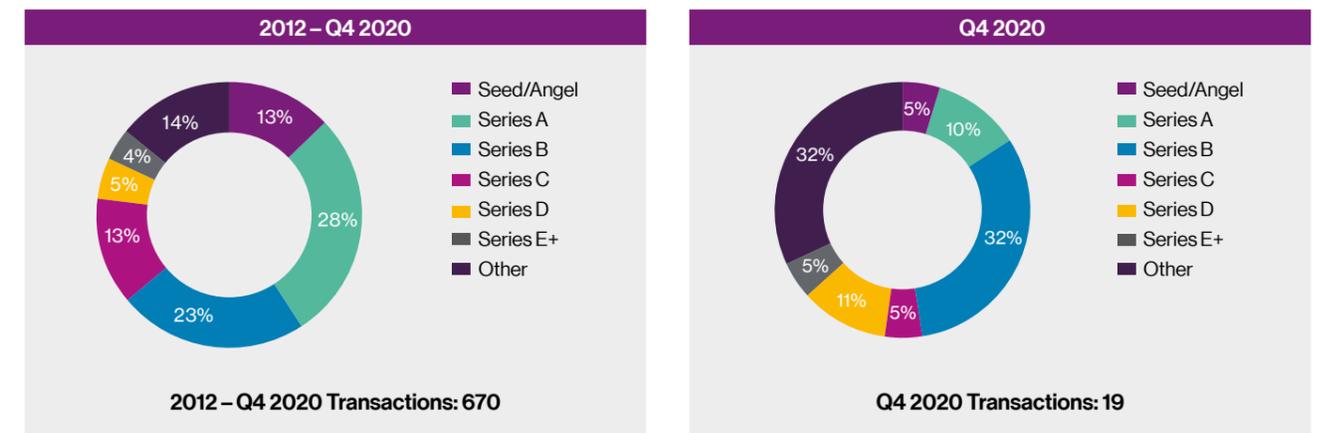
## Private technology investments by (re)insurers



## Private technology investments by (re)insurers by target country



## Private technology investments by (re)insurers by investment stage



## Private technology investments by (re)insurers

Date	Company	Funding (US\$M)		(Re)insurer investor(s)	Description
		Round	Total		
10/6/2020	BlocPower	11.85	11.98	▪ American Family Ventures	▪ BlocPower connects investors to energy-efficient projects in financially underserved communities through its online platform Smart Cities.
10/14/2020	Augury	55	114	▪ Munich Re Ventures	▪ Augury's machine health AI predicts machine failures and prescribes exactly when and how to correct them. Wireless sensors connect rotating equipment across industrial facilities and securely transmit mechanical data to the cloud. The data is then analyzed by proprietary cloud-based AI, and prescriptive insights are delivered directly to maintenance/reliability personnel and manufacturing operations in real-time.
10/14/2020	Wealthsimple	86.81	102.38	▪ Allianz X	▪ Wealthsimple is a technology-driven investment manager that combines a robo-advisor platform with access to live advisors.
10/15/2020	ExteNet Systems	-	155.5	▪ John Hancock Financial Services	▪ ExteNet Systems designs, builds, owns and operates distributed networks in key strategic markets for use by wireless carriers and venue owners. Using distributed antenna systems (DAS), small cell and other technologies, ExteNet networks enhance coverage and capacity and enable superior wireless service in both outdoor and indoor environments.
10/21/2020	Mine	9.5	12.5	▪ MassMutual Ventures	▪ Mine is a platform that allows individuals and businesses to discover their digital footprint in order to reduce redundant risks.
11/5/2020	Paceline	5	5	▪ Northwestern Mutual Capital	▪ Paceline offers a fitness rewards platform that adds financial benefits to physical activity.
11/13/2020	Runze Technology	-	-	▪ Ping An Ventures	▪ Runze Technology provides information technology products and services, including IoT, mobile network, quantum telecommunication, cloud computing, big data and more.
11/17/2020	Turtlemint	30	61	▪ American Family Ventures ▪ MassMutual Ventures	▪ Turtlemint is an online insurance seller that offers motorcycle insurance from various providers, allowing users to compare different plans.
11/17/2020	Trust & Will	15	23.03	▪ Northwestern Mutual Future Ventures	▪ Trust & Will seeks to modernize the estate planning industry with an easy, fast and secure way to set up a trust and will online.
11/17/2020	SendCloud	14.95	22.76	▪ AXA Venture Partners	▪ SendCloud operates a system that allows web stores to automate the shipping and return process for packages worldwide.
11/17/2020	Troy Medicare	10	23.09	▪ AXA Venture Partners	▪ Troy Medicare is a Medicare Advantage plan that uses data and technology to empower providers to impact each patient's health and get rewarded for those results.

