

Transforming the Insurance Landscape: Digitalization Trends and Regulatory Challenges in Hong Kong

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Hong Kong, recognized as a preeminent international insurance hub, is experiencing a significant transformation in its traditional insurance landscape, primarily driven by the rise of Insurtech startups, including fully virtual insurers. This evolution is further supported by proactive regulatory initiatives from the Hong Kong Insurance Authority, aimed at enhancing operational efficiency and transparency within the sector. This paper provides a comprehensive comparative analysis of the digitalization of insurance in Hong Kong and Singapore, elucidating the current status and advancements in both regions. Additionally, it identifies potential challenges that may hinder the future development of the digital insurance sector in Hong Kong and offers insights to promote the digitalization process while addressing the regulatory complexities associated with Insurtech and virtual insurance. Despite the currently limited market share of digital insurers in Hong Kong, the momentum for transformation is undeniable, bolstered by technological advancements and an increasing demand within the Greater Bay Area market.

Background

Hong Kong's insurance industry continues to exhibit a significant reliance on traditional sales methodologies. Research indicates that the region has lagged behind both Singapore and Western markets in the adoption of digital insurance solutions, largely due to the industry's dependence on approximately 120,000 agents, particularly in the realm of life insurance products.¹ Insurance agents play a crucial role in providing guidance throughout the decision-making process for such products, which entail long-term commitments.

Historically, the insurance sector has been characterized by an intermediary-led distribution model, wherein agents, brokers, and banks serve as the primary channels for policy sales. This paradigm, however, presents multiple challenges, including elevated operational costs and limited direct access to customers. Nevertheless, the digital insurance landscape, spearheaded by virtual insurers, is experiencing rapid growth, with premiums escalating significantly between 2020 and 2021. This trend underscores the potential for a direct-to-consumer (D2C) digital distribution model to deliver more efficient solutions.²

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¹Enoch Yiu, "Hong Kong's digital insurance lags behind Singapore and Western peers over reliance on 120,000 sales agents, study shows," *South China Morning Post* (2023), available at <https://www.scmp.com/business/markets/article/3209155/hong-kongs-digital-insurance-lags-singapore-and-western-peers-over-reliance-120000-sales-agents> (visited 14 Sept 2024).

²Quinlan & Associates, *Examining the case for direct-to-consumer digital distribution in Hong Kong's insurance industry* (2022), available at <https://www.quinlanandassociates.com/wp-content/uploads/2022/12/Digital-Distribution-of-Insurance.pdf> (visited 14 Sept 2024).

Literature Review and Research Gap

Digitalization and technological innovation are driving an unprecedented shift in the insurance industry, combining digital and analog settings to improve operations, data accessibility, and consumer interactions. This trend, according to Eling and Lehmann, could be defined as digitalization, which radically changes the way insurance companies' function.³ Modern insurance practices require the integration of digital insurance administration systems and Insurtech solutions.⁴ "Insurtech" describes technological advancements intended to boost effectiveness across underwriting and customer service. The industry is changing through technologies such as big data analytics, cloud computing, and artificial intelligence (AI), enabling insurers to collect large volumes of data, improve risk assessment, and enhance customer service.⁵⁶⁷

To ensure innovation thrives alongside risk management, the regulatory environment needs to evolve⁸ with flexible, principle-based approaches to overseeing Insurtech while promoting innovation.⁹ In 2012, the Hong Kong Government announced its intention to establish an Independent Insurance Authority to replace the Office of the Commissioner of Insurance (OCI), as detailed in a consultation paper titled "Key Legislative Proposals on the Establishment of an Independent Insurance Authority," published by the Financial Services and the Treasury Bureau. This initiative aimed to enhance regulatory oversight and streamline licensing for insurance intermediaries.¹⁰ The Insurance Companies (Amendment) Ordinance 2015 subsequently conferred upon the Insurance Authority the authority to license and regulate all insurance intermediaries in Hong Kong, centralizing oversight and enhancing regulatory efficacy.¹¹ This represents a significant shift, as the Insurance Authority acquired

³ Eling, M., Lehmann, M., "The Impact of Digitalization on the Insurance Value Chain and the Insurability of Risks," *Geneva Pap Risk Insur Issues Pract* 43, 359–396 (2018), available at <https://doi.org/10.1057/s41288-017-0073-0> (visited 05 Nov 2024).

⁴ Stoeckli, E., Dremel, C. & Uebernickel, F., "Exploring characteristics and transformational capabilities of InsurTech innovations to understand insurance value creation in a digital world," *Electron Markets* 28, 287–305 (2018), available at <https://doi.org/10.1007/s12525-018-0304-7> (visited 05 Nov 2024).

⁵ Cappiello, A., "The technological disruption of insurance industry: a review," *International Journal of Business and Social Science*, Vol.11, No.1 (2020), available at <https://www.ijbssnet.com/journal/index/4371> (visited 05 Nov 2024).

⁶ Eti, S., Dinçer, H., Meral, H. et al., "Insurtech in Europe: identifying the top investment priorities for driving innovation," *Financ Innov* 10, 38 (2024), available at <https://doi.org/10.1186/s40854-023-00541-y> (visited 05 Nov 2024).

⁷ Zarifis A. & Cheng X., "A model of trust in Fintech and trust in Insurtech: How Artificial Intelligence and the context influence it," *Journal of Behavioral and Experimental Finance*, vol. 36, pp.1–20 (2022), available from: <https://doi.org/10.10>, Available at SSRN: <https://ssrn.com/abstract=4223846> (visited 05 Nov 2024).

⁸ Stefan Koos, "Digital Globalization and Law," *Lex Scientia Law Review* 6, no. 1 (2022): 33–68, <https://doi.org/10.15294/lesrev.v6i1.55092> (visited 05 Nov 2024).

⁹ Greineder, M., Riasanow, T., Böhm, M., & Krcmar, H., "The Generic InsurTech Ecosystem and its Strategic Implications for the Digital Transformation of the Insurance Industry," *EMISA FORUM* (2019) (visited 05 Nov 2024).

¹⁰ Meggitt, Gary, "The Hong Kong Independent Insurance Authority," *The Journal of Comparative Law* (2012) 7.2 JCL - Forthcoming, University of Hong Kong Faculty of Law Research Paper No. 2013/030, Available at SSRN: <https://ssrn.com/abstract=2290130> (visited 05 Nov 2024).

¹¹ Insurance authority, *Implementation of New Regulatory Regime for Insurance Intermediaries*,

expanded powers, enhancing adaptability to the evolving landscape. The Hong Kong Insurance Authority (HKIA) is advancing initiatives such as the virtual insurance licensing framework to promote Insurtech, reflecting a rigorous and dynamic regulatory environment.

The regulatory framework of Singapore, one of Asia's insurance hubs, is adaptable and flexible. Through initiatives that foster innovation, customer protection, and cyber security, the Monetary Authority of Singapore (MAS) acknowledged the potential of Insurtech to redefine traditional models,¹² understanding that regulators must create an environment conducive to innovation.¹³ Because of regulatory flexibility, Singapore creates an atmosphere favorable to Insurtech and promotes legislation that fosters digital innovation. Digital transformation has become an imperative for enterprises seeking to uphold competitive advantages.¹⁴ Consequently, more Insurtech companies are entering the market, offering services tailored to evolving expectations,¹⁵ while partnerships between Insurtech companies and traditional insurers foster innovation.¹⁶ The influx of new Insurtech companies highlights the role of regulatory support and industry collaboration in both Hong Kong and Singapore.¹⁷

Nevertheless, there is a lack of studies focused specifically on insurance digitalization in Hong Kong, and even fewer comparative analyses with Singapore. This study fills the gap by examining how different regulatory approaches influence the development of digital insurance in the two jurisdictions.

Comparative Analysis of Insurtech Development in HK and Singapore

Similarities in Insurtech Development in both jurisdictions

Hong Kong and Singapore have many similarities in their approaches to Insurtech, including proactive regulatory bodies, innovative sandbox initiatives,¹⁸ emphasis on

(2019), available at https://www.ia.org.hk/en/supervision/reginsintermediaries/implementation_new_regulatory_regime_for_insurance_intermediaries.html (visited 05 Nov 2024).

¹²Harit, Prakhar, "The Rise of Insurtech: The Ups and Downs of New Tech Trend" (March 7, 2021). Available at SSRN: <https://ssrn.com/abstract=3799576> (visited 05 Nov 2024).

¹³International Association of Insurance Supervisors, *FinTech Developments in the Insurance Industry*, at para 17, available at https://www.iaisweb.org/uploads/2022/01/Report_on_FinTech_Developments_in_the_Insurance_Industry.pdf (visited 05 Nov 2024).

