

INSURANCE REDEFINED

A roadmap for Insurers and Insurtechs

Angat Sandhu Steven Chen Ajit Rochlani Jun Hao Tay Bella Thamrin

CONTENTS

Global mega-trends shaping the future of insurance		
Economic and demographic changes		
Changing consumer behaviour		
Accelerated digital adoption		
Technological advancements		
Asian InsurTech landscape	6	
Implications on the future of insurance across lines of business	7	
Life insurance		
Health insurance		
General insurance		
Reinsurance		
How insurers and InsurTechs are preparing for the future	22	
Future state of insurance and InsurTechs	25	
Conclusion	26	

FOREWORD

This report has been developed by Oliver Wyman and the Singapore FinTech Association, and it is being launched during the Singapore FinTech Festival, held from 7 to 11 December 2020. The key focus of this report is to present emerging trends and paint a bold vision of the future of insurance over the next 10 years and detail the implications of this evolving landscape on InsurTechs.

As part of the report, we have conducted primary research to understand consumer preferences and how both InsurTechs and insurance companies are reacting and preparing for the future. This includes a survey of about 1,000 consumers across six countries in the Asia-Pacific region, a survey of 42 C-suite executives working in the insurance industry across the region, and the expert opinions of the industry participants.

The insurance industry contributed 6.6 percent to the world's GDP in 2019 versus 7.5 percent in 2007.¹ The industry has not kept pace with the growth of the global economy. It needs to fundamentally transform itself to arrest the slide in its relevance going forward. We have combined our research insights with an overview of the mega-trends that are impacting the insurance industry and deep dived into what the future may hold in terms of the potential opportunities across life, health, general insurance, and reinsurance, and how insurers and InsurTechs can position themselves to take full advantage.

We hope the report provides InsurTechs, insurers, and industry participants with the right inspiration when drawing their respective roadmaps of future opportunities, so that they can fully realize their growth ambitions in the region.

Chia Hock Lai President Singapore FinTech Association



a fot Scolly

Angat Sandhu, CFA, FRM Partner and Head of Asia Pacific Insurance Practice Oliver Wyman (Singapore)



¹ Source: Swiss Re Sigma

GLOBAL MEGA-TRENDS SHAPING THE FUTURE OF INSURANCE

To analyse the current state of the insurance industry and understand where the value lies, we looked at the performance of insurance players across categories over the last five years.

The recent trends indicate that the value in insurance is shifting towards distribution and technological capabilities. For example, brokers are being valued at higher price-to-book (P/B) multiples, and have generated better returns. Similarly, the market is assigning greater value to InsurTechs that have brought applications of new technologies to the industry that have shown promising outcomes.

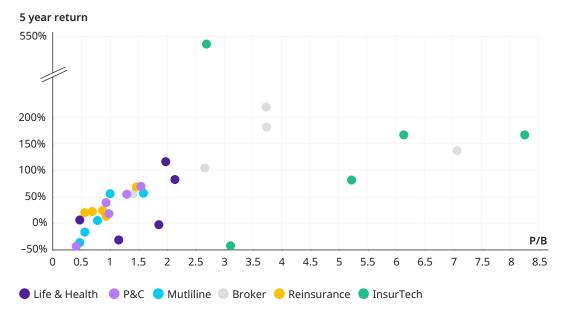


Exhibit 1: Five-year TSR (Total Shareholder Return) versus current P/B multiples for the top players by sub-sector

Source: S&P, Oliver Wyman analysis

Given the economic and social significance of the insurance industry, it now stands at the crossroads of several mega-trends by which it is being disrupted. The impacts of these trends are manifold in terms of growth, financials, and operations. We have summarised the different forces at play into four key global trends that are having the most profound impact.

Exhibit 2: Four key global trends shaping the future of the insurance industry



Economic and demographic changes

Larger insurance and protection gap

Source: Oliver Wyman



Changing consumer behavior

Demand for superior customer experience



Accelerated digital adoption

Blurring of lines between channels



Technological advancements

Innovation and disruption across the value chain

ECONOMIC AND DEMOGRAPHIC CHANGES

Insurance penetration to GDP at a global level has fallen from 7.5 percent in 2007 to 6.6 percent in 2019.² While the penetration has grown in some developing economies, it has not been enough to arrest the slide at a global level. In fact, global wealth has been growing faster than insurance premiums (see Exhibit 3).

Economic changes combined with demographic changes, such as the increasing average life expectancy, have meant that the gap between how much insurance or retirement savings we need versus how much we have has kept increasing.

4.8% 3.7% 3.5% 3.4% Wealth growth Total premium Life premium General insurance premium Other critical demographic changes Life expectancy 2019 73 years 2010 71 years Medical costs as a percentage of GDP 2019 9.9%

Exhibit 3: Comparison of growth of insurance premiums versus global wealth

Source: Sigma Swiss Re, CS, Oliver Wyman analysis

2 Swiss Re Sigma

2010

9.5%

CHANGING CONSUMER BEHAVIOUR

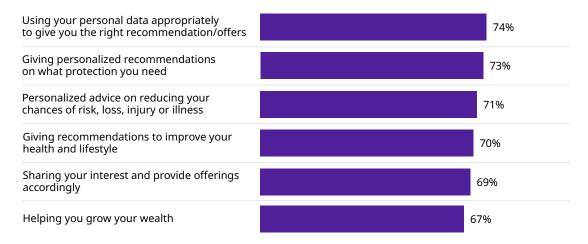
Startups and leading e-commerce players have been reshaping consumer behaviour, leading to increased service and experience expectations from insurance firms. To better understand the expectations and shift in behaviour of insurance consumers, we conducted a survey in six countries across Asia.

To be able to meet the changing expectations, the insurance industry needs to improve responsiveness and make better use of technological advancements. More than 50 percent of the consumers surveyed stated that they think insurance companies are lagging other industries in terms of responsiveness, how well they use technology, and the provision of personalised products.