## Private technology investments by (re)insurers

Date	Company	Funding (US\$M)		(Re)insurer investor(s)	Description
		Round	Total		
12/3/2020	DocAuthority	3.25	13.25	▪ AXA Venture Partners	▪ DocAuthority automatically discovers and accurately identifies unprotected sensitive documents, thus enabling a broad yet business-friendly security policy.
12/4/2020	MitrAssist	70	101	▪ Ping An Insurance	▪ MitrAssist introduces a minimally invasive approach to mitral regurgitation treatment. The mitral valve implant works in unison with the natural mitral valve without harming its functionality.
12/7/2020	simplesurance	18.21	87.51	▪ Allianz X	▪ simplesurance is an eCommerce provider for product insurances, enabling customers to buy products online and purchase corresponding insurance coverage at the checkout. The company's solutions enable cross-selling of product insurances directly at the point of sale in eCommerce, and integrates into the checkout process of online shops to offer a one-click experience for customers.
12/8/2020	At-Bay	34	87	▪ Munich Re Ventures	▪ At-Bay is an insurance company for the digital age. At-Bay combines security and insurance expertise to deliver better insurance products and security services to its clients.
12/15/2020	Ruili	2388	2388	▪ China Life Insurance	▪ Ruili is mainly engaged in the production, research and development, design and sales of integrated circuits and related products.
12/17/2020	Lydia	86	160.33	▪ CNP Assurances	▪ Lydia allows retailers, independent professionals and entrepreneurs to put their credit cards and cash in smartphones by connecting them to a Lydia account and generating an eCheque to scan.
12/23/2020	Span.IO	20.01	34.28	▪ Munich Re Ventures	▪ Span creates a smart panel that replaces the electrical panel, integrates with different energy resources; allows users to prioritize the areas that should be powered during outages and backup scenarios; and accommodates the proliferating solar, storage and EV-charging systems in a home.
12/29/2020	HYCOR Biomedical	20	103.07	▪ Ping An Ventures	▪ HYCOR Biomedical is a global manufacturer and supplier of in vitro diagnostics products. The company has expanded its presence into allergy and autoimmune products, which are used in clinical laboratories, hospitals and doctors' offices worldwide. Among these products, HYCOR markets the HYTEC and AUTOSTAT brands.