¹⁴Bian, W., Ge, T., Ji, Y., & Wang, X. (2023, Aug), "How is Fintech reshaping the traditional financial markets? New evidence from InsurTech and insurance sectors in China", *China Economic Review*, 80, Article 102004 available at <https://doi.org/10.1016/j.chieco.2023.102004> (visited 05 Nov 2024).

¹⁵Braun, A., Haeusle, N., & Thistle, P., "Risk classification with on-demand insurance," *Journal of Risk and Insurance*, 90(4), 975–990 (2023), available at <https://doi.org/10.1111/jori.12429> (visited 05 Nov 2024).

¹⁶Harit, Prakhar, "The Rise of Insurtech: The Ups and Downs of New Tech Trend" (2021). Available at SSRN: <https://ssrn.com/abstract=3799576> or <http://dx.doi.org/10.2139/ssrn.3799576> (visited 05 Nov 2024).

¹⁷Eling, M., Lehmann, M., "The Impact of Digitalization on the Insurance Value Chain and the Insurability of Risks," *Geneva Pap Risk Insur Issues Pract* 43, 359–396 (2018), available at <https://doi.org/10.1057/s41288-017-0073-0> (visited 05 Nov 2024).

¹⁸Insurance Authority, *Insurance Digital Onboarding* (2024), available at https://www.ia.org.hk/en/digital_onboarding/promotion_of_insurtech_development.html#:~:text=Initiatives%20to%20promo

cybersecurity, and consumer protection. Both regions have developed comprehensive legal frameworks that balance innovation with market stability and consumer protection, positioning themselves as major hubs for Insurtech in Asia.

Proactive Regulatory Bodies with Comprehensive Regulatory Frameworks

HKIA has been instrumental in fostering digital transformation within the insurance sector. Recognizing the growing importance of technology, the HKIA has implemented policies and initiatives that support the development of Insurtech while maintaining safeguards to protect consumer interests. In 2017, the HKIA launched the Insurtech Sandbox and Fast Track initiatives,¹⁹ allowing insurers to experiment with new technologies in a controlled setting and expediting approval processes for digital-only insurers. This framework has facilitated market entry for firms such as Bowtie and ZA Insurance.²⁰ These initiatives illustrate the HKIA's commitment to balancing innovation with consumer protection. Concurrently, Hong Kong's cybersecurity framework aims to protect financial institutions and personal data from emerging threats through initiatives such as the Cybersecurity Fortification Initiative, along with guidelines from the Hong Kong Monetary Authority (HKMA), Financial Services Development Council (FSDC), and Securities and Futures Commission (SFC), all in alignment with global best practices.²¹

The MAS, through its FinTech and Innovation Group (FTIG), has taken a similarly forward-looking approach. In 2016, the MAS launched the FinTech Regulatory Sandbox,²² which allows Insurtech companies to trial products in a live environment with relaxed regulations. This encourages firms to experiment with new solutions while maintaining regulatory oversight. Consequently, digital-first insurers like Singlife have emerged, operating through digital channels.²³ The MAS's regulatory support encompasses not only testing and scaling but also proactive guidelines for cybersecurity and data privacy, thereby enhancing market confidence and promoting the adoption of digital insurance. An example of this is the Cyber Risk Management Project launched in 2016, led by the Insurance Risk and Finance Research Centre

[te%20Insurtech&text=Insurtech%20Sandbox%20enables%20authorized%20insurers,supervisory%20requirements%20of%20the%20IA](https://www.mas.gov.sg/development/fintech/regulatory-sandbox) (visited 05 Jan 2025). Monetary Authority of Singapore, *Overview of Regulatory Sandbox* (2024), available at <https://www.mas.gov.sg/development/fintech/regulatory-sandbox> (visited 05 Jan 2025).

¹⁹Insurance Authority, *Quarterly Release of Provisional Statistics for General Business*, available at https://www.ia.org.hk/en/infocenter/statistics/quarterly_release_of_provisional_statistics_for_general_business.html (visited 14 Sept 2024).

²⁰Coverager.com, *ZA Insure obtains a digital life insurance license in Hong Kong* (2020), available at <https://www.coverager.com/za-insure-obtains-a-digital-life-insurance-license-in-hong-kong/> (visited 14 Sept 2024). Bowtie, *What does IA's "Fast Track" mean* (2021), available at <https://help.bowtie.com.hk/hc/en-gb/articles/4407712528153-What-does-IA-s-Fast-Track-mean> (visited 14 Sept 2024).

²¹HKMA, *Cybersecurity Fortification Initiative* (2016), available at <https://www.hkma.gov.hk/chi/key-functions/international-financial-centre/fintech/research-and-applications/cybersecurity-fortification-initiative-cfi/> (visited 9 Jan 2025). HKIA, *Guideline on Cybersecurity* (2019), https://www.ia.org.hk/en/legislative_framework/files/GL20_Eng.pdf.

²²Monetary Authority of Singapore, *MAS enhances FinTech regulatory sandbox with Sandbox Plus* (2021), available at <https://www.mas.gov.sg/news/media-releases/2021/mas-enhances-fintech-regulatory-sandbox-with-sandbox-plus> (visited 14 Sept 2024).

²³Ka Kay Lum, "Singlife's hybrid theory tested in Singapore's insurance forge," *The Ken* (2020), available at <https://the-ken.com/story/singlife-singapore-digital-insurance/> (visited 14 Sept 2024).

(IRFRC) at Nanyang Technological University, aimed at addressing supply and demand challenges in the emerging cyber insurance market.²⁴

Both Hong Kong and Singapore have their sights set on becoming leading Insurtech hubs in Asia. These regions foster collaboration and knowledge exchange within the global Insurtech ecosystem and position themselves to attract investment and partnerships from neighboring markets,²⁵ such as the Greater Bay Area (GBA) for Hong Kong and Association of Southeast Asian Nations (ASEAN) for Singapore, driving their influence beyond their borders, under a well-established regulatory framework for both traditional and digital insurance, with laws governing insurance activities and digital innovations. These regulations ensure that digital innovations comply with legal and ethical standards.²⁶

Emphasis on Cybersecurity

Cybersecurity is a paramount concern for Hong Kong and Singapore, particularly as the sector transitions to digital platforms. Both jurisdictions have established cybersecurity frameworks to protect sensitive customer data and safeguard against cyber threats, ensuring that digital insurance platforms remain secure and compliant with evolving risks.

In 2019, the Insurance Authority (IA) of Hong Kong published the Guidelines on Cybersecurity (GL20) under section 133(1) of the Insurance Ordinance (Cap. 41), which took effect on January 1, 2020. These guidelines aim to regulate the insurance industry and protect policyholders from online threats by outlining specific measures insurers must adopt to secure sensitive customer information and operational platforms. Key areas of focus include comprehensive risk management practices that require regular assessments of potential cyber vulnerabilities; robust data protection protocols to safeguard personal and financial information against unauthorized access; and well-defined incident response plans to ensure swift action in the event of cyberattacks or breaches. In Singapore, the Technology Risk Management (TRM) Guidelines were introduced in 2013 to enhance cybersecurity across the financial and insurance sectors, emphasizing risk management, IT security, and protection of digital infrastructure from cyber threats. In 2019, the Monetary Authority of Singapore (MAS) strengthened these measures with the Notice on Cyber Hygiene (MAS Notice 655), mandating critical cybersecurity practices such as user access controls, regular security patching, and data encryption. Together, these frameworks establish comprehensive cybersecurity standards, requiring insurers to implement robust IT security measures, including firewalls, encryption technologies, and intrusion detection systems.

²⁴Nanyang Technological University, *Insurance risk and finance research centre*, available at <https://www.ntu.edu.sg/irfrc/research/cyrim> (visited 14 Sept 2024).

²⁵InvestHK, *Fintech HongKong*, available at <https://www.hongkong-fintech.hk/en/index.html> (visited 14 Sept 2024). Singapore Fintech Festival, *The global gathering of policy, finance & technology*, available at <https://www.fintechfestival.sg/> (visited 14 Sept 2024).

²⁶See reference list

Focus on Consumer Protection

Consumer protection is a top priority for both Hong Kong and Singapore, ensuring that digital insurance platforms operate transparently, fairly, and ethically. Regulatory bodies require insurers to disclose necessary information, protect consumer data, and use technology responsibly.

