HARVARD | BUSINESS | SCHOOL

9-218-088
MARCH 2, 2018

CHRISTOPHER J. MALLOY
LAUREN H. COHEN
ANTHONY K. WOO

Lufax: FinTech and the Transformation of Wealth Management in China

Finance is our DNA.

— Gregory Gibb, Chairman & CEO of Lufax

It was the "Hong Kong FinTech Week,"[1] a conference in Asia dedicated to fintech.[a] Gregory Gibb, Chairman & CEO of Lufax, made his way through the crowd to the stage to address an audience of more than 10,000 attendees at the Hong Kong Convention and Exhibition Centre. With Lufax emerging as one of the fintech players in China, the title of his speech was aptly "The Future of Fintech in China."

Headquartered in Shanghai, China, Lufax was an online marketplace for the origination and trading of financial assets.[2] The company had made progress in the past several years, and was awarded "Trading Platform of the Year" for 2017 by the Asian Banker Financial Markets Awards Programme.[3] Lufax's operating statistics in 2016: The number of registered users had grown by 55%, while active users had surged by 104%. An increase of 138% in retail channels' trading volume, coupled with a 75% jump in assets under management (AUM[b]). In the first half of 2017, wealth management transaction volume grew 65% year-on-year, and institutional transaction volume increasing by 45.4%.[4] (See **Exhibit 1** for more details.) Lufax achieved profitability during the same period.

Whether the company could continue its growth trajectory in a sustainable fashion, however, was uncertain. Whether the technology giants (e.g. Baidu, Alibaba, and Tencent, often collectively known as "BAT") would be able to develop strong capabilities in the "Fin" part of "FinTech," and whether traditional financial institutions would become technologically sophisticated enough for "Tech" capabilities to materialize, were among some of the key uncertainties and potential challenges that Lufax had to confront. How Lufax should strategize and position itself going forward was therefore one of the top priorities for Gibb.

---

[a] Coined in the 1980s, the term "fintech" referred to the application of new technology and innovation in the financial sector.

[b] Assets under management (AUM) measured the total market value of all the financial assets which a financial institution managed.

Professors Christopher J. Malloy and Lauren H. Cohen and Researcher Anthony K. Woo (Harvard Business School Asia-Pacific Research Center) prepared this case. It was reviewed and approved before publication by a company designate. Funding for the development of this case was provided by Harvard Business School and not by the company. HBS cases are developed solely as the basis for class discussion. Cases are not intended to serve as endorsements, sources of primary data, or illustrations of effective or ineffective management.

As the event host briefed Gibb on the schedule of the day, Gibb's mind was focused on the future fate of the company. After the briefing, he gathered his notes and adjusted the microphone on the podium. Gibb took a deep breath as he began his speech with an introduction of Lufax.

Company Background

History and Philosophy

Lufax (short for "Shanghai Lujiazui International Financial Asset Exchange Co., Ltd.") was established in 2011, with its parent company, Ping An Group, holding a 43% stake. Founded in Shenzhen in 1988, Ping An Group was a financial services conglomerate with core businesses in insurance, banking and investment, [5] with a vision to "[lead] finance with technology and facilitate life with finance." [6] Specifically, the company sought to become "one of the largest non-standard financial assets exchanges in China."[7] (See **Exhibit 2** for details.) In 2012, with Lufax's platform launched and the secondary trading market platform established, the company emerged as a leading peer-to-peer (P2P) lending platform in China. The company expanded its product offerings in 2013 with a set of non-standard financial products. In 2013 and 2014, Lufax's mobile app became available on iOS and Android, and the company started offering non-guarantee loans online. With a new domain name (Lu.com) unveiled in 2015, the company offered cross-border financial solutions and insurance products online. By 2015, Lufax had transformed itself into an open platform, expanding its scope of business beyond peer-to-peer lending. The following year, Lufax completed the acquisition of Puhui, a Shanghai-based microfinance company.[8] Lufax also enhanced its risk management framework, and launched "Ping An iLoan,"[c] enabling the company to fortify its position as a leader in the consumer finance sector.

Gibb summarized his philosophy of founding Lufax as follows:

> For fintech startups, you need three things to be successful. In the peer-to-peer business, you better start with an advantage in at least two of them. [First,] you need a large flow of customers. Second, you need a large amount of data. And third, you need very strong credit risk skills. The number of small startups that will actually become big peer-to-peer winners is going to be a very small number. It's going to be in the tens, not in the hundreds or the thousands.

The company was majority owned by private shareholders (45%), with Ping An owning a 43% stake and other A- and B-round investors holding the remaining 12%. (See **Exhibit 3** for details.) These investors included Zheng He Capital, CICC (Fintech Investment Co. Limited), CDH Merivale Limited, Guotai Junan Finance (Hong Kong) Limited, Bank of China Group Investment Limited, and CMBC International Holdings Limited. In January 2016, Lufax raised USD 1.2 billion from a private placement, which valued the company at USD 18.5 billion. [9] (See **Exhibit 4** for the background of Lufax's management team.)

The Parent Company: Ping An Group

With assets of USD 456 billion,[10] Ping An Group possessed the world's most valuable insurance brand,[11] worth USD 148 billion as of September 2017.[12] Founded in Shenzhen, China in 1988, Ping An began as a casualty insurance company, and later diversified into financial services from its core business of insurance. The last decade witnessed the progressive transformation of Ping An from a

---

[c] Ping An iLoan offered online credit lending with a credit limit of RMB 30,000 (USD 4,500) per loan and daily interest charged, which could be repaid any time.

capital-driven enterprise into a technology-driven one,[13] made possible with an investment of RMB 8 billion (USD 1.2 billion) in research and development and business incubation annually.[14] The company's technological capabilities in facial recognition, cloud computing, and big data enabled it to better serve its clients, especially in the "life scenarios"[d] of health, travel, and wealth management.[15]

Ping An Bank, the commercial banking arm of Ping An Group also headquartered in Shenzhen, had been pursuing a strategic transformation and developing fintech capabilities. Ping An Bank focused primarily on the development of "technology-driven breakthroughs in retail banking and corporate banking" to gradually transform the financial conglomerate.[16] The company was leveraging technology to minimize operation costs while enhancing efficiency, and in return raising the standards of customer service provided. On the retail banking front, the company's efforts in innovation had brought about improvements across the organization, taking services, products, and channels to the next level. On the other hand, the corporate banking division of Ping An Bank shifted its focus from "scale-oriented growth to value-driven and quality-driven organic growth," along with a long-term vision to become "asset-light, capital-light, industry-oriented, and professional with investment banking attributes."[17]

In September 2017, Ping An Group launched ten innovative initiatives supported by the company's artificial intelligence capabilities. These initiatives included "Ping An Life," "Ping An Good Doctor,"[e] "Ping An Annuity," "Ping An Property & Casualty," "Ping An Pocket Bank," "Ping An Bank's Credit Card Center," "Ping An Securities," "Ping An Caifubao,"[f] Lufax, and Puhui.[18] (See **Exhibit 5** for more information on some of these initiatives. Details of Lufax and Puhui are discussed later in the case.)

Wealth Management Industry in China

The wealth management industry in China had grown in recent years, driven primarily by the increase in individual wealth. In 2016, the Forbes "World's Billionaires" list included 400 billionaires from China, a historical record.[19] The total amount of wealth accumulated by Chinese billionaires topped USD 947 billion, 14% more than the previous year's.[20] Total investible assets in China totaled RMB 126 trillion (USD 19 trillion) in 2016,[21] compared to the country's GDP of USD 11 trillion.[22] The size of the affluent population, i.e. those with investable assets of at least RMB 10 million (USD 1.5 million) grew from about 180,000 in 2006 to almost 1.6 million in 2016.[23]

AUM of the public mutual fund industry in China had reached USD 1.3 trillion by the end of 2016.[24] Both domestic and foreign fund managers benefited from the trend. Sino-foreign ventures gave rise to seven out of the top 15 largest managers. In terms of the distribution of wealth, about 40% of the assets was in bank savings and wealth management products, while another 40% was invested in real estate. The remaining was split equally between stocks (10%) as well as trust and other products (10%).[25] China's wealth management sector was expected to reach RMB 227 trillion (USD 34 trillion) by 2020, according to research conducted by the Beijing-based Renmin University of China.[26] Chinese banks had ramped up their private banking teams in light of the sector's boom, often turning existing customers who were

[d] These "scenarios" referred to the use cases of financial technology in various aspects of consumers' daily lives.