## Q4 2020 strategic (re)insurer partnerships

Date	Company	(Re)insurer investor(s)	Description
10/1/2020	Superscript	<ul style="list-style-type: none"> <li>AXA</li> </ul>	<ul style="list-style-type: none"> <li>London-based commercial insurance intermediary Superscript has partnered with AXA to provide monthly, subscription-based coverage for tradespeople. Available products include public liability, employers liability, business tools and personal accident.</li> </ul>
10/1/2020	Lyft	<ul style="list-style-type: none"> <li>Liberty Mutual Insurance</li> </ul>	<ul style="list-style-type: none"> <li>Liberty Mutual Insurance has selected Lyft to provide coverage for drivers using its rideshare platforms throughout Arizona, Michigan, New Mexico, Texas and Utah. Under the program, Liberty Mutual provides specific coverages in five states from the time a driver has his or her Lyft app on to app off.</li> </ul>
10/6/2020	Athenium Analytics	<ul style="list-style-type: none"> <li>Aon</li> </ul>	<ul style="list-style-type: none"> <li>Athenium Analytics has partnered with Aon Inpoint to develop Claims Signal, a next-generation claims quality platform that enables insurers to identify and address high-risk claims before they close.</li> </ul>
10/6/2020	Concirus	<ul style="list-style-type: none"> <li>Markel International</li> </ul>	<ul style="list-style-type: none"> <li>Specialist insurer Markel International has partnered with London-based Insur Tech Concirus for its behavior-based data analytics platform Quest Marine.</li> </ul>
10/6/2020	Lyft	<ul style="list-style-type: none"> <li>Mobilias Insurance</li> </ul>	<ul style="list-style-type: none"> <li>Commercial insurance firm Mobilias Insurance has partnered with Lyft to provide ride-sharing commercial insurance coverage in 11 states. Through its partnership, Mobilias will provide a single auto insurance policy for Lyft drivers in Colorado, Idaho, Minnesota, Montana, Nebraska, North Dakota, Oregon, South Dakota, Washington, Wisconsin and Wyoming.</li> </ul>
10/6/2020	Hitachi	<ul style="list-style-type: none"> <li>Swiss Re</li> </ul>	<ul style="list-style-type: none"> <li>Swiss Re Corporate Solutions has partnered with technology company Hitachi Europe Ltd. to offer manufacturing and transport companies coverage for industrial IoT risks. The initial product will offer Hitachi's predictive maintenance software to companies with a basic warranty backed by Swiss Re.</li> </ul>
10/12/2020	CyberCube	<ul style="list-style-type: none"> <li>Lockton</li> </ul>	<ul style="list-style-type: none"> <li>Lockton has partnered with CyberCube's Broking Manager, the cyber risks analytics platform for insurance intermediaries. CyberCube's Broking Manager will allow Lockton's teams to quantify the sources and financial impact of cyber risk exposure and educate clients accordingly.</li> </ul>
10/12/2020	Daimler	<ul style="list-style-type: none"> <li>Swiss Re</li> </ul>	<ul style="list-style-type: none"> <li>Swiss Re and Daimler Insurance Services have formed a 50/50 joint venture, known as Movinx. Located in Berlin, the firm has been set up as an insurance intermediary and service provider and has already received competition clearances.</li> </ul>
10/15/2020	RMS	<ul style="list-style-type: none"> <li>Tokio Marine Holdings</li> </ul>	<ul style="list-style-type: none"> <li>Tokio Marine Holdings has strengthened its commercial partnership with catastrophe risk modeler RMS, enabling its global entities to leverage data and technology-based insights of risk across all perils and markets.</li> </ul>
10/16/2020	Hi Marley	<ul style="list-style-type: none"> <li>RAM Mutual Insurance</li> </ul>	<ul style="list-style-type: none"> <li>Hi Marley has partnered with RAM Mutual Insurance to provide texting services using Hi Marley's innovative, insurance-focused communications platform.</li> </ul>
10/19/2020	The Dodo	<ul style="list-style-type: none"> <li>Petplan</li> </ul>	<ul style="list-style-type: none"> <li>Petplan, a North American pet insurance provider, has partnered with The Dodo, a leading global animal media brand on social media, to reinvent pet insurance. Petplan will assume the name Fetch by The Dodo in 2021 combining best-in-class insurance technology and superior coverage with the brand strength and massive community of The Dodo.</li> </ul>
10/20/2020	BreatheLife	<ul style="list-style-type: none"> <li>FaithLife Financial</li> </ul>	<ul style="list-style-type: none"> <li>FaithLife Financial, a Canadian insurance and investment organization, has signed a long-term deal with BreatheLife, an enterprise SaaS platform provider for the life insurance industry. The partnership will see FaithLife Financial establish the BreatheLife platform as its core distribution platform for financial-services products.</li> </ul>