Specifically, more than 70 percent of the consumers surveyed expect their insurance companies to give personalised recommendations in terms of which insurance products are best suited for them, how much cover they need, and how they can reduce their risks.

Exhibit 4: Examples of consumer expectations

Which of the follow areas do you trust your insurance company with?



Source: Oliver Wyman Consumer Survey results, n=913 across SG, MY, AU, IN, CN, HK

ACCELERATED DIGITAL ADOPTION

Accelerated digital adoption by both consumers and insurance intermediaries is helping drive innovation in the insurance sector, such as by forging new business models, ways of distribution, partnerships, and revenue streams. The experience of shopping online for a range of products has made consumers a lot more open to buying insurance across different digital platforms (see Exhibit 5).

Exhibit 5: Examples of digital adoption in insurance



79% consumers are open to using Internet and online platforms for either researching or purchasing insurance



69% consumers are open to purchasing insurance through their bank's digital platforms (mobile banking, Internet banking, etc.)



35% consumers are open to purchasing insurance through e-commerce portals (Amazon, Lazada, etc.)



34%

consumers are open to purchasing insurance through popular super apps (Grab, WeChat, etc.)

Source: Oliver Wyman Consumer Survey results, n=913 across SG, AUS, IN, CN, MY, HK

As increasing adoption levels makes it easier for insurance companies to drive processes on digital platforms, the lines between distribution channels are blurring quickly. The most common example is of customers starting their purchase process online by conducting research on the product in which they are interested and completing it offline by meeting an adviser.

Despite the rise in digital distribution channels, it is unlikely that all digital channels will be equally successful. For example, consumers are more likely to buy insurance on their existing digital banking application than an e-commerce platform.

TECHNOLOGICAL ADVANCEMENTS

Across a range of industries, technological progress has been reshaping and driving innovation, but the challenge with the insurance industry has been that it is has generally been a late adopter. The technological developments to date are helping insurance companies improve operations, upgrade propositions, and drive innovation. Although insurance companies have been users of technology since the very early days of data processing, a wide range exists across Asia in terms of insurance companies that are technologically advanced versus most that are still catching up. Therefore, at the sector level, the adoption rate has been slower.

While there have been significant developments in terms of technology, we have summarised six key ones (see Exhibit 6) that are expected to have the most impact on the future of insurance. InsurTechs are leading the way in showcasing the successful application of these technologies to transform the value chain.

Technology	Impact on insurance		
AI and ML	Proactive risk prevention		
	Smarter claims assessment and fraud detection		
Data analytics	Personalisation		
	Better sales and operational efficiency		
Open API	Partnerships		
	New propositions		
Cloud	Efficient variable cost model		
	Shorter time to market		
ΙοΤ	Ecosystems integration		
	Data and consumer behaviour insights		
Blockchain	Increased data sharing		
	Increased collaboration (e.g. frauds database)		

Exhibit 6: Six key technologies impacting the future of insurance

Source: Microsoft-IDC 2018 survey: Unlocking the impact of digital transformation, expert interviews, Oliver Wyman analysis

ASIAN INSURTECH LANDSCAPE

With venture capital investments in Asian InsurTech firms crossing US\$4 billion over the past five years³, Asia is seen as an important pillar of the global InsurTech market, propelled by a strong push on innovation and a growing investment appetite across emerging markets.

InsurTech developments have been witnessed across the entire value chain, with a stronger emphasis on digitalising processes, mobile platforms, customer connections, and product personalisation. InsurTechs are bringing in much-needed disruption to the Asian insurance industry, and shaping the direction for future innovation.

China and India have been frontrunners in the Asian InsurTech space. Southeast Asia has also emerged as one of the markets with the biggest potential. This is in part thanks to a strong push by many governments to encourage InsurTech companies to develop innovative solutions to serve the market. As an example, Singapore, Malaysia, and Thailand have all launched their own regulatory sandboxes to provide a safe space for these companies to experiment and develop disruptive products.

Ranked as the smartest city in the world by the IMD Smart Cities Index, Singapore is seen as the hub for InsurTechs to innovate and take developed offerings to other parts of the region. Singapore InsurTech participants are split across two key cateogories: value chain disruptors, and new digital business models. There has been a lot of focus on improving customer experience and operational efficiency, while introducing innovative insurance products.

³ Oliver Wyman Analysis

IMPLICATIONS ON THE FUTURE OF INSURANCE ACROSS LINES OF BUSINESS

In order to grow and create value in future, the industry needs to transform itself across the value chain. The exact implications of these vary by different segments and lines of business within the insurance sector, and below, we have detailed high potential opportunities across life insurance, health insurance, general insurance, and reinsurance.

LIFE INSURANCE

With a low interest rate environment, increasing volatility in investment markets, and riskbased capital regimes becoming prominent in most markets, life insurers need to rethink and re-examine how they can create value for their customers, whilst also being able to deliver attractive returns for their shareholders.

Along with the escalation of data availability, the emergence of newer data sources, such as wearables, social media, and customers' shopping history, and the advancements in digital analytics, the future of life insurance re-imagined will be customer-centric instead of product-centric, as well as digital, simple, and accessible. Customers should be able to easily get a quote, buy a product, file claims, and access agents, not only with a few taps but also with higher transparency and better service. We see three clear opportunities for life insurance going forward:

A. PRODUCT INNOVATION

To facilitate all the changes, insurers should modify their product portfolios. Insurers are realizing the need to develop more flexible product solutions, and modify existing products to be more customer-focused and personalised, as consumers continue to seek the right personal combination of protection and savings. In some markets, life insurers have already begun transforming their portfolios towards a wide variety of hybrids and unit-linked products that are more capital efficient and perform well in a low-rate environment. Other shifts in life insurance include tailoring solutions based on consumers' life stages, as well as adding value-added services and non-monetary benefits. Exhibit 7 shows how life insurance products have shifted over the years in some of the leading markets in Asia, Europe, and North America.