The Insurance Ordinance (Cap. 41) forms the backbone of the insurance regulatory framework in HK, establishing requirements for both traditional and digital insurers. To address the unique challenges of the digital landscape, the Guidelines on the Use of Internet for Insurance Activities (GL8) set additional standards to ensure consumer protection in online insurance transactions and took effect on June 26, 2017.²⁷ Similarly, consumer protection in the digital insurance space in Singapore is governed by several regulations, including the Personal Data Protection Act (PDPA). The PDPA, which was established in 2013 and has been amended several times since, regulates how insurers handle personal data.²⁸ Furthermore, the MAS Guidelines on Provision of Digital Advisory Services issued in 2018 impose specific requirements on insurers and financial advisors that offer digital services.²⁹

Differences between Hong Kong and Singapore in the Development of Insurtech

The Stringent and Gradual Regulatory Environment in Hong Kong

Hong Kong's regulatory environment in the financial industry is deeply rooted in a cautious and incremental approach, with its well-established legal and regulatory structure,³⁰ especially regarding technological developments such as digital insurance platforms. The insurance market in Hong Kong is both large and mature, with substantial investments in traditional sales models relying on intermediaries. To protect this established market, the HKIA enforces stringent regulations, ensuring that both traditional and digital insurers adhere to high standards of risk management and operational integrity. This cautious stance is designed to prevent market disruptions arising from rapid digital transformation.

Moreover, the HKIA's measured approach allows insurers to experiment through controlled initiatives, such as the Insurtech Sandbox and Fast Track schemes introduced in 2017. These programs permit insurers to test technologies within a supervised environment, where risks are monitored and mitigated, and ensure that digital insurers undergo thorough vetting before approval. By prioritizing long-term sustainability, Hong Kong's regulatory environment balances innovation with consumer protection.

²⁷Insurance Authority, *Guideline on the use of internet for insurance activities* (2017), available at https://www.ia.org.hk/en/legislative_framework/files/GL8.pdf (visited 14 Sept 2024).

²⁸Personal Data Protection Commission Singapore, *PDPA overview*, available at <https://www.pdpc.gov.sg/overview-of-pdpa/the-legislation/personal-data-protection-act> (visited 14 Sept 2024).

²⁹Monetary Authority of Singapore, *MAS issues guidelines to facilitate provision of digital advisory services* (2018), available at <https://www.mas.gov.sg/news/media-releases/2018/mas-issues-guidelines-to-facilitate-provision-of-digital-advisory-services> (visited 14 Sept 2024).

³⁰Chen Yi & Ahmed Razman Bin Abdul Latiff, "The Role of Regulatory Frameworks in Shaping the Firm Value of Cross-Listed Companies: A Comparative Analysis," (2024) *Journal of Digitainability Realism & Mastery (DREAM)*, Volume 03, Issue 04, p 14. (visited 14 Sept 2024).

The Virtual Insurance Licensing Framework in Hong Kong

The HKIA has introduced a licensing framework for digital insurers, known as the Virtual Insurance License, to support technological innovation while maintaining regulatory supervision. Insurance businesses can operate fully online, removing the need for physical branches. The framework emphasizes digital-only sales, creating a clear regulatory distinction between digital-only and traditional insurers.

Customers can purchase online self-service insurance through the digital sales platform of the insurers. For these consumers, the HKIA has given some useful notes on its official website. For complex insurance products that require the involvement of intermediaries, non-face-to-face meetings through video conferencing are permitted, with strict guidelines in place to ensure security and transparency. The HKIA has also provided some tips for consumers who want to purchase insurance. Additionally, for Compliance with Existing Laws, any insurer wishing to operate under the Virtual Insurance License must comply with the Insurance Ordinance (Cap. 41), the Guidelines on the Use of Internet for Insurance Activities, the Guideline on Cybersecurity, and other related laws. These policies ensure that insurers implement the necessary security protocols for digital platforms, provide adequate training for intermediaries, and safeguard customer data through rigorous cybersecurity measures.

The Great Influence of Established Financial Giants in Hong Kong

Unlike Singapore, where the regulatory environment allows for more open economic policies, Hong Kong has favorable tax regulations and a stable political environment, as evidenced by the world's highest economic freedom score (updated in October 2023).³¹ Hong Kong's digital insurers must operate within an environment largely shaped by legacy institutions with long-standing ties to customers, agents, and banks. The strong foothold of traditional financial insurance institutions in Hong Kong helps to maintain their market position and enhances their dominance, even when confronted with unexpected challenges. Over the years, these organizations have established enduring relationships with customers, agents, and banks. The presence of these institutions maintains market stability but creates significant challenges for new entrants. Moreover, these financial giants have the means to create their own digital insurance products, allowing them to leverage their established customer bases and brand recognition.

These financial institutions can develop their own digital insurance products and leverage existing customer bases, making it difficult for newer digital insurers to compete. As a result, Insurtech development in Hong Kong is often guided by existing market structures rather than disruptive innovation. To overcome these challenges, digital insurers frequently collaborate with established institutions, which provides resources but may limit their independence and growth potential. This approach, while ensuring stability, may reduce the agility of smaller Insurtech firms.

³¹Kari Soo Lindberg, "Singapore beats Hong Kong to become 'world's freest economy' for first time," *Bloomberg* (2020), available at <https://www.bloomberg.com/news/articles/2023-09-20/singapore-beats-hong-kong-to-become-world-s-freest-economy-for-first-time?leadSource=verify%20wall> (visited 14 Sept 2024)

The Relatively Flexible and Adaptive Framework-Based Regulatory Environment in Singapore

The MAS oversees a more principle-based regulatory approach. Rather than imposing strict, sector-specific rules, the MAS allows firms to operate within broad financial guidelines, creating a space for experimentation and innovation. Insurtech companies are primarily governed by overarching regulations, such as the Insurance Act (Cap. 142), the Financial Advisers Act (Cap. 110), and the Payment Systems (Oversight) Act (Cap. 222A). These regulations set basic requirements for licensing, consumer protection, and disclosures, but they lack the highly detailed, activity-specific requirements seen in jurisdictions like in Hong Kong.

The MAS's FinTech Regulatory Sandbox, which was introduced in 2016, offers an even higher level of regulatory flexibility. This enables companies to test and scale innovations while still maintaining baseline consumer protections. The sandbox model not only encourages rapid prototyping but also invites collaboration with regulators, enabling the refinement of rules as new technologies evolve. This contrasts sharply with Hong Kong's sandbox model, which, while beneficial, still operates under a more controlled environment, particularly when dealing with new entrants like digital-only insurers. Furthermore, Singapore actively promotes green finance and sustainability through initiatives, such as the 2019 Green Finance Action Plan, which provides grants for green bond issuances.³²

Tax regimes in both jurisdictions are competitive but differ in focus. Hong Kong offers a simplified, low-tax system (8.25% on the first HKD 2 million and 16.5% thereafter, with offshore income tax-exempt), making it attractive for holding companies.³³ Singapore applies a 17% corporate tax rate and taxes offshore income only upon remittance, complemented by extensive double-taxation agreements and targeted incentives for startups.³⁴ For example, small firms with revenue below SGD 10 million are exempt from mandatory audits, reducing compliance costs. Overall, Singapore's system better supports innovation-driven businesses,³⁵ while Hong Kong prioritizes simplicity and offshore activity.

Singapore also benefits from stronger geopolitical stability and consistent governance, enhancing its appeal to multinational firms. While Hong Kong provides strategic access to Mainland China, it faces uncertainties linked to geopolitical tensions.³⁶ Both jurisdictions maintain robust legal systems and intellectual property protections, but Singapore's emphasis on innovation and digital infrastructure, through initiatives like Smart Nation, better supports emerging industries, with a positive

³²Green Finance Platform, *Singapore's Green Finance Action Plan*, (2019), available at <https://www.greenfinanceplatform.org/policies-and-regulations/singapores-green-finance-action-plan> (visited 5 Feb 2025).

³³HSBC, *A Complete Guide to Corporate Tax in Hong Kong*, (2024), available at <https://www.businessgo.hsbc.com/en/article/understanding-profit-tax-a-complete-guide-to-corporate-tax-in-hong-kong> (visited 8 Feb 2025).

³⁴PwC, *Singapore Corporate - Taxes on corporate income*, (2024), available at <https://taxsummaries.pwc.com/singapore/corporate/taxes-on-corporate-income> (visited 8 Feb 2025).

³⁵Dezan Shira & Associates, *Why Singapore*, (2024), available at <https://www.aseanbriefing.com/doing-business-guide/singapore/why-singapore> (visited 8 Feb 2025)

³⁶Guangyi Pan & Alexander Korolev, "The Struggle for Certainty: Ontological Security, The Rise of Nationalism, and Australia-China Tensions After COVID-19," *Journal of Chinese Political Science*, 26(1), 115–138. (2021) (visited 5 Feb 2025).

atmosphere that encourages businesses to innovate freely as the world's freest economy.³⁷ In contrast, Hong Kong remains more focused on traditional finance and logistics.

In summary, Singapore's principle-based framework, regulatory flexibility, and innovation-oriented policies make it particularly attractive for insurtech and growth-focused enterprises. Hong Kong remains competitive for traditional finance and regional access, but its rule-based approach and geopolitical risks may limit its appeal for innovation-led businesses.