[e] Good Doctor was an online-to-offline (O2O) healthcare servicing platform operated by the Ping An Health Internet Ltd., a wholly-owned subsidiary of Ping An Group.

[f] Caifubao was a financial services mobile app targeting China's wealthy individuals and providing them with wealth management solutions. The app offered structured products based on macro-economic factors, and tailored asset-allocation recommendations according to the customers' background and needs.

already using the banks for other services into wealth management clients.[27] By the end of 2016, a total of 22 commercial banks in China had dedicated teams for private banking clients.[28]

Recently, an increasing number of market players in China had started leveraging technology to augment the products and services in the wealth management. As a result, consumers were able to access financial products and solutions that were tailored, customized, and seamlessly integrated with smart phones. The industry witnessed an influx of capital into fintech companies in the sector. (See **Exhibit 6** for more details.) The fintech market players often had a better grasp of the needs of their users, and could utilize data analytics and insights from big data to comply with Know Your Client (KYC) requirements, perform credit analysis, as well as determine suitability and pricing.[29] (See **Exhibit 7** for the disruption potential of fintech across various sub-verticals in the financial sector.) At the same time, the product mix offered had been evolving as well. "China's wealth-management industry was undergoing profound changes, shifting away from short-term, fixed-income products to longer-term, equity-based investment," said Tang Ning, chief executive of Beijing-based fintech conglomerate CreditEase.[30]

All these developments, however, came with certain risks and challenges. For instance, some of the basic infrastructure and systems (e.g. credit-profiling capabilities for the masses) in the Chinese financial sector had yet to be developed or refined.[31] Also, regulations seemed to be lagging behind industry developments as well, especially in the emerging fintech space.[32] Compounding the issues at hand was a lack of talent, in particular professional wealth managers and risk management specialists. For instance, there were cases where college graduates with merely three years of work experience were promoted to director positions in risk management.[33] As a result, the Chinese wealth management sector still had some way to go to catch up with its counterparts in the United States and Europe.[34]

Competitive Landscape: Technology Giants

Alibaba & Ant Financial

Founded by Jack Ma in 1999 as a business-to-business portal to connect Chinese manufacturers with overseas buyers, Alibaba had become the world's largest and most valuable retailer,[35] providing consumer-to-consumer, business-to-consumer, and business-to-business sales services online. The e-commerce giant pioneered the concept of "Single's Day" (also known as the "11.11 Global Shopping Festival"), a day dedicated to celebrating singleness primarily through the promotion of online shopping in China. For instance, the 2017 11.11 Global Shopping Festival on November 11, 2017 witnessed 1.5 billion transactions on Alibaba Group's Tmall.com and Taobao.com that totaled RMB 168.2 billion (USD 25.5 billion) in value,[36] resulting in 812 million packages that covered 225 countries and regions on that single day.[37] Alipay, the equivalent of PayPal in China, helped make all these transactions possible, and was part of Alibaba's fintech affiliate Ant Financial.

Headquartered in Hangzhou, Zhejiang province, Ant Financial had emerged as a major player in the Chinese fintech space spanning a wide range of sub-sectors, with an estimated valuation of USD 75 billion.[38] The company had established an ecosystem centering on Internet finance with 451 million active users in the third-party payment business alone.[39] The fintech empire that Ant Financial created had operations in mobile and online payments, money market funds, wealth management, digital-only banking, credit scoring, a consumer credit portal, a cloud technology platform, and an insurance services platform.[40]

Tencent

Characterized by Gibb as "[connecting] people with people," Tencent operated its flagship product WeChat, a messaging application used by over 963 million people in China for daily communication and payments.[41] With its dominance in social media, WeChat managed to deliver a suite of solutions to users enabled by the integration of financial technology. Like Alipay, WeChat offered a full range of lifestyle-enhancing functionalities, such as top-ups for mobile phones, taxi booking, takeaway orders, peer-to-peer payments, bank transactions, and wealth management. Tencent's success in social media allowed its digital payment business to thrive as well.[g] WeChat Pay, the company's online payment division, emerged as one of the main electronic payment applications because of WeChat's status as the default platform for communication in China,[42] thanks in part to the consumer-to-consumer electronic "red packet" feature.[43]

Baidu

"Baidu connects people with information," said Gibb. While Tencent dominated the social media scene, Baidu had emerged as the largest search engine provider in China. Established in 2000 and headquartered in Beijing, Baidu often cited technological innovations as one of its key strengths, with an army of engineers dedicated to the research and development of its search engine and artificial intelligence capabilities. Baidu's business model was similar to that of Google,[h] and dominated China's search engine market with a market share of over 80% by revenue.[44] With about 470,000 active online marketing customers, the company's online marketing revenues for Q2 2017 were RMB 17.9 billion (USD 2.7 billion), representing a 5.6% increase year-over-year.[45]

Research in artificial intelligence was one of the key initiatives of Baidu with a wide range of applications (e.g. driverless cars and natural language processing[i]), and fell under a platform called Apollo.[j] "In human history, humans invented tools, and then had to learn how to use them. In the future, devices will need to learn human," said Robin Li, CEO and founder of Baidu.[46] One of Baidu's fintech initiatives was the Financial Services Group (FSG), which was declared to be of "strategic importance" at the company. Established in December 2015, FSG provides services spanning consumer finance, wallet payment, wealth management, Internet banking and insurance.

JD.com

The Beijing-based Chinese electronic retailer JD.com (formerly known as 360buy[47]) operated one of China's largest online B2C stores. The company started off in 2004 as an online magneto-optical equipment[k] retailer, and later diversified its product offerings across electronics, mobile phones, and computers.[48] In collaboration with the NASDAQ-listed fintech company ZestFinance, JD recently made its foray into the digital consumer finance space by forming a joint venture called the "JD-ZestFinance Gaia."[49] The joint venture would leverage ZestFinance's machine learning technology and JD's reserve of consumer data from over 100 million active customers to provide credit risk profiling services tailored

[g] WeChat Pay was part of Tenpay, an integrated payment platform launched by Tencent (which also included QQ Wallet).

[h] Google AdWords is an online advertising service where advertisers pay to display brief advertising copy to web users.

[i] Natural language processing referred to a computer's capability to communicate with an intelligent system using a natural language, such as English, enabled by artificial intelligence.

[j] Powered by the Baidu Cloud, Apollo was an open, reliable, and secure software platform for participants to develop their own autonomous driving systems through on-vehicle and hardware platforms.

[k] A magneto-optical drive was an optical disc drive capable of writing and rewriting data upon a magneto-optical disc.

for China.[50] On the other hand, JD's rural strategy covered the entire value chain of rural finance. The company had devised consumer credit products tailored specifically for the rural market, such as "Rural Consumer Credit,"[51] rural wealth management, as well as crowdfunding services.

Competitive Landscape: Traditional Financial Institutions

Industrial and Commercial Bank of China

As the world's largest bank with total assets of USD 3.7 trillion,[52] the Industrial and Commercial Bank of China (ICBC) was one of the "Big Four" state-owned commercial banks[l] in China. The company had been pursuing its e-ICBC Internet finance development strategy to improve the coverage of its services, and to integrate financial services, e-commerce, and social media.[53] ICBC established its own Internet Financing Center in 2015, leveraging big data and digital technologies with rapid developments in risk management capabilities.[54] e-ICBC total subscribers exceeded 250 million with more than 60 million households. By the end of 2016, the users of "ICBC e-payment" services totaled more than 110 million. The bank also rolled out a revamped interface for Internet banking by adopting the designs of e-commerce websites and highlighting features such as "more intelligent, more affordable, more open, and more secure," providing a range of financial services for customers.