Exhibit 7: Examples of product-mix changes in leading markets

Insurance product-mix movement away from longer term products (examples from Asia, Europe, and North America)

Hong Kong: Product-mix change

Total premiums, %

Annuities ILAS Critical Illness Endowment Universal Life Whole Life	7% 13% 27% 49%	3%	11% 9% 14% 57%	~6% `3%
Critical Illness Endowment Universal Life Whole Life	27%		<mark>9%</mark> 14%	
Endowment Universal Life Whole Life				
Universal Life Whole Life	49%		57%	
Whole Life	49%		57%	
Innani Draduct miy change	2005		2018	
Japan: Product-mix change New policies, %				
Others	8%		16%	
Annuities	14%		6%	
Medical ¹	35%		34%	
Whole Life ²				
Term	23%		22%	
Endowment	15%		16%	
	<u>5%</u>		6% 2018	
Germany: Product-mix change New policies, %	2005			
		·	17%	
Fixed annuities	52%			
Unit-linked annuities			55%	\leftarrow Hybrid annuities
Basic endowment	25%	the second second		
Unit-linked endowment	2370		8%	
	19%		18%	
	<u>4%</u> 2010		2% 2018	
US: Annuities product-mix change New sales, %				
	0.54		2.494	
	25%		24%	
Fixed Annuity	16%		34%	
		· · · · · · · ·	3470	
Indexed Annuity				
Indexed Annuity VA Annuity	59%		42%	

Source: Industry data, Oliver Wyman analysis

Overall, life insurance products in future will be simpler, faster, more personalized, and user based. The following are some relevant propositions for the future:

- Proposition design will be truly targeted, underpinned by a strong understanding of the economics of risk, and adopting a customer-first mentality. Most life insurance companies still largely find customer needs to fit their product suite rather than designing solutions to solve customer problems. In the future, they will put customers first, look beyond the products they want to sell, and understand the problems that customers want to solve during their life journeys.
- **Propositions will be flexible,** adapting over time and circumstance to customers' changing needs. They will be integrated into the customers' lives seamlessly, giving them peace of mind, instead of forcing them to seek different products at different points in time.
- Propositions will move away from capital intensive, longer-term, fixed high-guarantee products to capital-efficient and shorter-term, adjustable, hybrid products, given the current persisting low interest rate environment.

B. DISTRIBUTION INNOVATION

As customer preferences and behaviours shift, the way in which insurers traditionally distribute their products is becoming less efficient. Current practices require significant efforts and resources, making the economics unsustainable in the long term.

Life insurance companies have generally spent large sums of money and resources to get access to customers, from investing in setting and scaling up agency channels, to upfront money being paid for bancassurance deals, to paying for digital partnerships now. Over the years, while there have been technological advancements and modernisation efforts, the digital distribution of life insurance products has not yet to scale significantly. Agency and bancassurance distribution models have continued to dominate the industry across most markets around the world.

Despite the challenges with the economics of distribution channels, and the long waiting periods to get the expected return on investment, the agency and bancassurance distribution models will continue to remain significant over the next 10 years. However, life insurers need to rethink new ways on how to leverage these distribution channels. In this endeavour, digitalisation is the key in reinventing and transforming them.

For example, traditionally, the agency channel has always been about building larger forces of advisers, as typically more advisers translates to more premiums. Now, however, with accelerated digital adoption and technological advancements, the focus in the future will be on improving productivity and efficiency. This will be done by leveraging digital resources rather than large physical forces to increase customer outreach. Thus, the resulting agency channel of the future will be a hybrid that utilises both digital and personal resources. In addition to providing digital tools to their agents, life insurers need to help them with both upskilling and generating more leads.

Similarly, with bancassurance, even though insurance companies usually pay large sums of money upfront, only a few partnerships flourish, and many fail to deliver on their promise. With time, the euphoria associated with doing more deals is often replaced by questions from shareholders and senior management on how to justify the multiples paid and deliver on the promised plans. Insurance companies have learned the hard way just how difficult it is to get bank resources to focus on insurance sales, given they already have so many other key performance indicators (KPIs) to drive, leading to bancassurance models being diluted.

As branch walk-ins fall and digital transactions become the preferred route for customers, we expect bancassurance models to also fundamentally change, with digital bancassurance becoming the way forward. Instead of wanting to be present in every bank branch, the focus of life insurance partners will shift to being present on every digital bank platform. Tapping into the footfalls there will require far less resources and hence be much more economical.

Although face-to-face relationships and human interaction will remain key to life insurance distribution, the future will be a combination of digitally enabled and human-centric approaches.

C. SERVICE-LED ENGAGEMENT AND PERSONALISATION

Currently, life insurance customers are mainly segmented by income, such as high net worth individuals (HNWIs) and the mass market, or demographics, such as retirees and new parents. Deeper customer segmentation can help reshape existing offerings and create more needs-based solutions. Going forward, insurers will focus on using data enrichment and advanced analytics to achieve segments of one and deliver one-to-one level personalisation in terms of conducting deeper financial needs analysis, assessing overall financial wellness, providing modular options, and utilising alternative data. As a use-case example, insurers will be able to map out their customers' life cycles in order to understand them better: their motivations, the evolving problems they are trying to solve, their key needs, and the triggers leading them to buy insurance.

By identifying each customer's life stage, insurers can identify value-added solutions throughout their life cycle to meet their needs. Using life events as triggers for making insurance purchases can be done through following social media, identifying touch points, and launching initiatives that offer helpful solutions.

Potential insights into customer needs can also come from analysing customer data from patterns in behaviour, sentiments, and trends, all of which are already possible and will become even more accessible in the near future. With the sharing of personal data increasing, and ever more dynamic live feed adjustments from specific digital platforms and wearables, insurers will have the necessary ingredients in place to target one-to-one level personalisation.