Sandbox Comparison

The regulatory approaches of Singapore and Hong Kong diverge significantly in their treatment of Insurtech innovation, particularly within their respective sandbox regimes. From the authors' perspective, Singapore's framework is more flexible and adaptive, whereas Hong Kong's is comparatively cautious and incremental.

Approval Process: Rigidity vs. Agility

Hong Kong's Insurance Authority (HKIA) adopts a conservative and methodical approval process, characterized by extensive scrutiny and the absence of fixed timelines for preliminary feedback. This reflects a regulatory philosophy that prioritizes risk management and gradual technological integration. In contrast, Singapore's MAS employs a more agile approach, committing to provide an initial assessment within 21 working days. This structured responsiveness enhances predictability and supports faster strategic planning for applicants.

Flexible Parameters: Case-by-Case Evaluation vs. Collaborative Adaptation

Although the HKIA allows limited flexibility, it evaluates sandbox applications on a case-by-case basis without clearly defined relaxed requirements. This approach emphasizes cautious risk control and regulatory integrity. Conversely, MAS adopts a more collaborative model, encouraging ongoing dialogue and allowing applicants to refine and resubmit proposals. This iterative process supports regulatory adaptability and aligns with evolving technological developments.

Transparency and Public Disclosure: Controlled Information vs. Open Communication

Hong Kong maintains a relatively reserved stance on disclosure, with limited public information on sandbox applications, reflecting a preference for confidentiality and controlled experimentation. By contrast, Singapore emphasizes transparency, with MAS publishing details of approved sandbox projects, including applicant

³⁷Bloomberg, *Singapore beats Hong Kong to become 'world's freest economy' for first time* (2020), available at <https://www.bloomberg.com/news/articles/2023-09-20/singapore-beats-hong-kong-to-become-world-s-freest-economy-for-first-time?leadSource=uverify%20wall> (visited 14 Sept 2024).

identities and testing periods. This open communication enhances accountability, stakeholder engagement, and trust, reinforcing Singapore's innovation-friendly regulatory environment.

The Non-Existence of an Exclusive Digital-Only License in Singapore

As a developed city, Singapore embraces digital insurance and promotes Insurtech development. Digital insurers operate under general insurance regulations established by the Monetary Authority of Singapore (MAS), without a specific virtual insurance license as seen in Hong Kong, and utilize hybrid models combining online platforms with traditional channels such as agents, brokers, and banks.

While Hong Kong enforces strict conditions on its virtual insurance license, prohibiting the use of agents or bancassurance, Singapore allows digital insurers to operate under the same regulatory framework as traditional insurers. Thus, they are not restricted in their choice of distribution channels.

The MAS promotes digital innovation through initiatives like the FinTech Regulatory Sandbox, enabling companies to test digital insurance models in a controlled environment without mandating exclusive digital sales channels.

Regulatory Focus & Speed and Digitalization Prioritization in Singapore

Singapore's approach to digital transformation centers on building a comprehensive digital infrastructure to establish itself as a global innovation leader. The Smart Nation initiative spans multiple sectors, including fintech and Insurtech, with the MAS supporting developments through its FTIG. Its sandbox allows companies to test technologies in a flexible, risk-mitigated environment, enabling faster deployment. This flexibility, reinforced by Sandbox Express (with approvals often within 21 days), makes Singapore attractive to fintech and Insurtech firms.³⁸

In contrast, Hong Kong focuses on enhancing its existing financial infrastructure rather than pursuing full-scale transformation. Its strategy integrates digital technology into the current system to improve efficiency and security. Although Hong Kong also operates a sandbox, it emphasizes risk control and compliance, reflecting a more conservative approach that prioritizes market stability and results in a comparatively slower pace of innovation than Singapore.

Promotion of the Public–Private Partnership Model in Singapore³⁹

In Singapore, the promotion of Public–Private Partnerships (PPP) is central to encouraging innovation in sectors such as Insurtech. The MAS collaborates with private

³⁸he University of Hong Kong LiTELB, *Comparing the regulatory landscape for FinTechs regulated as fund managers to operate in Hong Kong and Singapore*, (2021) available at <https://lifelab.law.hku.hk/blogs/elementor-8009/> (visited 14 Sept 2024).

³⁹Gina Clarke, "Singapore launches world's first public-private partnership to create a new digital infrastructure," *The Fintech Times* (2020), available at <https://thefintechtimes.com/singapore-launches-worlds-first-public-private-partnership-to-create-a-new-digital-infrastructure/> (visited 14 Sept 2024). FINTECH GLOBAL, *How Singapore Is Redefining AML Compliance through Innovative Collaborations* (2024), available at <https://fintech.global/2024/04/17/how-singapore-is-redefining-aml-compliance-through-innovative-collaborations/> (visited 14 Sept 2024). The Digital Insurer, *Singapore's dynamic InsurTech map – in collaboration with the Singapore FinTech Association*, available at <https://www.the-digital-insurer.com/dynamic-insurtech-maps/singapore/> (visited 14 Sept 2024).

firms through initiatives like the FinTech Regulatory Sandbox and Sandbox Express, allowing companies to test products in a controlled environment with regulatory guidance. This iterative feedback process enables firms to adjust their offerings while maintaining compliance with consumer protection standards. The Smart Nation initiative further supports collaboration between the government and private sector in developing digital infrastructure.

While both regions incorporate top-down elements in their regulatory frameworks, Singapore's approach actively promotes innovation, contrasting with the more traditional and occasionally rigid regulatory structure found in Hong Kong. This is evident in initiatives like the fintech sandbox and government-led projects, such as the Smart Nation initiative, launched in 2014, along with the FinTech Innovation Lab established in 2016, all of which have attracted significant venture capital investment.⁴⁰ Thus, it is reasonable to characterize Hong Kong as more top-down in certain respects, particularly concerning its regulatory processes, while Singapore effectively balances top-down governance with a robust commitment to fostering innovation. This focus arises from Hong Kong's long-established financial market, which prioritizes stability and adherence to regulations.⁴¹ The regulatory framework in Hong Kong aims to mitigate risks, which can slow the adoption of innovative practices by requiring businesses to meet established standards before introducing new technologies. In contrast, Singapore's public-private partnership (PPP) model fosters a more collaborative environment, with the Monetary Authority of Singapore (MAS) actively supporting companies during product development.

Qualitative Analysis with Data Illustrations

Digital Insurers in the Hong Kong Non-Life Market

Figures 1 and 2 illustrate the performance of digital non-life insurers OneDegree and Avo in Hong Kong from 2019 to 2023, comparing premiums and claims across five sectors. OneDegree showed strong growth in Property Damage, with gross premiums rising from HKD 8.1 million in 2020 to HKD 161.6 million in 2023. Other Business premiums reached HKD 19.4 million, and Accident & Health premiums increased modestly. Claims for Property Damage also rose significantly from HKD 1.4 million to HKD 25.3 million. By contrast, Avo's growth was more limited in Property Damage but stronger in Accident & Health, where gross premiums reached HKD 85.2 million in 2023. Claims in this segment also increased substantially, while other categories remained minimal.

⁴⁰Smart Nation and Digital Government Office, *Our Smart Nation Vision*, (2025), available at <https://www.smartnation.gov.sg/vision/> (visited 14 Sept 2024). Government of Singapore, *MAS establishes FinTech Innovation Lab*, (2019), available at <https://www.mas.gov.sg/news/media-releases/2016/mas-establishes-fintech-innovation-lab> (visited 14 Sept 2024).

⁴¹Chu, Kam Hon. "Financial Development in Hong Kong and China: A Hayekian Perspective." *Cato Journal* 25–44. (2021) (visited 14 Sept 2024).