ICBC joined forces with JD.com on June 16, 2017.[55] The two parties would work together in fintech, retail banking, consumer finance, corporate lending, and asset management. JD.com's CEO believed that such a collaboration would create synergies for both companies, which would be conducive to "the development of new business models and innovative products," and in turn helped to "promote innovation in China's financial sector."[56]

China Construction Bank

With assets totaling USD 3.2 trillion,[57] China Construction Bank (CCB) was the world's second largest bank by market capitalization[58] and the sixth largest company globally.[59] The bank launched the "Good Finance" business platform in June 2012.[60] According to CCB, the platform provided a host of services to e-commerce and individual customers, including product announcements, online transactions, payment and settlement, financing loans, trust funds, real estate transactions etc. Based on CCB's 2016 annual report, service platform was assisting major corporations in exploring opportunities related to enterprise Internet supply chain services, various local governments as well as industry associations to promote local services. In 2016, the total transaction volume on CCB's "Good Finance" business platform amounted to RMB 138.4 billion (USD 20.7 billion).[61]

On March 28, 2017, CCB, Alibaba, and Ant Financial signed a strategic cooperation agreement.[62] According to the agreement, Ant Financial would assist CCB in promoting its credit card services online and extend service coverage. The two parties would also collaborate in O2O[m] channels, electronic payment, integrated credit systems, and would jointly explore the potential and synergies of commercial banking and fintech.

---

[l] In China, the "Big Four" banks included Industrial and Commercial Bank of China (ICBC), China Construction Bank (CCB), Agricultural Bank of China (ABC), and Bank of China (BoC).

[m] Online-to-offline commerce, or "O2O," identified customers in the online space via e-mail, Internet advertising, and social media, and then tried to draw potential customers from online channels to physical stores, incorporating techniques used in online marketing with those used in brick-and-mortar marketing.

Agricultural Bank of China

The Agricultural Bank of China (ABC) had assets of USD 3 trillion,[63] and was actively using technology to improve rural finance.[64] Using big data as a foundation and leveraging Internet technologies to provide innovative loan services to farmers and villages, the company was creating a cash flow cycle whereby loan applicants could take out and repay loans at any time. This helped to provide relief for short-term funding needs for a lot of farmers. To improve the precision and effectiveness of rural loans, ABC's Internet Finance Farmers' Loan Division used big data to complement manual processing, and provided tailored solutions for customers based on their characteristics (e.g. operational similarities and risk appetite) with standardized operations on a large scale. At the same time, the establishment of data models using model selection and system validation resulted in an online, automated loan application process, providing credit to farmers and villages in an efficient and low-cost manner.

ABC reached a strategic cooperation agreement with Baidu on June 20, 2017, with collaboration mainly in the fields of science, technology, and financial products.[65] The two parties would jointly establish a laboratory, launching initiatives exploring areas such as smart customer acquisition, big-data risk management, biometric identification, smart customer service, and blockchain.

Bank of China

With total assets reaching USD 2.9 trillion,[66] the Bank of China (BoC) was established in 1912 and was the oldest bank in China still in existence.[67] The company was pursuing a "Mobile First" development strategy, and had transformed itself with a mobile Internet strategic transformation.[68] Technology under development at the company included: big data analysis providing BoC's e-loan services; image recognition technology, identity-verification and QR code[n] payment functionalities; biometric identification, together with voice recognition and finger-print authentication. With an innovation-driven business model, BoC was witnessing a rapid rise in the number of users and activity in mobile banking, with customers reaching more than 100 million.

On June 22, 2017, the Bank of China had teamed up with Tencent for the "Bank of China-Tencent Financial Technology Joint Laboratory,"[69] focusing on technologies including cloud computing, big data, blockchain, and artificial intelligence. The collaboration had the ultimate objective of creating inclusive finance, cloud-based finance, smart finance, and technology-enabled finance systems.

Noah Holdings

Founded in 2005, Noah was an asset management firm in China mainly engaged in the distribution of offshore and onshore financial products and solutions, such as fixed-income, insurance, secondary markets, and private equity products. The firm's AUM totaled RMB 89.2 billion (USD 13.9 billion) in wealth management services and products, with Gopher Asset Management,[70] a subsidiary of Noah, managing RMB 142.9 billion (USD 21.7 billion) as of June 30, 2017. With a network of 1,286 relationship managers in 78 metropolitan areas and 222 branches in China,[71] the company provided customized wealth management products and services for clients with diverse financial investment needs and demands. As of the third quarter of 2017, Noah's wealth management division worked with a total of 175,979 registered clients. Gopher Asset Management's investment business spanned a number of asset classes, including private equity (fund-of-funds, private equity secondary market fund-of-funds, and co-

[n] QR code was a type of matrix barcode (or two-dimensional barcode) with a machine-readable optical label that provided information about the item to which it was attached.

investment funds), real estate (actively managed secondary market fund-of-funds, fund-of-quant-funds, and fixed income), as well as family office and discretionary account investment.[72] Noah's products and services also included microlending, web-based wealth management, and payment processing services.

A New Platform in the Fintech Era

Lufax consisted of one platform and three asset-sourcing entities, namely Puhui, Qianhai Exchange (QEX), and Chongqing Exchange (CQEX). Lu.com was the platform that served as an interface with investors, and connected investors with assets. Puhui was an end-to-end P2P lending platform, and QEX and CQEX were institutional-facing entities sourcing institutional assets for the platform for retail investors. With the integration of these asset-sourcing platforms, Lufax had been able to create synergies and enhance its capabilities as a wealth management platform. The company was also working with over 300 third-party financial institutions, including domestic public and private funds, insurance products providers, securities products providers, and overseas financial services firms.

By the end of 2016, the number of registered users on the Lufax platform (i.e. Lu.com) had reached 28.4 million, of which 7.4 million (26%) were active investors who had either made at least one investment during the year or retained a positive AUM. On the other hand, there were 3.8 million registered borrowers on the Puhui platform. Investors' AUM on the Lufax platform totaled RMB 438 billion (USD 66 billion) as of the end of 2016, while LUM (Loans Under Management) was RMB 147 billion (USD 22 billion) on the Puhui front. Retail transaction volume (i.e. all volume from various asset sources to retail customers online via Lu.com) reached RMB 1.5 trillion (USD 225 billion).

Commenting on Lufax's competitive advantage compared to technology giants such as BAT, Gibb shared the following:

> As an open platform with more than 5,000 financial products on its shelf, [Lufax] seeks to match customers to products and investment approaches that best meet their risk appetite and personal investment goals. [The company's] financial DNA allows Lufax to select and deliver more diverse and sophisticated products which in turn allows us to attract and serve China emerging middle and affluent investors online. More than 65% of Lufax's retail Client Assets (CA) are derived from investors who have investment more than USD 80,000 on the platform. Overall average client assets per active retail investor is more than USD 7,000 vs. a few hundred USD for Tencent and Ant Financial. As its brand and capabilities have developed, Lufax has increased its focus on the rising middle class as they represent a large share of overall financial assets and provide more attractive economics than the mass market given larger ticket sizes and the ability to invest in higher margin products.

Puhui

Puhui (with a direct translation of "inclusive") was Lufax's P2P platform, and had been in operations for over 10 years. Previously a part of the Ping An Group, Puhui was acquired by Lufax in June 2016. Unlike other P2P startups, Puhui had over a decade of operational track record and credit management experience, which contributed to Lufax's ability to manage credit risks. Puhui had access to the People's Bank of China (PBOC) credit bureau data as well as consumer behavioral data from third parties. More importantly, the company also had access to credit information from Ping An Group. Unlike the United States, where credit-profiling infrastructure was mature, China's credit system was still at a relatively nascent stage of development, implying that Chinese firms with access to better quality data would enjoy a competitive advantage. Puhui had accumulated over a decade of experience in data analysis and big data analytics, which was a competitive edge that Lufax therefore inherited. Puhui was able to conduct data analysis with correlation models based on actual borrower data to improve its risk management capabilities over time, creating a considerable advantage for Puhui.

Puhui had increasingly driven the adoption of technology to automate the process, including capabilities such as facial recognition, micro expression, and big data analysis in risk management.[73] The company had recently developed its own "facial recognition" technology, with an accuracy as high as 99.8%, for its lending service to help with identity verification for borrowers.[74] Using their cell phone cameras, users could complete the verification process remotely. With over 400 physical branches, Puhui relied on an O2O business model that helped to prevent fraud and enhance the effectiveness of the debt-collection process when default cases inevitably surfaced. Puhui managed to improve its loan quality continuously through optimization using technology, with overall non-performing loan[o] (NPL) rates declining significantly over the years. (See **Exhibit 8** for more details.)