D. INSURTECH OPPORTUNITIES IN LIFE INSURANCE

Technological innovation in life insurance continues to evolve, and InsurTechs are playing a critical role in this evolution. Most life InsurTech players are competing to generate better value for customers in the three key areas we have highlighted above.

For product innovation, InsurTechs are focusing on mobile value propositions and personalisation to bring faster and easier access to life insurance, while using data to improve underwriting processes. For example, Ladder offers a product that allows clients to plan for extra coverage when it is needed and taper off coverage at other times. This allows for a more dynamic coverage option that is fully needs-based, easy to understand, and helps with better engagement between the insurer and the client.

In the distribution space, InsurTechs are leveraging mobile and digital channels to improve their targeted customer reach. InsurTech company Bestow launched an algorithm-powered life insurance underwriting product, Protect API. It enables companies to offer life insurance coverage directly to consumers within their mobile applications or websites. The coverage can also be customised based on each individual life insurer's preferences and provides life insurers with the ability to offer coverage solutions that are efficient, affordable, and personalised on a platform that their consumers already know and trust.

InsurTechs are also leading the charge on personalisation, applying artificial intelligence (AI) to simplify and digitise insurance, and through this, recommend tailored products to individuals. For example, PolicyPal in Singapore optimises policies through AI chatbots and recommends policies based on the customer's phase of life. It serves as a digital insurance manager, keeping track of the client's different policies and giving recommendations on how to update insurance coverage based on the client's unique needs.

The opportunity for InsurTechs to continue to expand efforts in this space does not just offer the potential to disrupt a product that has proven limitations, it also comes with the prospect of addressing a societal need for customisable and personalised products, something that has previously been difficult to execute.

Now with improved technology, greater digitalisation, and innovative use cases, the life insurance industry is ripe for reinvention, and InsurTechs need tobe at the forefront to drive this change.

HEALTH INSURANCE

There has been a recent emergence of companies that are competing to try and own the health and wellness value chain. HealthTechs, hospitals, healthcare providers, pharmaceutical companies, insurance companies, and many others have recently launched various new initiatives to gain an edge in this sector. Given the increasing competition, health insurers need to start re-thinking their role in the entire health and wellness value chain, and how they can become more relevant.

The healthcare sector is one of the frontrunners with regard to digital innovation, but the focus of health insurers has largely been on helping customers get admitted to hospitals in cases where needed and settling their bills. Health insurance companies are now figuring out what other parts of the health value chain they can transform.

The boundaries are limitless for health insurers with a clear vision of the future. Some are already moving upstream and working together with healthcare providers to provide services such as teleconsultation, and downstream to provide services such as the end-to-end delivery of drugs. Going forward, there are two large opportunities that insurers can focus on to shape the future of health insurance.

A. MANAGING BETTER HEALTH OUTCOMES

Soon, insurers will have a wealth of health and fitness data that they can collect from different data sources. Besides having access to their own internal database, via sources such as wearable devices and health applications, they will be connected to external databases, such as patient information from hospital claims. This will give insurers a unique opportunity to get more involved with their customers' health journey by, for example, proactively suggesting lifestyle changes, helping deliver medicines from time to time, and even recommending medical checkups or treatments that customers should consider.

How would this work? Insurers could utilise data analytics to comb through a trove of patient information to identify trends and patterns amongst patients. For example, if a consumer has a family history of diabetes and currently has irregular sleep patterns, insurance companies might be able to use the data to identify similar cases and figure out that these factors indicate high risk. Insurance companies could recommend changes in lifestyle habits or follow-up medical checkups to reduce the risk. If customers are willing to follow the recommendations, they could also be rewarded with lower premiums for their health insurance or other benefits. The utilisation of data analytics could also create unique opportunities for health insurers to shape their future offerings. For example, health insurers could give customers the option to decide their coverage and premium over the life of a given policy by creating conditions and giving them incentives to achieve better health and wellness scores. On the business side, insurers could then enjoy increased customer loyalty, as well as lower claims costs.

B. DIGITISATION OF OPERATIONS

Out of pocket expenditure has remained relatively high across the globe, and there is a huge value gap that can be addressed by health insurers.

The complexity of health insurance products and the claims settlement processes has led to customers believing they might be better off saving on their own for future health emergencies. As a result, health insurance has failed to achieve better penetration.

Going forward, in order to enhance their value proposition, health insurers need to significantly streamline their operations and use technological advancements to transform customer journeys. For example, they can use innovative solutions, such as health ATMs, which help perform non-intrusive medical tests on customers. Then, within minutes, they can issue a suitable health insurance policy.

Furthermore, insurers can partner with other services to help streamline their operations. For example, they can partner with healthcare providers to create a platform that provides teleconsultation on demand, 24 hours a day, seven days a week. Any form of consultation or service provided via the platform could then be immediately covered by the insurance policy, saving the hassle of having to go through a formal claims process. The added benefit of such a service would be to use analytics to, among other things, link consumers up with the most suitable doctors, and identify the most effective and least expensive treatments.

While the above innovation examples show that transforming the processes is very much possible, there may also be an impact on outgoing claims, leading to slower transformation efforts. To drive the future of health insurance, the providers need to drive the operational transformation, and so make health insurance significantly simpler than what it is today.

C. INSURTECH OPPORTUNITIES IN HEALTH INSURANCE

Health InsurTech companies have received huge investment support over the past few years. It has been reported that InsurTech companies focusing on healthcare account for 29 percent of all InsurTech investments.⁴ The investment support has also been encouraged by the increasing consumer focus on adopting healthy lifestyle habits.

Bright Health is a good example of an InsurTech player that is operating in this space. It has already raised several rounds of equity funding. The company aims to provide a more meaningful integration of its payer services into the patient journey. Members have access to health rewards programmes, and personalised healthcare teams on both web and mobile platforms.