Figure 1 & Figure 2. Non-Life Digital Insurers: Premiums and Claims, HKIA⁴²

Gross and Net Premiums	Year	Property Damage		Accident & Health		Pecuniary Loss		Other Business		Employees' Compensation	
All in 000'		Gross	Net	Gross	Net	Gross	Net	Gross	Net	Gross	Net
OneDegree	2020	8,106	7,305	-	-	-	-	454	454	-	-
	2021	44,356	42,827	42	41	-	-	1,550	1,550	-	-
	2022	111,115	60,743	592	298	-	-	2,938	2,928	-	-
	2023	161,575	48,927	747	452	-	-	19,420	10,706	-	-
Avo	2019	300	300	32	20	3	1	-	-	-	-
	2020	745	745	262	165	5	2	-	-	-	-
	2021	609	609	574	403	-	-	244	193	-	-
	2022	1,111	1,111	676	407	211	209	6	3	12	7
	2023	718	712	85,176	84,061	8	8	25	26	64	64

Gross and in 000'	Year	Property Damage		Accident & Health		Pecuniary Loss		Other Business		Employees' Compensation	
		Gross	Net	Gross	Net	Gross	Net	Gross	Net	Gross	Net
OneDegree	2020	1,548	1,494	-	-	-	-	67	67	-	-
	2021	24,863	24,159	-	-	-	-	647	647	-	-
	2022	63,719	56,489	-	-	-	-	1,255	1,255	-	-
	2023	79,243	25,324	-	-	-	-	827	827	-	-
Avo	2019	-	-	-	-	-	-	-	-	-	-
	2020	-	-	4	2	-	-	-	-	-	-
	2021	2	2	2	1	1	1	-	-	-	-
	2022	78	78	18	9	-	-	-	-	-	-
	2023	144	141	27,621	27,317	-	-	-	-	-	-

The market share of the two digital non-life insurers has significantly increased over the past five years, rising from 0.001% in 2019 to 0.544% in 2023, as depicted in Figure 4. This growth reflects a growing acceptance of digital insurance products. Should this trend continue, digital insurers may capture a larger segment of Hong Kong's non-life insurance market in the coming years. Despite their rapid expansion, they still constitute a minor fraction of the overall market, indicating substantial potential for further growth. Notably, all market data pertains solely to Direct Business, excluding reinsurance data, as these insurers operate on a Business-to-Consumer model. The calculations for Figure 5 are detailed in Figures 6 and 7.

⁴²Insurance Authority, Quarterly Release of Provisional Statistics for General Business, available at https://www.ia.org.hk/en/infocenter/statistics/quarterly_release_of_provisional_statistics_for_general_business.html (Visited 14 Sept 2024).

Figure 3 & Figure 4. Non-Life Digital Insurers' Market Share, HKIA⁴³

	Year				
Gross Premium	2019	2020	2021	2022	2023
Total of two digital	335	9,572	47,375	116,661	267,733
Total of Non-Life	42,413,451	44,386,202	46,116,080	47,063,849	49,195,188
Market Share	0.001%	0.022%	0.103%	0.248%	0.544%

Year	Gross Premium Rate of Change	Paid Loss Ratio	Incurred Loss Ratio	Commission Ratio	Expense Ratio	Combine Ratio
2019	/	57%	62%	15%	19%	95%
2020	5%	53%	59%	15%	18%	92%
2021	4%	57%	61%	15%	17%	93%
2022	2%	53%	58%	15%	19%	92%
2023	5%	56%	64%	14%	19%	98%
2024-1H	-43%	56%	59%	12%	18%	89%

Figure 5. Non-Life Digital Insurers Ratio Performance, HKIA⁴⁴

Non-Life Digital Insurer	Year	Gross Premium Rate of Change	Paid Loss Ratio	Incurred Loss Ratio	Commission Ratio	Expense Ratio	Combine Ratio
OneDegree	2020	/	72%	81%	0%	299%	380%
	2021	437%	99%	108%	-1%	169%	276%
	2022	150%	89%	93%	-11%	208%	290%
	2023	59%	55%	55%	-35%	192%	213%
Avo	2019	-100%	0%	72%	0%	1377%	1449%
	2020	202%	0%	25%	-1%	2703%	2727%
	2021	/	0%	5%	-3%	2176%	2178%
	2022	41%	7%	18%	-6%	1640%	1651%
	2023	4165%	53%	100%	30%	48%	178%

⁴³Insurance Authority, *Quarterly Release of Provisional Statistics for General Business*, available at https://www.ia.org.hk/en/infocenter/statistics/quarterly_release_of_provisional_statistics_for_general_business.html (visited 14 Sept 2024).

⁴⁴Insurance Authority, *Quarterly Release of Provisional Statistics for General Business*, available at https://www.ia.org.hk/en/infocenter/statistics/quarterly_release_of_provisional_statistics_for_general_business.html (visited 14 Sept 2024).

Figures 6 & 7. Non-Life Digital Insurers Data and Market Data, HKIA⁴⁵

Non-life Market									
Total (Numbers all in 000')	Gross Premiums	Net Premiums	Net Earned Premiums	Net Commissions Payable	Net Claims Paid	Net Claims Incurred	Unexpired Risks Adjustment	Management Expenses	
2019	42,413,451	29,475,413	28,339,714	4,505,224	16,144,842	17,443,875	79,580	5,467,082	
2020	44,386,202	31,303,893	29,196,611	4,749,252	15,379,790	17,191,246	44,451	5,561,596	
2021	46,116,080	33,046,447	30,423,323	5,041,451	17,332,157	18,553,463	(3,045)	5,495,825	
2022	47,063,849	33,217,370	31,936,935	4,878,569	16,819,515	18,540,233	(89,510)	6,369,965	
2023	49,195,188	34,339,466	33,238,747	4,953,331	18,528,140	21,313,965	251,316	6,617,607	
2024-1H	27,797,838	19,016,370	17,223,115	2,337,163	9,572,365	10,081,755	73,026	3,366,422	
*Direct Business Only									
Non-Life Digital Insurer									
(Numbers all in 000')	Year	Gross Premiums	Net Premiums	Net Earned Premiums	Net Commissions Payable	Net Claims Paid	Net Claims Incurred	Unexpired Risks Adjustment	Management Expenses
OneDegree	2020	8560	7759	2180	0	1561	1756	0	23219
	2021	45948	44418	25134	(512)	24806	27071	0	75055
	2022	114645	63969	64767	(6899)	57744	60226	0	133187
	2023	181742	60085	47352	(20761)	26151	26131	0	115502
Avo	2019	335	321	25	(1)	0	18	0	4420
	2020	1012	912	1125	(9)	2	285	0	24649
	2021	1427	1205	950	(35)	4	44	0	26220
	2022	2016	1737	1291	(110)	87	226	0	28489
	2023	85991	84871	52099	25444	27458	52167	4950	40496

As for the financial ratios depicted in Figure 4, the non-life insurance market maintained a preferable combined ratio under 100% from 2019 onwards, ranging between 89% and 98%. This indicates that, overall, the non-life market was profitable during those years, as a combined ratio below 100% implies that insurers were making an underwriting profit (premiums exceeded claims and expenses). Both digital insurers have shown improvement in their financial ratios over time, though they are still struggling with profitability. As seen in Figure 7, OneDegree has shown slower premium growth in recent years but demonstrates better control over claims and expenses, reducing its combined ratio to 213% in 2023. However, it still has work to do to reach a sustainable break-even point. Avo has seen an incredible surge in premium growth, but its ratios suggest early struggles with cost control. The significant improvement in the expense ratio and combined ratio in 2023 points towards operational efficiency gains as the company matures. However, the loss ratios indicate that as more policies are written, Avo must carefully manage claims to avoid eroding profitability. In conclusion, both insurers are moving in the right direction, but they face challenges typical of digital startups in the insurance sector—mainly high operational costs and emerging claims pressures. Their long-term success will depend on continued efficiency improvements and managing the balance between growth and profitability.

⁴⁵ Insurance Authority. (2024, May 29). Quarterly Release of Provisional Statistics for General Business. Retrieved from https://www.ia.org.hk/en/infocenter/statistics/quarterly_release_of_provisional_statistics_for_general_business.html (visited on 14 Sept 2024).

Digital Insurers in the Hong Kong Life Market

Figure 8 summarizes premium performance of three digital life insurers from 2019 to mid-2024. Blue and ZA Insure rely more on single payments, while Bowtie emphasizes annual premiums for stability. Blue leads in single payments but is shifting toward annual premiums, while Bowtie's model supports retention. ZA Insure's reliance on single payments creates volatility.

Blue maintained stable annual premiums, while Bowtie's grew significantly from 2019 to 2023. ZA Insure experienced sharp fluctuations in single payments, with limited growth in annual premiums, reflecting weaker focus on recurring relationships.

Although market share remains small, annual premium share increased from 0.06% in 2020 to 0.11% in 2023 (Figures 9–10), indicating gradual consumer acceptance. Bowtie demonstrates the potential of sustainable recurring revenue, while single-payment shares declined from nearly 1% in 2020 to 0.51% in 2023, reflecting economic uncertainty and competition from traditional insurers.

Figure 8. Premium Data of Digital Life Insurers, HKIA⁴⁶

Sum of NB and Inforce Business	(in 000')	Premiums	
Life Digital Insurer	Year	Annual Payment	Single Payment
Blue	2020	255,394	1,196,671
	2021	212,068	1,335,867
	2022	233,324	435,125
	2023	254,918	663,858
	2024-1H	75,006	200,936
Bowtie	2019	2,448	-
	2020	37,593	-
	2021	103,314	-
	2022	160,186	-
	2023	211,442	-
	2024-1H	135,957	-
ZA Insure	2020	9,751	-
	2021	27,049	236,700
	2022	27,915	789,992
	2023	21,530	391,384
	2024-1H	12,281	400,658

⁴⁶Insurance Authority, *Quarterly Release of Provisional Statistics for General Business*, available at https://www.ia.org.hk/en/infocenter/statistics/quarterly_release_of_provisional_statistics_for_general_business.html (Visited 14 Sept 2024).