Qianhai Exchange and Chongqing Exchange

Institutional assets were sourced from the Chongqing and Qianhai Exchanges, both of which offered access to first-hand information of institutional assets from offline B2B transactions. Armed with the relevant financial experience (as deal arrangers) in assessing product risks, the two exchanges helped to ensure that only the safest and highest-quality institutional assets were featured on the retail platform. (See **Exhibit 9** for details.)

Institutional volume, which comprised offline institution-to-institution transactions through Qianhai and Chongqing Exchanges where Lufax served as the deal arranger, totaled RMB 4.2 trillion (USD 630 million). Volume for offline B2B transactions was large and came with lower fees. (See **Exhibit 10** for the various types of fees on products on the Lufax platform.) Lufax did not intend to profit from these B2B transactions. Instead, the company was trying to gain first-hand knowledge into the institutional assets on the market. In China, investors' needs were diverse, and high-quality assets were a rarity. By positioning itself in the middle of the B2B transactions, Lufax was able to gain a deeper understanding of the markets, and enjoyed the "first right of refusal" on assets. This also had the added benefit of arming Lufax with better insights into asset quality, which enabled the company to determine the suitability of relevant assets for retail customers.

The Rise of Fintech

The notion of "Fintech" was a combination of "Fin" and "Tech," which referred to the application of new technology and innovation in the financial sector.[75] With a strategic goal of becoming one of the largest wealth management platforms in China,[76] Lufax was seeking to capitalize on the recent wave of opportunities in fintech. On the one hand, similar to other traditional financial institutions, the company utilized risk assessment questionnaires, which examined factors such as investment experience, financial knowledge, and sensitivity to risk to gain insights into its clients. On the other hand, Lufax was leveraging its technology capabilities, supported with large databases on credit and consumer behavior data, along with algorithms and models refined over years of experience, to help assess investors' risk tolerance levels. Armed with big data analytics, which combed through customers' basic information, asset records, as well as investment and consumption data, and augmented by machine learning algorithms, Lufax was able to fine-tune its product recommendations in an efficient and scalable fashion. For instance, the company managed to optimize customer experience and reduced loan processing time at Puhui. Customers no longer had to pay a visit to Puhui branches

[o] A non-performing loan was one which the borrower was not making interest payments or repaying any principal.

personally to submit loan application materials and sign contracts. All this had the added benefit of reducing fraud as well. (See **Exhibit 11** for details.)

Other prominent financial technology platforms in China, notably the likes of Ant Financial and JD Finance, had recently relabeled themselves as "TechFin" upon realizing that their core competency remained in the realm of technology. "Lufax, on the other hand, had the financial DNA from Ping An, so risk management was part of the company's heritage at the very beginning," added Gibb. "Ultimately, to be successful in FinTech, financial DNA was needed."

Risk Management and the Art of "Knowing"

Know Your Product (KYP) and Know Your Client (KYC) Systems

Lufax's proprietary risk management tools included the "Know Your Product (KYP) System" and the "Know Your Client (KYC) System." There was a stringent KYP process for both P2P and institutional asset sources, and all products on Lufax's platform were categorized into five tiers based on the corresponding level of risk. KYP allowed the company to control risk at the source. The company leveraged its traditional financial experience in creating the risk management systems, which assigned ratings based on a proprietary scheme of product-risk rating. The scale spanned the entire risk spectrum, from low-risk products (denoted "R1," which offered stable returns and were oftentimes principally-protected) to high-risk ones (labeled "R5," that might offer higher returns but came with a significant degree of volatility). Specifically, the five tiers of Lufax's financial product ratings were as follows:

- **Low-risk products (R1)**: Principally-protected with stable returns
- **Relatively low-risk products (R2)**: Principal relatively stable; slight fluctuations in return
- **Medium-risk products (R3)**: Slight fluctuating principal and return
- **Relatively high-risk products (R4)**: Potential for relatively significant fluctuations in principal and return
- **High-risk products (R5)**: Potential for significant fluctuations in principal and return

On the other hand, Lufax adopted the Know-Your-Client process commonly used in financial institutions. While similar questionnaires were common at traditional banks, Lufax refined and enhanced the process with additional data gathered on investor behavior on the platform. Investors were categorized into five categories as well, namely "Conservative Investor (C1)," "Prudent Investor (C2)," "Balanced Investor (C3)," "Growth Investor (C4)," and "Aggressive Investor (C5)." (See **Exhibit 12** for more details.)

Lufax was using technology to better match products and investors. For instance, the company would not allow conservative investors to allocate money to aggressive financial products. Each investor on the platform could only buy products in risk categories that were deemed appropriate, i.e. more conservative. In other words, investors could only allocate capital to projects that were within their acceptable threshold of risk tolerance. For instance, a "C4" investor could only invest in products with risk ratings "R4" or below. So far, Lufax's KYP and KYC systems had facilitated 2.26 million transactions for 1.21 million clients, with a total transaction value of over RMB 370 billion (USD 56 billion).[77]

Armed with insights from KYC and KYP, Lufax devised a process that connected investors with financial products. With this "robo-advisory"[p] framework in place, the company managed to offer investors automated and tailored product recommendations at scale. Elaborating on Lufax's risk management capabilities, Gibb added the following:[78]

> P2P [served] individual small business owners who needed funds, [and was] an online bridge between a person who needed money and a person who had money… [In] Lufax's case, the company was conducting screening to ascertain the quality of the lender, which drove the price. On the other hand, it was driven by what investors needed in order to put their money forward. The company was taking rating systems built in the United States and Taiwan in the last 20 years and tuning them for China. Only 40% of the applicants would be allowed to go on the platform, so the company was quite rigorous in screening. But for the industry as a whole, in some cases it was much freer than that.

Lufax was looking beyond China as well, and was in the process of establishing a platform to serve the wealth management and asset allocation needs for the rising middle class in Asia.[79] The company was seeking to expand its institutional business and explore overseas markets, both via partnerships with global financial institutions. For instance, in July 2017, Lufax launched an offshore mobile version in Singapore, known as "Lu International," which was Lufax's Singaporean arm distributing fund products of regional and global fund houses.[80] Lu International had secured a Capital Markets Services license from the Monetary Authority of Singapore, and it was the first time that such a license was granted to a Chinese fintech company in the city state.[81] The new international operations planned to extend its overall coverage from Greater China to countries such as India and Indonesia, where certain investors might opt to invest internationally in smaller amounts (down to USD 10,000).

Strategy for the Future

As the busy day drew to a close, Gibb took a step back and reflect on the progress achieved so far. With a growth rate of 104% in active users in 2016,[82] Lufax had received a number of awards, including "Trading Platform of the Year for 2017" for an "innovative investor suitability management system to better match investors' risk profile with products."[83]

Lufax was facing competitive pressures from multiple fronts in the market. On the one hand, BAT and other emerging fintech players could flex their muscle in developing technological capabilities and leverage frontier technologies (e.g. A.I. and blockchain) to leapfrog the competition. On the other hand, traditional banks were making considerable progress in adopting or developing fintech capabilities, and could represent a formidable force in the fintech landscape. It was a delicate balance in Lufax's strategic positioning that the company had to master. Some of the major Chinese banks, such as CCB and ICBC, could overwhelm the market with their assets and political muscle, while emerging fintech players, often equipped with advanced technological capabilities, could bring about the next wave of disruption that many incumbents dreaded. Gibb elaborated on these challenges with the following:

> One could argue that at least for the next several years there is no direct competition between Lufax and BAT as we all are playing for different segments and all probably taking prospective share from the traditional banking sector. Longer term, the strategic question for Lufax is [whether it can] maintain enough product edge, superior investment approaches, to remain attractive to the middle and affluent class relative to BAT (who will

[p] Robo-advisors (robo-advisers) were digital platforms that provided automated, algorithm-driven financial planning services with little to no human supervision.

> gradually move up market) and commercial banks (some of whom will make good use of new technologies). How long will this window last? What do we need to do next to ensure our differentiation? What additional skills do we need to build to ensure leadership in our chosen spaces?