Another health InsurTech company, Clover Health, is focused on innovating multiple parts of the value chain. It aims to improve the experience of both users and physicians, as well as reduce doctor-insurer friction by increasing the visibility into the health of each patient.

Other than health and wellness products, InsurTechs are also focusing on targeting extremely niche markets. As an example, Spot is an InsurTech firm that provides health and accident insurance for athletes, travelers, and adventurers. It has a subscription-based model for just around US\$20 per month and can be cancelled anytime. Subscribing for this service takes roughly 90 seconds and requires minimal information. It is targeting a niche market of extreme outdoor sports that has traditionally been underserved by many insurers.

GENERAL INSURANCE

General insurance is the line of business that is likely to be most disrupted by future trends. There is already an increasing prevalence in the number of innovative solutions. Many new entrants have emerged from next-generation distribution intermediaries to peer-to-peer insurers, intending to meet unmet needs or solve customer pain points.

Outside of the industry, we continue to see a greater proliferation of transformative forces, such as self-driving cars, and the sharing economy that has started to change the landscape of how assets are being owned and used. This increasing trend, coupled with innovations such as big data, machine learning, and distributed ledger technologies, are all positioned to change how insurance is structured, consumed, and provisioned for in the future.

⁴ NSI Investments

Here are the implications on key product lines in detail:

A. FUTURE OF MOTOR/MOTOR 2.0

The adoption of new technologies, such as telematics and advanced driver assistance systems (ADAS), will continue to have an increasing impact on auto insurance. However, in the longer term, autonomous vehicles will significantly change how auto insurance is underwritten in the future. The key difference is that original equipment manufacturers (OEMs) would likely be on the hook if their technology falters, instead of the "driver" having to bear the liability of the accident. As the risks shift from consumers to OEMs, auto insurance in the future may no longer be a personal line of business, but a liability line of business for OEMs instead (see Exhibit 8).

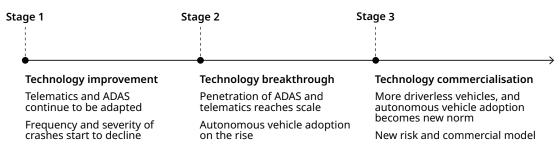


Exhibit 8: High-level timeline of trends impacting auto insurance

Source: Oliver Wyman analysis

Another trend that has seen widespread adoption recently is that of ride-sharing. The combination of ride-hailing technologies and autonomous vehicles would result in a fewer number of cars required and much safer driving conditions, which is likely to have a significant impact on auto insurance pools.

B. FUTURE OF PROPERTY

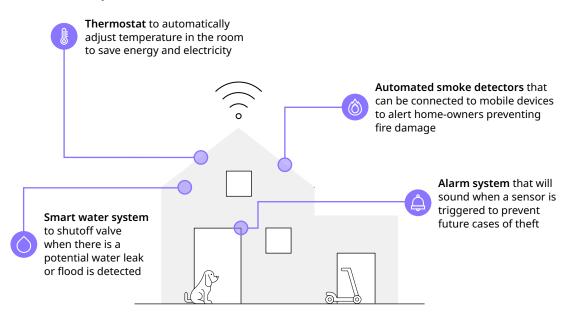
The increased adoption of sensors creating an internet of things (IoT) community of data capture and detection functions is becoming a huge opportunity for insurers to capitalise on and transform how risk is managed within the property space. The rise of smart buildings and homes has given an individual identity and risk scoring to property that was difficult to fathom even a few years back.

Home 2.0 (Connected homes)

The digital sensors installed in smart homes can provide real-time proactive alerts that can help prevent accidents waiting to happen. For example, a smart smoke alarm can help detect any signs of fire and immediately alert the homeowner to act before it gets out of control. Adopting these technologies can help insurers reduce costs, and result in customers paying fewer premiums and experiencing less hassle. Ultimately, insurers can move beyond their traditional role as a financial safety net towards one that helps their customers proactively manage risk. Instead of reacting to situations, IoT and connected homes provide insurers an opportunity to influence customers and reduce costs.

As insurers move from being reactive to proactive in their pricing plans and strategies, insurance companies will be able to deepen their relationship with customers in the smart home market. This, in turn, can help deepen the penetration in this significantly under-penetrated segment. More personalised products could be tailored to customers who adopt more smart devices, and each home could then also be rated based on the differing risk behaviour of each homeowner. In other words, connected homes enable static pricing strategies to be replaced with dynamic and automated risk assessments that can also reward customers who are "safer" than others.

Exhibit 9: Examples of smart-home sensors



Source: Oliver Wyman analysis

Other infrastructure coverage

The prevalence of digital technology is reshaping the way insurance is managed for other infrastructure. In the past, there would have been multiple rounds of consultation between a contractor and an insurance company to discuss the overall risk levels of a project. However, technologies like sensors, design-modelling simulations, and 3D design processes can help develop novel approaches to evaluating risk. These real-time monitoring capabilities can help isolate potential vulnerabilities, and prompt pre-emptive maintenance, lowering the risk of mechanical breakdowns and project delays.

Insurers could also play a more active role to ensure workers are adhering to safety procedures and help set up better processes to reduce the likelihood of accidents on site. The significant reduction in risk would provide insurers with an improved level of comfort when underwriting projects, and result in reduced costs.

C. SME INSURANCE

The small and medium-sized enterprises (SME) market has remained relatively underpenetrated for a very long time. The primary challenge that most insurers and brokers face is the difficulty in tailoring policies to suit a vast number of small but complex firms with different needs. On the SME side, many companies struggle to understand the intricacies of various cookie-cutter policies. They also struggle to find the right level of coverage for different stages of growth.

Insurers' slow adoption of transformative technologies is one of the major factors that has hindered development in this space. The adoption of technologies, such as artificial intelligence, will help insurers develop stronger insights on SMEs, allowing them to develop a suitable product offering that is attractive to these enterprises.