Figure 9. Life Digital Insurers' Market Share, HKIA⁴⁷

Sum of New and Inforce Business										
Year	2020		2021		2022		2023		2024-1H	
Gross Premium (in 000')	Annual Payment	Single Payment	Annual Payment	Single Payment	Annual Payment	Single Payment	Annual Payment	Single Payment	Annual Payment	Single Payment
Total of 3 digital insurers	302,738	1,196,671	342,431	1,572,567	421,425	1,225,117	487,890	1,055,242	223,244	601,594
Total of Life Market	504,529,283	120,910,448	464,962,955	193,469,413	393,720,513	182,445,459	458,482,707	169,930,481	270,143,586	99,786,461
Market Share	0.06%	0.99%	0.07%	0.81%	0.11%	0.67%	0.11%	0.62%	0.08%	0.60%

Figure 10. Life Market Data, HKIA⁴⁸

(HK\$'000)	Year	New Business				In-Force Business				sum of NB and Inforce Business		
		No. of Policies		Premiums		No. of Policies		Premiums		No. of Policies		Premiums
		Annual Payment	Single Payment	Annual Payment	Single Payment	Annual Payment	Sums	Annual Payment	Single Payment	Annual Payment	Annual Payment	Single Payment
Market Total	2020	989,061	55,940	72,968,529	60,074,675	14,793,632	8.253E+09	431,560,754	60,835,773	15,782,693	504,529,283	120,910,448
	2021	884,434	106,337	70,183,881	96,247,022	15,122,560	8.626E+09	394,779,074	97,222,391	16,006,994	464,962,955	193,469,413
	2022	684,703	77,616	43,497,463	90,923,997	15,211,777	8.741E+09	350,223,050	91,521,462	15,896,480	393,720,513	182,445,459
	2023	895,963	62,570	95,958,198	84,694,909	15,398,684	9.041E+09	362,524,509	85,235,572	16,294,647	458,482,707	169,930,481
	2024-1H	480,066	35,151	66,205,120	49,393,486	15,501,313	9.200E+09	203,938,466	50,392,975	15,981,379	270,143,586	99,786,461

Digital Channel Performance of the L&H Business in Singapore

Despite the limited data released by the MAS, Life Insurance Association Singapore, and the General Insurance Association of Singapore regarding digital channel performance, it is still worth looking at a rough overview of the new business performance of life and health insurance products from 2019 to 2023, as shown below in Figure 11, with a focus on the Online Direct Channel (ODC). This channel refers to digital platforms developed and maintained by life insurers, allowing customers to purchase life policies directly without the need for intermediaries.

Figure 11. Market Share of the Online Direct Channel, LIAS⁴⁹

New Business (Individual Life & Health)	2019		2020		2021		2022		2023	
	#	%	#	%	#	%	#	%	#	%
Total Weighted Premium	4,253.6m		4,383.1m		\$5,381m		\$5,098m		\$4,901m	
Online Direct Channel	9m	0.2%	180m	4.1%	\$189m	3.5%	\$144m	2.8%	\$85m	1.7%

Online Direct Channel refers to any web portal or application in the internet created, developed and maintained or operated by any direct life insurer, on which a client may purchase a life policy.

This is a new category with data collected starting Q1'19.

Broadly, from 2019 to 2023, the total weighted premiums for new business in the individual life and health insurance sectors grew from SGD \$4,253.6 million to SGD \$4,901 million, reflecting a steady demand for these products. The premium volume peaked in 2021 at SGD \$5,381 million, possibly due to increased awareness around health and financial security following the global pandemic. However, after 2021, the total weighted premium showed a slight decline, falling to SGD \$5,098

⁴⁷Insurance Authority. *Quarterly Release of Provisional Statistics for Long Term Business*, available at https://www.ia.org.hk/en/infocenter/statistics/quarterly_release_of_provisional_statistics_for_long_term_business.html (Visited 14 Sept 2024).

⁴⁸Insurance Authority. (2024, May 30). *Quarterly Release of Provisional Statistics for Long Term Business*. Retrieved from https://www.ia.org.hk/en/infocenter/statistics/quarterly_release_ofprovisional_statistics_for_long_term_business.html (visited on 14 Sept 2024).

⁴⁹Life Association Singapore, *Life insurance industry results* (2024), available at https://www.lia.org.sg/media/4142/20240215_lia-4q2023-results_slides.pdf (visited 14 Sept 2024).

million in 2022 and further to SGD \$4,901 million in 2023. This dip could be linked to market normalization post-pandemic or economic pressures affecting consumer purchasing behavior. Data regarding the performance of the ODC were first collected in 2019, marking the industry's focus shift towards digitalization. In 2019, the ODC accounted for SGD \$9 million, which was just 0.2% of the total weighted premium for that year. By 2020, this channel saw a remarkable increase, contributing SGD \$180 million, making up 4.1% of the total weighted premium. This significant growth reflects the early success of digital insurance platforms in response to changing consumer behaviors during the pandemic, where digital interactions became a necessity rather than an option. Namely, the COVID-19 pandemic greatly hastened the shift towards digital adoption and even altered the perspectives of traditional stakeholders.⁵⁰ In 2021, ODC continued to grow but at a slower pace, reaching SGD \$189 million and representing 3.5% of total premiums. In 2022, ODC premiums dropped to SGD \$144 million, accounting for 2.8% of total premiums, suggesting a potential saturation of the ODC market, or perhaps a shift in consumer preferences back towards traditional purchase methods as the impact of the pandemic waned. The decrease continued into 2023, where ODC premiums captured only 1.7% of the market; this could indicate several factors, including increased competition from traditional channels that provide non-product-related services, changing consumer sentiment, or insufficient digital product differentiation.⁵¹

When comparing the life insurance markets of Singapore and Hong Kong, while Hong Kong's digital life insurers have been slower to gain market share, Singapore's ODC had a spike during the pandemic and ended up taking 4.1% of the total weighted premiums in 2020. Singapore's ODC share dropped to 1.7% by 2023, indicating a stabilization or a return to traditional channels as the preferred option, likely due to the importance of relationship-building and trust in influencing consumer decisions. This highlights the varying digital adoption rates between the two regions.⁵²

While some may contend that the market share of digital insurance in Hong Kong is relatively small compared to Singapore and that growth trends from 2020 to 2024 have not been consistently upward, it is crucial to consider the broader context of the evolving landscape. Hong Kong's digital insurers are actively expanding their offerings, with several Insurtech companies launching innovative products that cater

⁵⁰Matthias de Ferrieres, "The Rise of the Digital Economy: Estimating the Impact of a New Generation of Entrepreneurs as Disruptive Entrants in the Insurance Industry in Singapore," *ResearchGate* (2021), available at https://www.researchgate.net/publication/350725834_THE_RISE_OF_THE_DIGITAL_ECONOMY_ESTIMATING_THE_IMPACT_OF_A_NEW_GENERATION_OF_ENTREPRENEURS_AS_DISRUPTIVE_ENTRANTS_IN_THE_INSURANCE_INDUSTRY_IN_SINGAPORE DOI:10.13140/RG.2.2.29404.51849 (visited 25 Jan 2025).

⁵¹Trembly, Ara C., 2001, "Why the insurance industry has failed in the online distribution channel," *National Underwriter* (Life & Health Services edition), 105: 19–21.

⁵²James F. Devlin and Sarwar Azhar, "'Life would be a lot easier if we were a Kit Kat': Practitioners' views on the challenges of branding financial services successfully." *Journal of Brand Management*, 12(1), pp.12–30 (2004). Rafael Bravo, Teresa Montaner and Jose M. Pina, Corporate brand image of financial institutions: a consumer approach. *Journal of Product & Brand Management*, 21(4), pp.232–245 (2012). S.M.A. Moin, James Devlin and Sally McKechnie, The magic of branding: The role of 'pledge,' 'turn' and 'prestige' in fostering consumer trust in financial services. *Journal of Financial Services Marketing*, 21(2), pp.113–126 (2016). Leonard L. Berry, Cultivating service brand equity. *Journal of the Academy of Marketing Science*, 28(1), pp.128–137 (2000).

to both single and annual premium payment options. This shift indicates a growing consumer preference for online platforms, reflecting increased comfort with digital solutions for insurance needs.