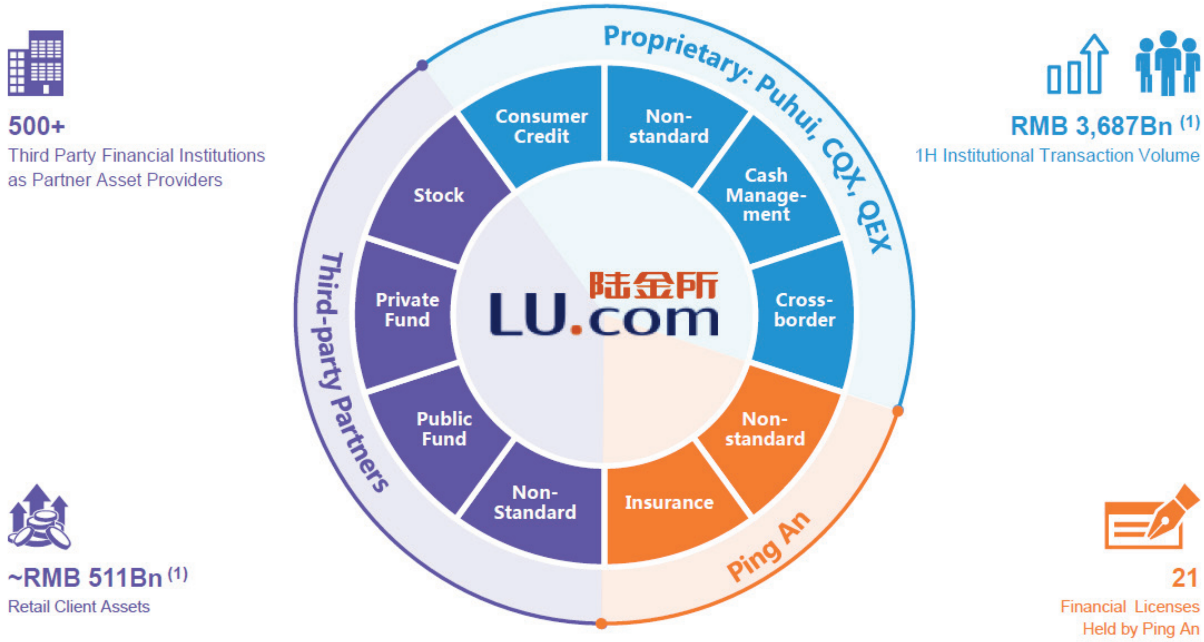
There were also looming risks and lingering uncertainties on the political and regulatory front. Rumors surfaced on July 20, 2017, with a message claiming that "regulators would crack down on Lufax soon, exit your investments as soon as possible" posted on an Internet forum,[84] which subsequently went viral.

Lufax immediately followed up with an announcement saying that its platform, "as one of China's leading online wealth management platform, has always adhered to stringent policies with robust risk management capabilities," and, "since the inception of the platform six years ago, no customers have suffered losses."[85] The announcement emphasized that "everything is normal on the platform so far," and there were no adverse effects on the rights and interests of investors. Regulators and investors were increasingly concerned about red-flag-raising collaboration schemes between fintech platforms and local exchanges.

On July 6, 2017, the Fintech Risk Management Working Group issued a notice titled "Circular on the Rectification of Illicit Collaboration between Fintech Platforms and Various Exchanges as well as the Associated Illegal Activities on Fintech Platforms."[86] The notice prohibited fintech platforms from engaging in unauthorized activities or unlawful collaboration with various types of trading venues. Fintech platforms also ought to properly resolve issues in any businesses that were not in compliance with existing regulations starting from July 15, 2017.

While Lufax did enjoy support from its parent company Ping An, positioning the company strategically to ensure long-term success was one of the key priorities for Gibb. As a result, Gibb had a host of critical questions to ponder. How should Lufax respond to the challenges in the competitive landscape? And how should the company leverage its own advantage, i.e. a "finance DNA," to chart the path for its future journey?

Exhibit 1 Lufax Wealth Management Platform

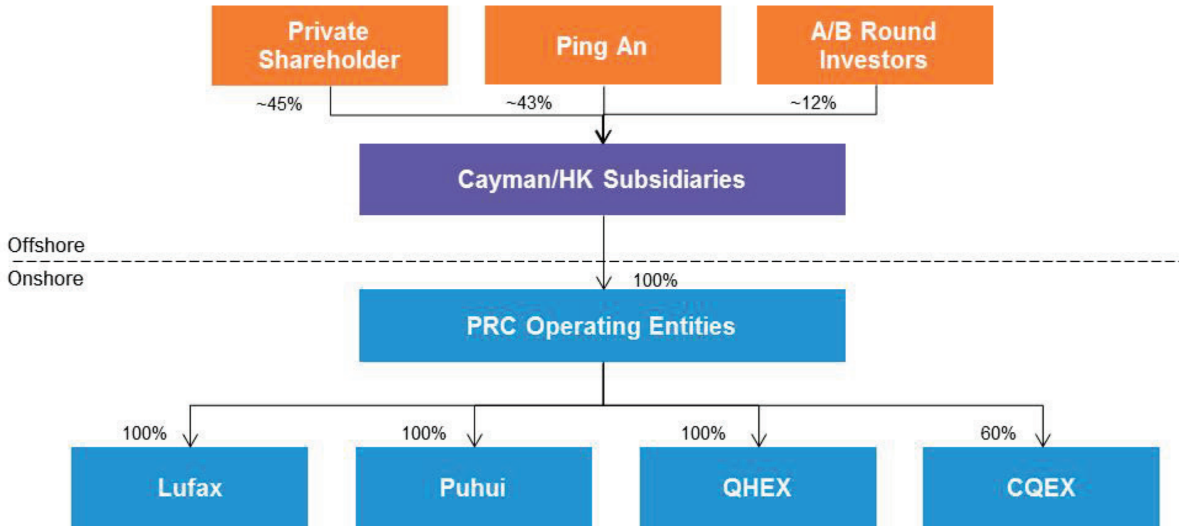


Source: Lufax company documents.

Exhibit 2 Lufax Product Mix

Source: Lufax company documents.

Exhibit 3 Lufax Ownership Structure



Source: Lufax company documents.

Exhibit 4 Management Team Background

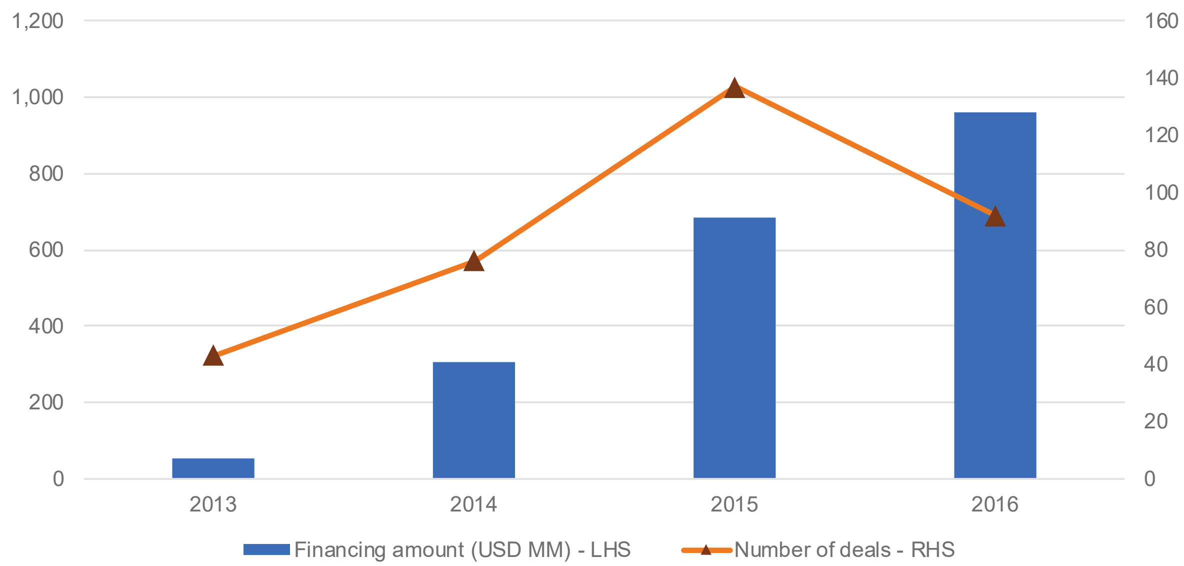
Source: Lufax company documents.