Going one step further, insurers could be integrated with the core systems of SMEs. They could then leverage internal company data from the systems and enrich this with external market data to create a comprehensive and dynamically priced suite of insurance products that serves all the SMEs' needs, ranging from inventory, property, marine transit, and cyber coverage, to even employee benefits. They could also make it extremely simple for the SMEs to sign up for the coverage. For example, they could even consider something akin to a simple subscription-based opt-in/opt-out model.

D. INSURTECH OPPORTUNITIES IN GENERAL INSURANCE

General insurance is seen as one of the more innovative lines of business, so it presently has the focus of the majority of InsurTechs. Speed of delivery and convenience are key factors in gaining a competitive advantage in general insurance, and many players aim to excel in these areas across diverse segments.

UK-based Cuvva was an early entrant in the auto InsurTech market, opting to sell hourly car insurance policies that can be bought in a couple of minutes via a user-friendly app. This approach meets the needs of digital-savvy consumers wanting simple, flexible insurance to suit their on-demand lifestyles.

In the property market, InsuraGuest provides specialised insurance products to hotels, resorts, and vacation rental properties. InsuraGuest integrates the client's property management system with its own liability policy. This helps to manage the risk exposure for property owners and provides policies for guests who might benefit from coverage needs that are not typically provided.

The commercial potential for differentiated and new to market offerings in general insurance is huge, and therefore attractive for InsurTechs. As an example, Flock is an InsurTech company that specialises in drone insurance. Drones will likely be one of the many industries that will experience rapid growth over the next few years. Flock is positioned to capitalise on these technological tailwinds, and it has goals to expand its product suite and become the go-to insurer for connected and autonomous technologies.

REINSURANCE

Due to the increasing prevalence of catastrophic events, reinsurance has endured a prolonged soft market until recently where there are signs for potential hardening. Currently, there is uncertainty surrounding the development of claim reserves associated with recent catastrophic events, social inflation, and the impact of the COVID-19 pandemic. Not all reinsurers are best positioned to capitalize on these developments within the current market dynamics. Bracing for an uncertain market, we have identified two opportunities arising in the future for reinsurance:

A. DATA ANALYTICS AND TECHNOLOGICAL ADVANCEMENTS

When it comes to innovation and technological advancements, reinsurance companies were once the early adopters, such as when they used cat-modelling techniques in the early 1990s to predict and assess risk. In a business that relies on actuarial data to assess and manage risk, data is the biggest asset for reinsurers.

Over the years, the way reinsurers use data has evolved, from a recording tool to a means to understand future growth opportunities. Although analytics has been a core part of the reinsurance business, the proliferation in technological advancements and digitalisation have allowed reinsurers to magnify the use of reinsurance data. Combined with advanced analytics, the possibilities for the future are wide, and can have immense scale.

In addition, reinsurers will need to drive innovation in the insurance industry and develop new solutions. Data analytics and technological advancements will be the competitive advantages of reinsurance companies.

Reinsurers can unlock key future successes by identifying emerging risks and trends, developing insights into customer behaviour, and acting upon themselves to refine their risk-management models and increase operational efficiency.

B. NEW ROLES FOR REINSURANCE

Reinsurance helps to protect against tail risks. As we know that reinsurance can be an unpredictable business, adapting to the risk landscape and identifying new potential risks are central to the functioning of reinsurance firms. A few factors are set to reshape the risk landscape over the next decade, such as climate change, natural catastrophes, digital technology, and social inflation. With the global COVID-19 pandemic exacerbating pre-existing market conditions, future reinsurers need to come up with new models. Below, we see several trends emerging and roles that reinsurers can play in the future:

Public-private partnerships

As a pandemic affects all, and yet only a fraction of the enormity of the resulting economic loss can be covered by insurance, both public and private sector organisations need to work together and be prepared for potentially extended periods of economic disruption. A public-private pandemic risk solution is essential to rebuild confidence for businesses, create more informed risk management decisions, ensure operational and financial resilience, and facilitate recovery.

On their own, private insurers and reinsurers do not have the financial resources necessary to underwrite and manage risks as complex as pandemic risks. Therefore, a public-private partnership reinsurance model is critical to build a more proactive and agile response mechanism. As we progress into the future with more complex and systemic risks, a partnership model could be the way forward for private reinsurers and the government to work together in managing and mitigating tail risks.

Exhibit 10: Several ways a public-private insurance/reinsurance mechanism could be developed

Private <		Public		
Semi-private pooling reinsurance scheme	Public-private partnership (PPP) reinsurance schemes	Public funds for noninsurable risks		
Joint entity created by insurers to pool risk and share knowledge Participation may be voluntary or legally mandated Financing primarily provided by the private sector, with limited	Structured risk sharing model between policyholders, insurers and government	Pure government setup, without any direct private involvement (other than aligning coverage)		
	Government explicitly provides backing to the private sector to cap exposure and drive affordability	Fund is created with a reserve, built up over time, that can be used to pay out claims in the event of a pandemic		
(if any) initial government financing and typically no committed reserve	Participation may be voluntary or legally mandated	Claims against the fund should be aimed at covering risk events that cannot be covered by existing insurance offerings		
	Relevant options for r	nanaging pandemic risk		
	and reinsurers any diversificat will likely be required to e	emics are unlikely to offer insurers ion. Some form of public support enable viable insurance and ice markets.		

Source: MMC

Escalation of alternative capital

In recent years, reinsurers have been working with alternative capital providers. Many private equity and other capital providers are investing in reinsurers, bringing in additional investment and operational expertise. We expect alternative capital to continue to play an important role in the reinsurance industry. This trend will be mainly backed by the rising demand from institutional investors for less correlated assets and increasingly innovative transaction structures.

The escalation of alternative capital will also help the reinsurance industry to finance risk at lower costs. It is expected that more reinsurers will adopt a hybrid earnings model, combining underwriting returns and fees from risk-sharing. Capital providers will also explore new partnership models in the future that further deepen their relationships with reinsurers.