Moreover, these companies are strategically focusing on building long-term relationships with clients, which is essential for establishing trust in an industry traditionally reliant on face-to-face interactions. This emphasis aligns with consumer demands for more flexible and accessible insurance solutions. The market potential is further enhanced by the influx of clients from the Greater Bay Area (GBA), supported by favorable cross-border regulations that facilitate seamless interactions between insurers and clients. As these regulatory frameworks evolve, they are likely to foster a more integrated insurance market benefiting both consumers and providers. The introduction of tailored products for the GBA market, such as Avo Insurance's Northbound Dental Insurance launched in November 2024, exemplifies this growth potential by offering coverage for individuals aged 1 to 80, regardless of Hong Kong ID status.⁵³ This inclusivity not only expands the client base but also highlights digital insurers' commitment to addressing the diverse needs of consumers in the region. As time progresses, the synergy of innovative product offerings, supportive regulatory environments, and a growing customer base from the Greater Bay Area (GBA) is likely to significantly enhance the market share of digital insurance channels in Hong Kong. This evolution signifies a dynamic shift in the insurance landscape, propelled by technological advancements and changing consumer behaviors.

Challenges and Opportunities in Hong Kong

Existing Challenges

Competition from Traditional Insurers

Even with the innovation and client convenience that digital insurers provide, their share of the industry is still tiny. Digital insurers have struggled to exceed the 1% threshold in annual premiums, and non-life businesses are in a similar position. This suggests that growth in such a competitive market is gradual.

In Hong Kong, in-person interaction with agents remains an essential component of the insurance-buying process, as conventional insurers benefit from strong reputations and established customer trust. Traditional insurers also maintain extensive distribution networks, including bancassurance partnerships, which provide a competitive advantage, particularly for complex products such as whole life or investment-linked policies.

Additionally, traditional insurers offer a wider range of products and can bundle and cross-sell insurance plans, enhancing customer retention. Their stronger capital reserves and established reinsurance relationships allow them to withstand higher claims and economic fluctuations more effectively, enabling them to offer competitive pricing. By contrast, digital insurers face challenges in building trust, expanding product offerings, and competing on price, particularly among more conservative

⁵³Avo Insurance Company Limited, *Northbound Dental Insurance - Extensive dental network covering essential care* (2024), available at <https://www.heyavo.com/en/products/dental> (visited 20 Nov 2024).

consumers. Beyond these competitive pressures, digital insurers also face inherent risks associated with technology-driven models. Automated underwriting and claims processing systems, while efficient, may inadvertently introduce algorithmic bias if not carefully designed and monitored, potentially leading to unfair outcomes for certain consumer groups. Additionally, the reliance on digital platforms risks excluding non-tech-savvy populations, particularly older adults and those in lower-income brackets, who may lack the digital literacy or access required to navigate online insurance platforms. These issues highlight that digitalization, while beneficial, must be accompanied by safeguards to ensure equitable access and fair treatment.

Profitability Pressures

Although the market has gradually accepted digital insurers, profitability remains a major obstacle. Operating costs are frequently higher in the early stages, as digital insurers must invest heavily in technology infrastructure, regulatory compliance, and customer acquisition. While digital models aim to reduce costs through automation, developing and maintaining platforms for underwriting, claims handling, and customer support requires significant upfront expenditure. In addition, digital insurers must invest in marketing and partnerships to build brand awareness in a competitive environment, which further increases costs.

The combined ratio, representing the sum of the loss ratio and expense ratio, remains a key indicator of profitability. Although digital insurers have shown improvements in cost control, they continue to face challenges in managing claims as their policy base expands. Limited historical data and evolving risk profiles of new customer segments may lead to difficulties in pricing and higher claims volatility. As a result, digital insurers generally experience a longer path to profitability compared to traditional insurers. Achieving sustainable profitability requires improvements in both scale and operational efficiency, which may take several years in a market such as Hong Kong.

Long-Term Strategic Considerations

In Hong Kong's life insurance market, a distinction exists between the performance of digital insurers in annual payment plans versus single payment plans. Annual payment premiums, which allow clients to make smaller and more frequent payments, have been relatively more stable and contribute to customer retention and recurring income. Conversely, single payment premiums, which require substantial upfront commitments, have shown greater volatility. Their market share fluctuates in response to economic conditions, as such products may be less attractive during periods of uncertainty. This segment also continues to be dominated by traditional insurers with established distribution networks.

Many consumers still prefer purchasing high-commitment insurance products from traditional providers due to the in-person support available and the complexity involved in such policies. For digital insurers, this highlights a continuing trust gap, particularly in relation to long-term and high-value products. To remain competitive, digital insurers must develop product strategies that address these market characteristics. While younger, tech-savvy consumers are more willing to adopt digital insurance, they often prefer lower-cost and short-term products, which may limit revenue growth.

Therefore, digital insurers need to balance accessible offerings with more comprehensive products that cater to a broader customer base and evolving financial needs.

Regulatory and Operational Challenges

As companies grow, digital insurers must also address regulatory constraints and preserve operational efficiency. There are unique operational and regulatory hurdles when operating as a digital insurer in a highly regulated sector like insurance. These may affect the scalability, innovation, and competitiveness of digital insurers. One of the most heavily regulated industries is insurance, with stringent rules controlling everything from capital requirements to consumer protection, data privacy, and claims handling. These regulations, which are frequently created with traditional insurers in mind, provide several obstacles for digital insurers operating in Hong Kong, including capital and solvency requirements like Hong Kong Risk-Based Capital. Digital insurers must comply with the capital adequacy and solvency standards set forth by the HKIA, just like traditional insurers do. Digital startups that lack the same financial resources as more established players may find it challenging to meet these requirements. While keeping adequate reserves to pay claims is necessary, doing so may prevent them from reinvesting profits in expansion and innovation. Additionally, digital insurers frequently work to launch cutting-edge goods that meet the evolving demands of their clients. Regulatory agencies must first approve these products though. The length of the approval procedure can hinder the speed at which digital insurers can launch new products. In addition, they are subject to more stringent regulations concerning data protection and cyber security. Given how much digital insurers depend on online platforms and the gathering of private client information, customer trust might be further undermined by costly fines and reputational harm resulting from a data breach or cyber security failure. Therefore, for digital insurers, making investments in cyber security solutions and guaranteeing adherence to data protection laws are essential to business operations. Beyond cybersecurity and data protection, regulators and insurers must also address the societal implications of digitalization. The potential for algorithmic bias in automated decision-making and the digital exclusion of less tech-savvy populations are growing concerns that require proactive oversight. Without appropriate safeguards, the efficiency gains from digitalization may come at the cost of fairness and accessibility, undermining consumer trust and regulatory objectives.

Meanwhile, the rise of insurance aggregators in Singapore and Hong Kong signifies a major change in the insurance industry's digitalization. However, the emergence of these platforms also brings with it new difficulties that require attention, especially in the regulatory area. Market manipulation is one of the main problems that aggregators bring with them. These platforms have significant control over whether products are highlighted or given better rankings because they are increasingly serving as intermediaries between consumers and insurers. Aggregators and specific insurers may occasionally collaborate to promote the latter's products more widely in exchange for increased commissions or fees. This approach may cause market distortion and an unfair playing field for insurers, especially for smaller players or recent entrants who are unable to pay for increased exposure.

The Digitalization in Insurance Guide from Baker McKenzie Law Firm highlighted that⁵⁴, at present, Hong Kong lacks specific regulations governing the advertisement of insurance products on online platforms or the utilization of insurance aggregators. Nevertheless, if a third-party online platform engages in the promotion of insurance products and is deemed to be involved in regulated insurance activities, it may be necessary for that platform to acquire the appropriate insurance license. While the practices of using insurance aggregators and advertising insurance products online are not explicitly outlined in regulatory frameworks, it is essential for these activities to comply with existing laws and regulations. This includes adhering to fundamental advertising standards that ensure transparency, honesty, and ethical practices in all marketing efforts. In this context, regulators like the HKIA may need to introduce transparency requirements for aggregators. These rules would require aggregators to disclose clearly how products are ranked, whether financial incentives affect the visibility of certain policies, and ensure that comparisons are truly unbiased. This would help prevent conflicts of interest and allow consumers to make well-informed decisions. However, if the regulatory framework becomes too complex or restrictive, it could discourage international insurance companies and Insurtech firms from entering the Hong Kong market, potentially favoring markets with more flexible regulations. Thus, it is imperative for the HKIA to find a balance by implementing appropriate and reasonable regulations that foster growth while maintaining consumer protection in the digital insurance space.

⁵⁴Baker McKenzie, *Digitalization in Insurance Guide | Hong Kong*, Baker McKenzie Resource Hub (23 October 2025), available at: <https://resourcehub.bakermckenzie.com/en/resources/asia-pacific-in-surance/asia-pacific/hong-kong/topics/digitalization-in-insurance-guide> (visited 5 Feb 2025).