Exhibit 5 Artificial Intelligence (A.I.) Capabilities of Ping An Group

Initiative	Core Value Proposition	Functionality
Ping An Life	AI Customer Service	• Allowed for the remote verification of customers' identities using big data along with facial and voice recognition capabilities, thereby reducing the time needed for customers to conduct their business online • Established an online smart platform for four major business functions, namely outlet counters, policy administration, underwriting, and claims settlement
Ping An Good Doctor	AI Doctor	• Comprised of smart auxiliary diagnosis and treatment systems, smart hardware for health status and "Modern Hua Tuo" program • Offered online medical pre-diagnosis, triage and consultation, thereby enhancing the efficiency of treatment • Invested RMB 3 billion (USD 451 million) in developing A.I. capabilities for the medical service value chain
Ping An Annuity	Collect Annuity Payment by "Facial Recognition"	• Allowed clients to access and retrieve their annuity information online, and track the retrieval process directly through the "Good Benefit" app
Ping An Property & Casualty	Cloud Claims on Auto Insurance	• Customized "smart insurance claim" service based on the analysis of customers' category, the scene of accident, clients' needs, and processing methods • Allowed clients to customize the ways in which accidents were reported and examined, and offered various channels to submit claim documents
Ping An Pocket Bank	Smart Investment Consultancy Service	• Applied big data and AI calculation on quantitative asset allocation • Able to customize the investment portfolio according to customers' risk appetite, closely monitor and adjust the asset allocation, thereby increasing investment returns
Ping An Bank's Credit Card Center	Advanced Anti-Fraud Monitoring System	• Offered real time anti-fraud monitoring, blocking fraudulent credit card transactions and safeguarding customers' assets • Applied instant risk control for over 800 million financial trades, directly and indirectly reducing economic loss of approximately RMB 65 million (USD 9.8 million)
Ping An Securities	AI Smart Stock Investment	• Offered recommendations on stock positions and switching stocks based on quantitative analysis of stock and trading techniques with the help of big data analytics
Ping An Caifubao	Smart Wealth Management	• Helped to ascertain the risk appetite for clients for "Smart Wealth Management" using big data, cloud computing, voice recognition, machine learning, and biological identification

Source: Adapted from "Ping An Launches 10 AI+ Innovative Services," September 21, 2017, http://fintechnews.hk/2266/insuretech/ping-launches-ten-ai-innovative-services/, accessed October 2017.

Exhibit 6 China Fintech Wealth Management Industry Capital Raising Overview



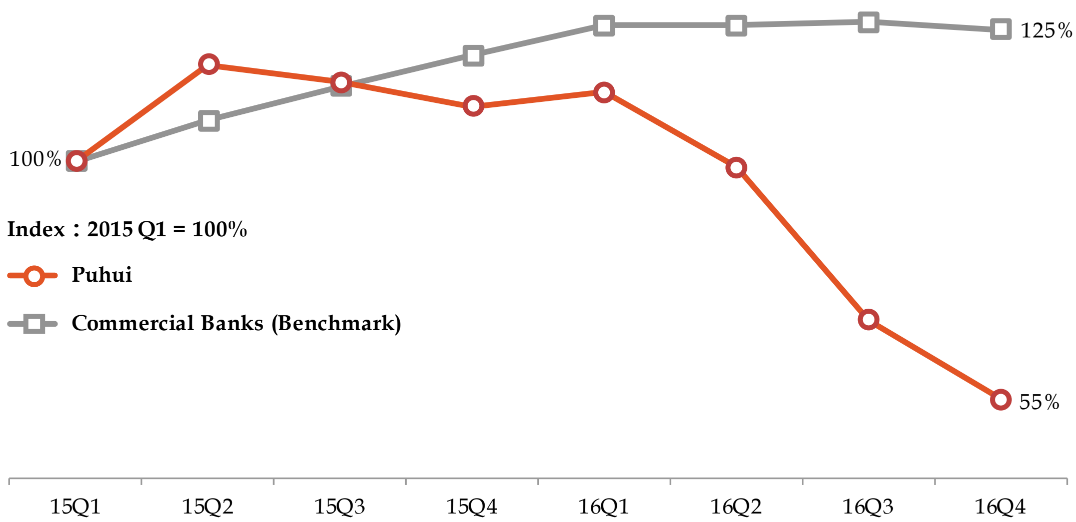
Source: Casewriters' recreation of "Overview of China's Wealth Management Industry in 2017 & Analysis of the Development of Active Wealth Management Institutions [in Chinese]," April 21, 2017, http://www.chyxx.com/industry/201704/516183.html, accessed October 2017.

Exhibit 7 Financial Sectors Most Likely to be Disrupted by Fintech in the Next Five Years in China

Financial Sectors	Potential to be Disrupted by Fintech
Consumer banking	79%
Investment & Wealth Management	51%
Fund Transfers & Payments	47%
Commercial Banking (Including SME Banking)	36%
Fund Operations	19%
Insurance Intermediary	17%
Insurance (Life and Non-life)	15%
Brokerage Services	13%
Market Operations & Exchanges	10%
Investment Banking	8%

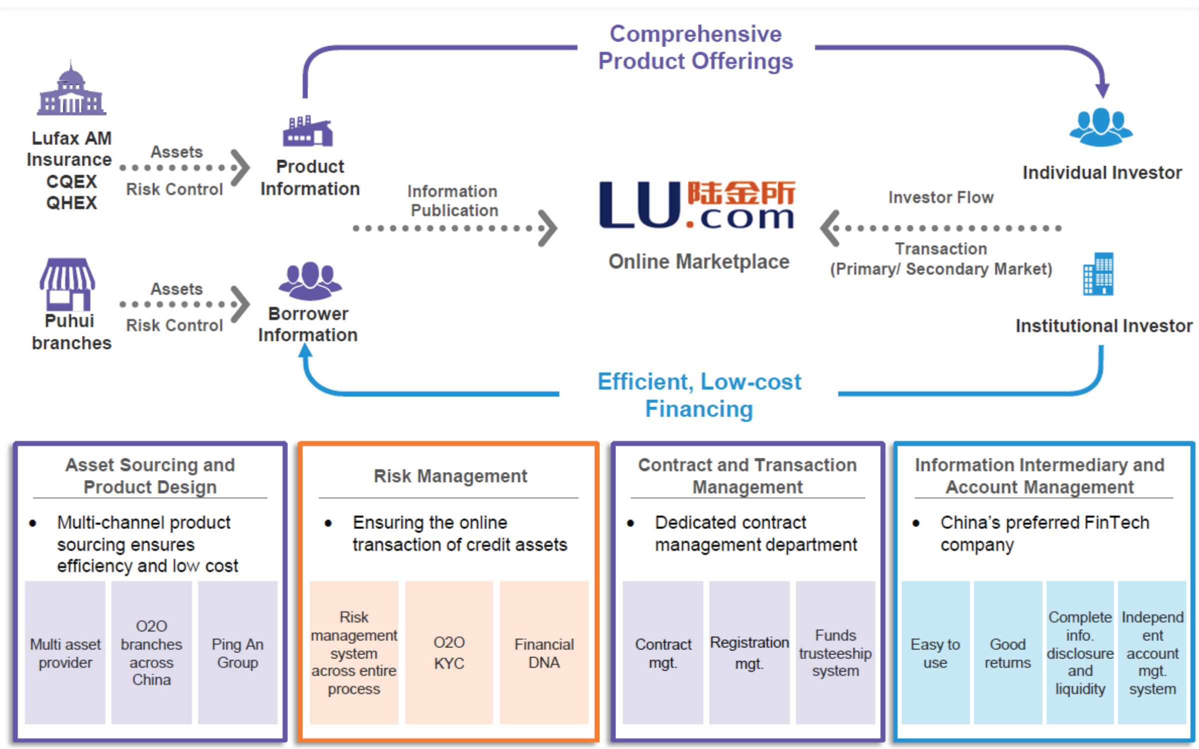
Source: "Global Fintech Survey China Summary 2017," https://www.pwchk.com/en/financial-services/publications/fintech/global-fintech-survey-china-summary-jun2017.pdf, accessed October 2017.