C. INSURTECH OPPORTUNITIES IN REINSURANCE

In the reinsurance space, there are fewer InsurTech companies. However, reinsurance companies have been actively setting up their own venture funds and accelerator programmes to invest in other early-stage InsurTech firms. These venture funds and programmes often focus on funding InsurTech firms that focus on artificial intelligence, mobility, and technology.

This partnership between InsurTech and reinsurance is mutually beneficial. InsurTechs are increasingly seeking direct contact with reinsurers to source underwriting capacity, risk expertise, and capital strength. On the other hand, reinsurance companies can develop strategic partnerships with InsurTechs to change the way reinsurance is distributed, priced, underwritten, and administrated.

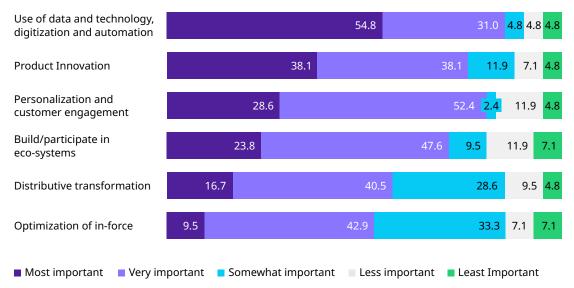
Going forward, InsurTechs and reinsurers need to bring their collective capabilities in accelerating the development of technology-driven reinsurance solutions and drive their success through collaboration. For InsurTech companies, there are a few considerations to keep in mind so that they can foster long-term mutually beneficial relationships with reinsurers. Firstly, they can leverage the massive data that reinsurers have collected over the years, as well as utilise the reinsurers' risk expertise and insights. Next, they can explore innovative partnerships in new sharing economies and work with reinsurers to expand their products and services. Lastly, InsurTechs must be more flexible, adaptable, and patient with reinsurers, as transformation and disruption could still take many years.

HOW INSURERS AND INSURTECHS ARE PREPARING FOR THE FUTURE

We surveyed 42 C-suite executives of the insurance industry to better understand how they are preparing themselves for the possible changes in the future.

Over 50 percent of executives believe that the use of data technology and digitisation is the most important theme for their respective companies to grow, with product innovation and personalisation, and customer engagement coming in second and third, respectively. Comparing these results to our consumer survey, the two main priorities for consumers are having better service and responsiveness, and product innovation, with the use of data technology being their third biggest priority. As such, the insurance industry is focusing relatively well on meeting their consumers' changing expectations.

Exhibit 11: What are the most important themes for your company to grow in this fastmoving world?



Source: Oliver Wyman C-Suite survey results, CEOs across Asia, n=42

The survey also brought to light that internal hurdles are more of a challenge to insurers than external market pressures. Despite the insurers' desire to move towards a digital and more technologically driven business, their biggest hurdle at present is the legacy IT and infrastructure systems that they are currently using.

Insurance has always been served by fragmented processes, driven by its legacy systems. Experts within the insurance value chain operate in separate business functions and do not have an efficient process to collect and share data between these functions, making it difficult to harness the right data to provide meaningful insights.

InsurTech companies have also been focusing on solving legacy claims systems. For example, AI/ML technologies can help improve end-to-end claim management by making it more timeefficient, accurate and customer-focused. InsurTechs can use AI-based regulation control and increased data points to assess damages and quickly settle claims, improving the overall efficiency of claims settlements and lowering the claims costs for insurers.

Other than these areas, InsurTech companies are targeting the disruption of underwriting, payments, and collections operations. Current underwriting processes are lengthy, and inflexible for both the insurer and consumer, providing an opportunity for InsurTech companies to shape future products that solve customer pain points. Payment and claims processes, on the other hand, are traditionally slower and prone to discrepancies and delays in reconciliation. InsurTech firms can work on innovating to create more accurate and efficient processes.

Talent came up as the second biggest hurdle for most insurers as a potential issue. It is important for insurers to double-down on their initiatives to get the right talent. The competitive pool of talent is gradually dwindling, as other industries are aggressively competing to hire the same group of people.

Hiring the right talent would also help drive transformation from within the company, and solve the legacy IT and infrastructure systems problems.

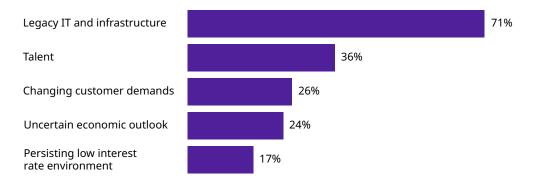
Exhibit 12: What are the biggest hurdles in reinventing the insurance business for the future?



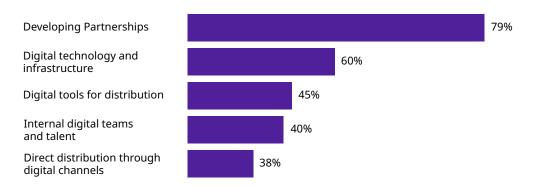
70%

of industry C-suite executives think that legacy IT and infrastructure systems are their biggest hurdle and 60% are also investing in them

What are the biggest hurdles in reinventing the insurance business for the future?



In which of the following areas do you plan to invest the most over the next 1-3 years?



Source: Oliver Wyman C-Suite Survey results, CEOs across Asia, n=42

Additionally, insurers believe that the right way forward over the next one to three years would be to develop strong partnerships, acknowledging that the journey of transformation requires support from external allies. It is important to choose the right partners to work together on these large-scale, multi-year programmes. The biggest challenge ahead for insurance companies would be to create a single platform that integrates the various operations of partner companies. If insurance companies can successfully create this platform, they will have set up a strong customer ecosystem that may well be pivotal in retaining customer loyalty and improve customer propositions.