## Q4 2020 strategic (re)insurer partnerships

Date	Company	(Re)insurer investor(s)	Description
10/20/2020	Ladder	<ul style="list-style-type: none"> <li>Hannover Re</li> </ul>	<ul style="list-style-type: none"> <li>Hannover Re and Ladder have announced the expansion of their successful partnership having worked together since 2016 to close the life insurance gap in the US. Hannover Re US has continued to support Ladder with innovative risk management solutions, accelerated underwriting consultation and outsourced underwriting services.</li> </ul>
10/21/2020	Veruna	<ul style="list-style-type: none"> <li>Evergreen Insurance &amp; Risk Management</li> </ul>	<ul style="list-style-type: none"> <li>Evergreen Insurance &amp; Risk Management Company (Evergreen) has successfully implemented the Veruna AMS, Veruna 2.0. Veruna is a developer of an agency management system (AMS) built on the Salesforce platform. Evergreen focuses solely on commercial real estate, with a portfolio that includes small rental units, large apartment buildings, shopping centers and commercial buildings.</li> </ul>
10/26/2020	Lemonade	<ul style="list-style-type: none"> <li>Tokio Marine Holdings</li> </ul>	<ul style="list-style-type: none"> <li>Tokio Marine Holdings has participated in the reinsurance program of Insur Tech firm Lemonade. The company has been a participant in the reinsurance program since July 1, 2020.</li> </ul>
10/26/2020	CyberCube	<ul style="list-style-type: none"> <li>Paragon International Holdings</li> </ul>	<ul style="list-style-type: none"> <li>Paragon International Insurance Brokers has partnered with CyberCube to roll out Broking Manager, CyberCube's market-leading cyber risks analytics platform for insurance intermediaries.</li> </ul>
10/29/2020	Whisker Labs	<ul style="list-style-type: none"> <li>HSB</li> </ul>	<ul style="list-style-type: none"> <li>HSB, part of Munich Re, and Whisker Labs have expanded their partnership to provide Whisker Labs' Ting sensing technology to help home insurance customers detect electrical hazards and will develop other IoT technologies for consumers.</li> </ul>
11/1/2020	Tractable	<ul style="list-style-type: none"> <li>MS&amp;AD</li> </ul>	<ul style="list-style-type: none"> <li>MS&amp;AD, a property &amp; casualty insurer, is to use AI to accelerate how it processes auto claims, speeding up recovery for its policyholders. The AI solution, created by technology company Tractable, uses computer vision to analyze photos of car damage – making sense of it as a human would, in near-real time.</li> </ul>
11/2/2020	Noyo	<ul style="list-style-type: none"> <li>Sun Life Financial</li> </ul>	<ul style="list-style-type: none"> <li>Sun Life has partnered with Noyo, a leading API platform for improving the speed and accuracy of health insurance data exchange.</li> </ul>
11/4/2020	Slice Labs	<ul style="list-style-type: none"> <li>AXIS Capital Holdings</li> </ul>	<ul style="list-style-type: none"> <li>Slice Labs, an on-demand insurance platform, has partnered with AXIS Insurance to distribute AXIS Home Based Business insurance to help protect small businesses.</li> </ul>
11/10/2020	IMS	<ul style="list-style-type: none"> <li>Nationwide</li> </ul>	<ul style="list-style-type: none"> <li>IMS (Insurance &amp; Mobility Solutions) has partnered with Nationwide as the technology provider for the SmartMiles pay-per-mile insurance program.</li> </ul>
11/16/2020	Malwarebytes	<ul style="list-style-type: none"> <li>Coalition</li> </ul>	<ul style="list-style-type: none"> <li>Coalition, a cyber insurance and security company, and Malwarebytes, a provider of advanced endpoint protection and remediation solutions, have partnered to offer a combined solution of best-in-class endpoint security and cyber insurance to protect organizations from cyberthreats.</li> </ul>
11/18/2020	General Motors	<ul style="list-style-type: none"> <li>State Farm, Progressive</li> </ul>	<ul style="list-style-type: none"> <li>General Motors has relaunched its auto insurance division as a way to generate new revenue from the growing number of connected vehicles in the U.S. General Motors receives data insights on its vehicle owners, including as part of partnerships with State Farm and Progressive.</li> </ul>
12/1/2020	Nubank	<ul style="list-style-type: none"> <li>Chubb</li> </ul>	<ul style="list-style-type: none"> <li>Nubank and Chubb have announced the launch of a fully digital life insurance offering, Nubank Vida, in Brazil. Nubank Vida will be underwritten by Chubb and was developed using the integration capabilities of Chubb Studio, the global digital product distribution platform announced by Chubb in September.</li> </ul>
12/15/2020	Parsyl	<ul style="list-style-type: none"> <li>Lloyd's</li> </ul>	<ul style="list-style-type: none"> <li>Lloyd's and Parsyl have announced the launch of the Global Health Risk Facility (GHRF), which will provide billions of dollars of insurance coverage, together with risk mitigation services, to help protect and support the global distribution of COVID-19 vaccines as well as critical health commodities.</li> </ul>
12/21/2020	Polecat Intelligence	<ul style="list-style-type: none"> <li>Willis Towers Watson</li> </ul>	<ul style="list-style-type: none"> <li>Willis Towers Watson has partnered with social business intelligence and data analytics firm Polecat Intelligence. Through the partnership, both companies will develop insurance solutions that will help organizations respond to the rapidly changing challenges they now face.</li> </ul>

## Additional information

The *Quarterly InsurTech Briefing* is a collaboration between Willis Re, Willis Towers Watson's Insurance Consulting and Technology, and CB Insights. Production is led by following the individuals. For more information, or to discuss the results of this report, please direct inquiries to [InsurTech@willistowerswatson.com](mailto:InsurTech@willistowerswatson.com).

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