Exhibit 8 Puhui Non-Performing Loan (NPL) Rate



Source: Lufax company documents.

Exhibit 9 Lufax Business Model: Open Platform Bridging Assets and Investors



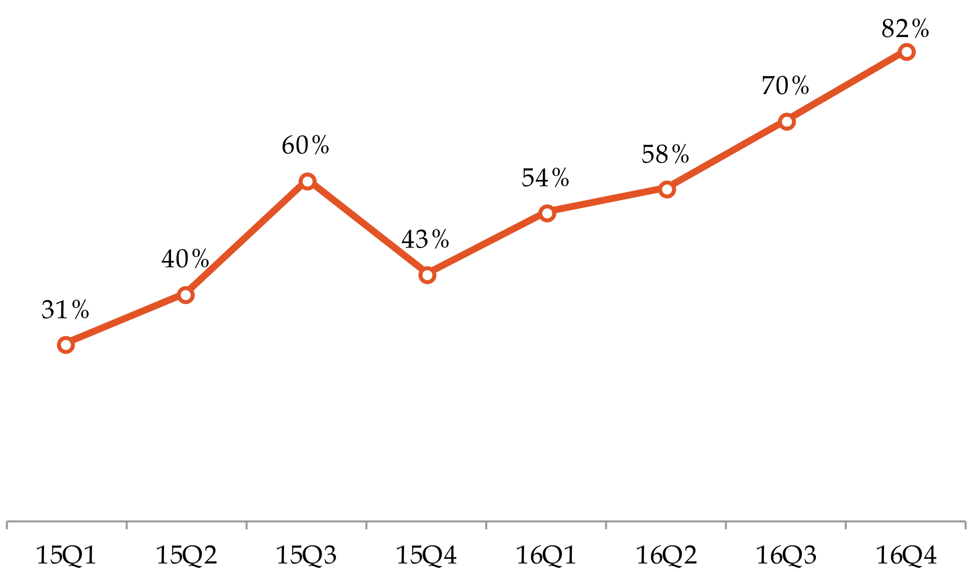
Source: Lufax company documents.

Exhibit 10 Types of Fees Charged on Products on the Lufax Platform

Business Segment	Product Lines	Product Types	Fee
Wealth Management Business	Non-Standard	B2C, F2C, G2C	Platform fee
	Standard	Mutual Funds	Subscription fee: based on transaction volume
			Management fee: based on AUM
			Redemption fee: based on transaction volume
		Private Funds	Subscription fee: based on transaction volume
			Management fee: based on AUM
			Incentive fee (some products): % share in NAV increase
		Insurance	Platform fee: based on transaction volume
	Secondary Market		Transaction fee: based on transaction volume
Credit Management Business	Secured Loan		Upfront fee: based on transaction volume
			Monthly fee: based on transaction volume
	Unsecured Loan		Upfront fee: based on transaction volume
			Monthly fee: based on transaction volume
	i-Loan		Monthly fee: based on AUM

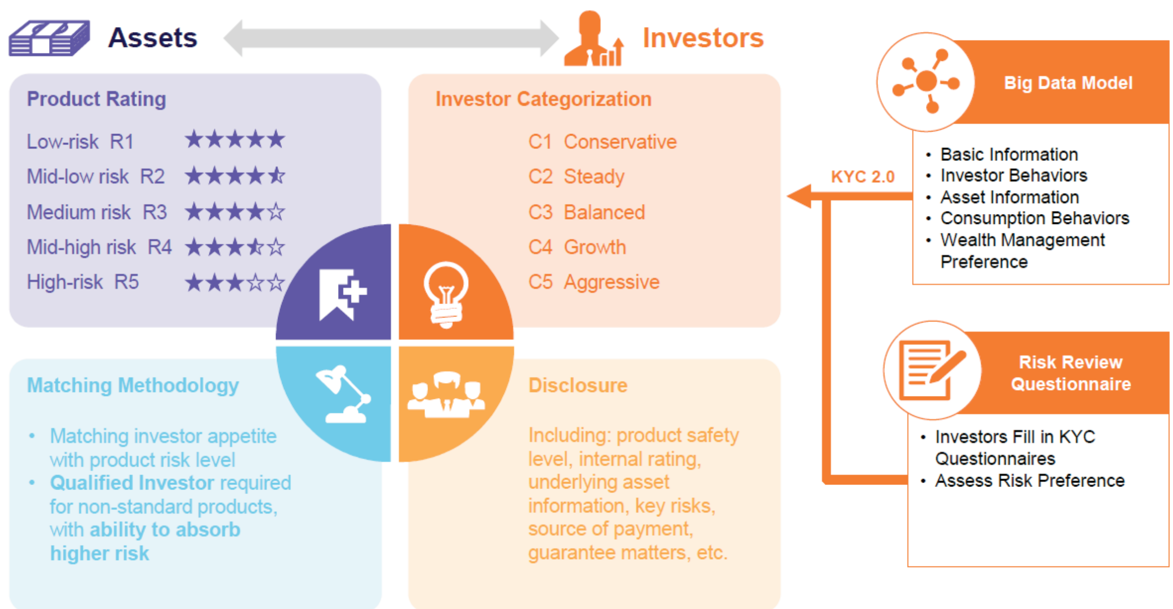
Source: Lufax company documents.

Exhibit 11 Percentage of Online Loan Applicants



Source: Lufax company documents.

Exhibit 12 Data-driven Asset and Investor Matching Mechanisms



Source: Lufax company documents.

Endnotes

[1] "Hong Kong FinTech Week," http://www.hongkong-fintech.hk/en/home.html, accessed October 2017.

[2] "Lufax," https://www.crunchbase.com/organization/lufax, accessed October 2017.

[3] "Lufax awarded as Trading Platform of the Year for 2017," June 9, 2017, http://www.asianbankerawards.com/financialmarkets/press/2017/Lufax.pdf, accessed September 2017.

[4] "Ping An Group performance grew steadily; Lufax achieved profitability," August 22, 2017, http://sn.ifeng.com/a/20170822/5934554_0.shtml, accessed August 2017.

[5] "Ping An Insurance (Group)," December 2016, http://about.pingan.com/en/index.shtml, accessed September 2017.

[6] "About Ping An," December 2016, http://www.pingan.cn/en/about/index.shtml, accessed September 2017.

[7] "Why Lufax?" http://resources.pingan.com/app_upload/file/ir/c261968d105847e98718f3be809ed880.pdf, accessed December 2017.

[8] Daniel Ren, "Ping An Puhui sees growth in tapping China's blue-collar workers and small businesses," August 28, 2016, http://www.scmp.com/business/money/money-news/article/2010254/ping-puhui-sees-growth-tapping-chinas-blue-collar-workers, accessed September 2017.

[9] Daisy Wu, "Lufax raises US$1.2b in private placement," January 19, 2016, http://www.thestandard.com.hk/section-news.php?id=165313, accessed August 2017.

[10] "Top 100 Banks in the World 2017," https://www.relbanks.com/worlds-top-banks/assets, accessed October 2017.

[11] Shuiyu Jing, "Tech giants brand value on the up," July 2, 2017, http://www.chinadaily.com.cn/business/tech/2017-02/07/content_28120760.htm, accessed October 2017.

[12] "Ping An Insurance (Group) Market Cap," https://ycharts.com/companies/PNGAY/market_cap, accessed September 2017.

[13] "PAG News: Ping An reports RMB 43,427 million in Net Profit Attributable to Shareholders of Parent Company for Interim 2017, Dividend per Share jumps 150% and New Business Value grows 46.2%," August 17, 2017, http://www.pingan.cn/en/common/news/article/1502963654875.shtml, accessed October 2017.

[14] Bien Perez, "Chinese insurance titan Ping An to take on internet giants as it evolves into a tech powerhouse," July 13, 2017, http://www.scmp.com/tech/leaders-founders/article/2102567/chinese-insurance-titan-ping-take-internet-giants-it-evolves, accessed October 2017.

[15] "Ping An Launches 10 AI+ Innovative Services," September 21, 2017, http://fintechnews.hk/2266/insuretech/ping-launches-ten-ai-innovative-services/, accessed October 2017.