Future Opportunities in Hong Kong

Overview

Figure 12. Product Line Profiles of Digital Insurers, Official Websites⁵⁵

	Blue	Bow tie	ZA Insure	OneDegree	Avo
Life Protection	WeCare Flexible Term Life TF1	Bowtie Term Life	ZA Life		
	WeCare Term Life Plan TL3	DreamLife (Term Life rider)			
Medical Protection	- WeMedi Outpatient Protector	Voluntary Health Insurance Scheme	ZA Voluntary Health Insurance Scheme		Cancer Protection
	- WeMedi GBA Dental Protector D1	OutPatient - BowtieGo			Avo VHIS (Standard) Plan
	- WeMedi HK Dental Protector	Enterprise Vision Eyecare			Child Vaccination Protection
		MTB Early Critical Illness Health Check Plan			OutpatientGuard Protection
		Children Vision Eyecare			Northbound Dental Protection
Critical Illness Protection	WeCare Critical Illness Protection Plan 1	Bowtie Critical Illness	ZA Cancer	Critical Illness	Cancer Protection
	1WeCare Cancer All in One	Cancer Fighter	ZA Heart Attack & Stroke		
	WeCare Carcinoma-in-situ				
	WeCare 109% Refundable Critical Illness Protector				
	WeCare 3-in-1 Protector				
Accident Protection	WeCare Personal Accident	Touch Wood Protector	ZA Accident	Fire Insurance	
	WeCare Accidental Joint & Bones Protector				
	WeCare Emergency Cash				
Daily Life related	WeGuard Eye Disease Protector			Home Insurance	Domestic Helper Protection
	WeGuard PharmaEASY Protector			Home Appliances Warranty Insurance	Home Protection Landlord (leasing out) / Self-occupied / tenant
					eWallet Protection
					eWallet Protection mini
					Cosmetic Journey Protection
					IVF Journey Protection
Saving Insurance	WeSave Short Term Insurance Plan ST1				
	EasySave ES1 Insurance Plan				
	WeSave E1 Insurance Plan				
	WeSave S3 Insurance Plan				
	WeWealth GoWealth Generator 2 / WeProtect GoWealth Plus				
Travel Protection					Worldwide Travel Protection
					Mainland China Travel Protection
					Greater Bay Area (GBA) Travel Protection
					Thailand Travel Protection
Pet Protection				Pet Insurance	
				Dog Insurance	
				Cat Insurance	
				Turtle, Tortoise & Bird Insurance	

⁵⁵Blue Insurance, *Homepage*, available at <https://www.blue.com.hk/en> (visited 14 Sept 2024); Bowtie Insurance, *Homepage*, available at <https://www.bowtie.com.hk> (visited 14 Sept 2024); ZA Insurance, *Homepage*, available at <https://insure.za.group/v2/en> (visited 14 Sept 2024); OneDegree Insurance, *Homepage*, available at <https://www.onedegree.hk/en-us> (visited 14 Sept 2024); Avo Insurance, *Homepage*, available at <https://www.heyavo.com/en> (visited 14 Sept 2024).

For the expansion of existing product lines, Figure 12 presents a comprehensive comparison of product offerings from various digital insurers in Hong Kong, including Blue, Bowtie, ZA Insure, OneDegree, and Avo. The categories encompass life protection, medical coverage, critical illness, accident protection, daily life insurance, travel insurance, and pet insurance. The existing product segments of digital insurers in Hong Kong present distinct opportunities for expansion and diversification. While digital insurers have already developed a range of offerings, gaps remain across certain product categories. Addressing these gaps can enhance competitiveness, broaden market appeal, and improve risk diversification, thereby contributing to more stable financial performance.

Expansion of Cross-Border Protection Coverage in the GBA

The surge in travel between Hong Kong and mainland China, particularly during holidays, underscores the need for comprehensive insurance products tailored to frequent short trips. For example, during the 2023 Christmas holiday, over 340,000 people crossed into the mainland, highlighting the potential demand for cross-border insurance coverage.⁵⁶

The inclusion of GBA-specific travel and health products (such as “WeMed GBA Dental” and “GBA Travel”) presents a significant opportunity for insurers to target cross-border travelers with specialized offerings. Insurers may further expand their product lines to include more comprehensive packages, such as medical coverage for treatments in GBA hospitals, emergency repatriation services, and follow-up medical care in Hong Kong. These developments are closely linked to evolving regulatory frameworks governing cross-border insurance arrangements. As regulatory coordination within the Greater Bay Area continues to improve, such products may play an increasingly important role in facilitating cross-border financial services.

Provision of Personalized Products and Services for the GBA

Consumers’ willingness to share personal data provides insurers with a unique opportunity to create personalized services that meet specific needs. A survey from the Capco global consultancy showed that the primary motivator for data sharing is the desire for more personalized services (55% in Hong Kong; 60% in the GBA).⁵⁷ Additionally, many respondents are interested in improvements to claims processes (53% in Hong Kong) and enhanced authentication systems (54% in the GBA). Hence, it is suggested to provide tailored insurance offerings. Health, life, and long-term savings products, such as investment-linked insurance and annuities, can be customized based on a customer’s individual financial goals, health data, and lifestyle preferences. At the same time, insurers can leverage personal data, such as fitness and health metrics, to offer personalized wellness and app-based services and rewards for healthy behavior, given that Capco survey respondents in Hong Kong and the GBA are interested in features like mental health coaching, nutrition analysis, and lifestyle recommendations within insurance apps. In detail, 63% of Hong Kong app users and

⁵⁶MSIG, *Explaining comprehensive protection for Greater Bay Area excursions* (2024), available at <https://www.msig.com.hk/en/lifestyle-library/explaining-comprehensive-protection-greater-bay-area-excursions> (visited 14 Sept 2024).

⁵⁷CAPCO, *Hong Kong & Greater Bay Area insurance research 2023*, available at <https://www.capco.com/about-us/newsroom-and-media/hong-kong-and-gba-insurance-research-2023> (visited 14 Sept 2024).

73% in the GBA expressed a desire to shop for additional products through their insurance apps, and many respondents wanted apps to offer features like lifestyle recommendations (68% in Hong Kong; 74% in the GBA) and online health information resources (34% in Hong Kong; 40% in the GBA).⁵⁸

Introduction of Brand-New Products

To better address emerging consumer needs and enhance market offerings, digital insurers in Hong Kong may consider introducing new insurance products. This strategy would allow them to serve underserved segments and respond to changing demographic and economic conditions.

Family Insurance Packages

Families often seek insurance products that cover multiple members and address different life scenarios. A customizable family insurance package could provide tailored options for parents, children, and extended family members, offering flexibility and potential cost efficiencies compared to individual policies.

Education Insurance for Mainland Chinese Students in Hong Kong

Mainland Chinese students in Hong Kong represent a growing segment with specific insurance needs. Education-related insurance products could provide short-term coverage that includes health, accident, and medical protection. Such offerings may address gaps between compulsory insurance in mainland China and commercial insurance products in Hong Kong.

Long-Term Care (LTC) Insurance

With Hong Kong's aging population and rising healthcare costs, Long-Term Care (LTC) insurance is becoming increasingly relevant. This type of product would provide coverage for individuals requiring extended care due to illness, disability, or aging, including home care and institutional care services. From a regulatory perspective, the introduction of these new products requires careful consideration of product approval processes, risk management, and consumer protection requirements. Digital insurers must ensure that innovative products comply with existing legal frameworks while addressing emerging market needs.

⁵⁸*Ibid.*

Conclusion

This research provides a comprehensive analysis of the evolving Insurtech sector in Hong Kong, contrasting it with Singapore's more adaptive environment. The study identifies significant shortcomings in Hong Kong, including an overreliance on traditional distribution methods and profitability challenges. Nevertheless, opportunities exist to expand product offerings, enhance cross-border security in the GBA, and develop customized products to meet consumer demand.

The market analysis reveals that while digital insurers in Hong Kong are growing, they face intense competition from traditional firms and ongoing profitability issues. Although regulatory frameworks in Hong Kong are robust, they are less flexible than Singapore's, where innovation is driven by public-private partnerships and rapid digital adoption.

The virtual insurance market in Hong Kong, encompassing both life and non-life sectors, shows promising growth. To maintain competitiveness, it must navigate operational and regulatory barriers. Future opportunities for Hong Kong's digital insurers include expanding cross-border protection, introducing new products such as family and education insurance, and utilizing data to create personalized solutions. By addressing these challenges and leveraging emerging trends, the digital insurance sector in Hong Kong is poised for significant transformation.

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