FUTURE STATE OF INSURANCE AND INSURTECHS

For the past decade, startups have emerged in the insurance market, seeking to deliver more customer-centric insurance products and services in more efficient ways. The InsurTech scene in Asia has picked up a lot of pace in recent years, and many signs point to Asia being the hotbed for the next generation of InsurTechs.

The relatively low insurance penetration rate across multiple markets, coupled with high e-commerce and social penetration, represents a growing opportunity for insurers to develop niche and tailored local products for consumers. Many countries, such as Thailand, Malaysia, and Singapore, have already developed regulatory sandboxes for startups to test their new business models in a safe and regulated environment.

In order to understand which area provides the best opportunity for disruption, it is important to have a holistic view of the insurance value chain. Consumers' growing expectations for ondemand products, instant access to sales providers, and an omnichannel experience provide an opportunity for InsurTech firms to create more customer-centric product offerings. By collecting and analysing unprecedented amounts of data, InsurTech products will continue to create solutions across the entire insurance value chain:

- Marketing and Distribution, Platforms, and Partnerships: InsurTechs are collaborating with traditional insurance companies and digital platforms to develop value-added solutions.
- **New Insurance Service Offerings:** New products and offerings in the digital space have emerged, such as usage-based insurance and digital assets insurance.
- **Customer Experience:** InsurTechs are delivering innovative, personalised, simple, and digital products with a seamless customer experience. For example, artificial intelligence can improve customer interaction and conversion ratios, as well as reduce claims turnaround times.
- Underwriting and Risk: Sophisticated prevention models can offer new approaches to underwriting risk and predicting losses. More data from IoT sensors will result in a more holistic and accurate model of risk profiles, driving higher predictability towards personalised insurance products.
- Claims Management: Claims management is becoming faster and more efficient. For example, a leading Chinese InsurTech firm has shared that its automation rate of claims underwriting and settlement has exceeded 99 and 95 percent, respectively, and the proportion of artificial intelligence applied in online customer service has reached 70 percent, resulting in a 61 percent saving in terms of manpower.⁵

⁵ Company presentation

• **Data Management:** Data management is being enhanced by the development of data standards, blockchain technology, and aggregation, along with the application of enrichment capabilities through external data sources.

Insurance companies do not need to go through technological transformation by themselves. If they did, it would take them longer to build disruptive capabilities. Instead, insurers need to establish deeper relationships and collaborate in win-win partnerships with InsurTechs to fast track the transformation of the insurance industry. By working together, they can combine traditional insurers' underwriting capabilities and InsurTechs' technological solutions to deliver greater efficiencies and innovative improvements to insurance customers.

CONCLUSION

The insurance sector will continue to remain competitive, forcing both incumbents and new entrants to constantly innovate and refine their product offerings to meet the changing needs in the market. However, there are many growing trends that present themselves as significant opportunities for insurance companies to capitalise on, and they will need to focus on five key themes. Here is a summary of the themes that will shape the future of the industry.

- From product-centric to customer-centric: Go beyond standardised product solutions, engage with customers in a deeper, more meaningful way, and transform insurance into being a service focused on customer centricity.
- **Product innovation with modular solutions:** Leverage evolving digital and data capabilities to offer personalised solutions that suit individual needs.
- **Distribution and customer experience excellence:** Do away with the distinction of channels, and heighten customer experience by utilising the best of both personal and digital channels.
- **Development of partnerships with other industries to maximise value:** Continue partnering with other industries to create ecosystems and generate leads for sales, and leverage partnerships to go beyond sales to achieve operational breakthroughs.
- **Up-skilling and improving capabilities:** Train workforces to keep up with the development of digital technologies and so efficiently drive transformation across insurance companies.

Overall, the insurance industry needs to not only continue to play its core role of providing protection to its consumers, but also develop creative, customer-centric products that provide greater value. Despite the many challenges, the insurance industry presents many opportunities for companies that are willing to innovate and improve their operational models.

Oliver Wyman is a global leader in management consulting that combines deep industry knowledge with specialised expertise in strategy, operations, risk management, and organisation transformation.

For more information, please contact the marketing department by phone at one of the following locations:

EMEA +44 20 7333 8333 Americas +1 212 541 8100

Steven Chen

Principal

Asia Pacific +65 6510 9700

AUTHORS

Angat Sandhu

Partner angat.sandhu@oliverwyman.com

Jun Hao Tay Consultant junhao.tay@oliverwyman.com steven.chen@oliverwyman.com Bella Thamrin Ajit Rochlani Engagement Manager ajit.rochlani@oliverwyman.com

Consultant bella.thamrin@oliverwyman.com

Acknowledgements

We would like to thank Tomasz Kurczyk, Chairman, InsurTech sub-committee, Chia Hock Lai, President and the entire SFA team for their great support and contribution in developing this report and all the senior industry executives that responded to the survey.

We would also like to thank Prasanna Patil, Principal at Oliver Wyman, for his valued contributions towards this report.

Copyright © 2020 Oliver Wyman

All rights reserved. This report may not be reproduced or redistributed, in whole or in part, without the written permission of Oliver Wyman and Oliver Wyman accepts no liability whatsoever for the actions of third parties in this respect.

The information and opinions in this report were prepared by Oliver Wyman. This report is not investment advice and should not be relied on for such advice or as a substitute for consultation with professional accountants, tax, legal or financial advisors. Oliver Wyman has made every effort to use reliable, up-to-date and comprehensive information and analysis, but all information is provided without warranty of any kind, express or implied. Oliver Wyman disclaims any responsibility to update the information or conclusions in this report. Oliver Wyman accepts no liability for any loss arising from any action taken or refrained from as a result of information contained in this report or any reports or sources of information referred to herein, or for any consequential, special or similar damages even if advised of the possibility of such damages. The report is not an offer to buy or sell securities or a solicitation of an offer to buy or sell securities. This report may not be sold without the written consent of Oliver Wyman.