[16] "Announcement of unaudited results for the three months ended March 31, 2017," http://www.pingan.com/app_upload/images/info/upload/a01f0830-4176-4f73-832d-aa0c7361c5f4.pdf, accessed October 2017.

[17] "Ping An Insurance (Group): Announcement of Audited Results for the Year Ended December 31, 2016," March 22, 2017, http://www.hkexnews.hk/listedco/listconews/sehk/2017/0322/LTN20170322597.pdf, accessed October 2017.

[18] "Ping an Insurance (Group) Company of China, Ltd. Announces Launch of 10 Innovative Services," September 20, 2017, https://www.bloomberg.com/research/stocks/private/snapshot.asp?privcapId=33018, accessed October 2017.

[19] "Forbes: The World's Billionaires," https://www.forbes.com/billionaires/list/, accessed October 2017.

[20] Han Wei, "Wealth-Management Industry at Turning Point," September 30, 2017, https://www.caixinglobal.com/2017-09-30/101152459.html, accessed October 2017.

[21] "Individual investible assets No.2 in world," April 27, 2017, https://www.bcg.com/en-cn/d/news/27apr2017-individual-investible-assets-156532, accessed October 2017.

[22] "World Bank: GDP (current US$)," https://data.worldbank.org/indicator/NY.GDP.MKTP.CD, accessed October 2017.

[23] Jennifer Zeng and John Ott, "China's Private Wealth Machine," July 25, 2017, http://www.bain.com/publications/articles/chinas-private-wealth-machine.aspx, accessed October 2017.

24 "Z-Ben Advisors: 2017 China Rankings," April 24, 2017, http://z-benrankings.com/, accessed October 2017.

25 Josephine Mason, "China to promote wealth management investment in commodities – regulator," June 19, 2017, https://www.reuters.com/article/us-china-commodities/china-to-promote-wealth-management-investment-in-commodities-regulator-idUSKBN19A0M7, accessed October 2017.

26 "China's Private Wealth Management Industry to Reach RMB 227 Trillion by 2020 [in Chinese]," December 7, 2014, http://finance.ifeng.com/a/20141207/13335384_0.shtml, accessed October 2017.

27 Jennifer Zeng and John Ott, "China's Private Wealth Machine," July 25, 2017, http://www.bain.com/publications/articles/chinas-private-wealth-machine.aspx, accessed October 2017.

28 "China wealth management market booms," June 13, 2017, https://www.asia-first.com/newsletter/china-wealth-management-market-booms.html, accessed October 2017.

29 Henri Arslanian, "How China and Asia are Shaping the Wealth Management Industry," June 20, 2017, http://fintechcircle.com/insights/china-asia-shaping-wealth-management-industry/, accessed October 2017.

30 Han Wei, "Wealth-Management Industry at Turning Point," September 30, 2017, https://www.caixinglobal.com/2017-09-30/101152459.html, accessed October 2017.

31 Cliff Sheng, Jasper Yip, and James Cheng, "Fintech in China: Hitting the moving target," August 2017, http://www.oliverwyman.com/content/dam/oliver-wyman/v2/publications/2017/aug/FintechInChina_Hitting-theMoving-Target.PDF, accessed October 2017.

32 Zen Soo, "Experts call for better fintech regulation in China, Hong Kong," February 15, 2017, http://www.scmp.com/tech/china-tech/article/2071154/experts-call-better-fintech-regulation-china-hong-kong, accessed October 2017.

33 "818 Risk Management Director: Zero experience, and involved in fraud with an annual salary of RMB 500,000 [in Chinese],"https://www.rong360.com/news/2016/10/19/117130.html, accessed October 2017.

34 "Is there a real wealth management industry in China? [in Chinese]," November 25, 2016, https://www.zhihu.com/question/29443095?sort=created, accessed October 2017.

35 Betsy Tse, "Alibaba's logistics ambition goes global," July 16, 2014, http://www.ejinsight.com/20140616-alibaba-logistics-global/, accessed October 2017.

36 "The Battlefield of 2017 11.11 Global Shopping Festival! Who will win this war [in Chinese]?" November 12, 2017, http://news.fang.com/2017-11-12/27063476.htm, accessed December 2017.

37 "2017 11.11 Global Shopping Festival creating miracles gain with transaction volume of RMB 168.2 billion [in Chinese]," http://www.techweb.com.cn/digitallife/2017-11-12/2604955.shtml, accessed December 2017.

38 "Ant Financial Worth US$75B, Considers IPO in HK Next Year, All Facts You Have to Know about Alipay," September 21, 2016, http://fintechnews.hk/99/various/ant-financial-worth-us75b-considers-ipo-hk-next-year-facts-know-alipay/, accessed October 2017.

39 Ant Financial Company Presentation, June 2016, http://www.alibabagroup.com/en/ir/pdf/160614/12.pdf, accessed October 2017.

40 "The Risk of the China Silicon Dragon," June 2016, http://www.pwc.com/id/en/Consulting/Asset/Consulting%20Publication/rise-of-china-silicon-dragon-apr-2016.pdf, accessed October 2017.

41 "Number of monthly active WeChat users from 2nd quarter 2010 to 2nd quarter 2017 (in millions)," https://www.statista.com/statistics/255778/number-of-active-wechat-messenger-accounts/, accessed December 2017.

42 Eveline Chao, "How Social Cash Made WeChat the App for Everything," January 2, 2017, https://www.fastcompany.com/3067901/plexs-bold-plan-to-take-on-the-streaming-goliaths, accessed September 2017.

43 Huifeng He, "WeChat Red Envelopes Help Drive Online Payments Use in China," February 15, 2016, http://www.scmp.com/tech/article/1913340/wechat-red-envelopes-help-drive-online-payments-use-china, accessed September 2017.

44 "China search engine market overview Q2 2017," August 8, 2017, https://www.chinainternetwatch.com/21981/search-engines-q2-2017/, accessed September 2017.

45 "Mobile accounted for 72% of Baidu total revenues in Q2 2017," July 30, 2017, https://www.chinainternetwatch.com/21874/baidu-q2-2017/, accessed September 2017.

46 Jessi Hempel, "Inside Baidu's Bid to Lead the AI Revolution," December 6, 2017, https://www.wired.com/story/inside-baidu-artificial-intelligence/, accessed December 2017.

47 Willis Wee, "China's B2C E-commerce Giant 360buy Rebrands," March 30, 2013, https://www.techinasia.com/360buy-rebrands-to-jingdong, accessed September 2017.

48 "JD.com, Inc. Prospectus," May 19, 2014, https://www.sec.gov/Archives/edgar/data/1549802/000104746914005020/a2220187zf-1a.htm, accessed September 2017.

49 "JD.com and ZestFinance Announce JV to Expand Consumer Credit in China," June 26, 2015, http://ir.jd.com/phoenix.zhtml?c=253315&p=irol-newsArticle&ID=2062772, accessed September 2017.

50 "JD.com and ZestFinance Announce JV," http://ir.jd.com/phoenix.zhtml?c=253315&p=irol-newsArticle&ID=2062772, accessed September 2017.

51 "Rural IOUs," https://nj.jd.com/indexForXcbt, accessed September 2017.

52 "Top 100 Banks in the World 2017," https://www.relbanks.com/worlds-top-banks/assets, accessed October 2017.

53 "Industrial and Commercial Bank of China's Internet Banking grew strongly in the first half of 2016 [in Chinese]," September 8, 2016, http://www.icbc.com.cn/icbc/%E5%B7%A5%E8%A1%8C%E9%A3%8E%E8%B2%8C/%E5%B7%A5%E8%A1%8C%E5%BF%AB%E8%AE%AF/%E4%B8%8A%E5%8D%8A%E5%B9%B4%E5%B7%A5%E8%A1%8C%E4%BA%92%E8%81%94%E7%BD%91%E9%87%91%E8%9E%8D%E4%B8%9A%E5%8A%A1%E5%A2%9E%E9%95%BF%E5%BC%BA%E5%8A%B2.htm, accessed October 2017.

54 "Industrial and Commercial Bank of China Top 10 News Releases of 2016 [in Chinese]," January 24, 2017, http://www.sohu.com/a/125052310_499184, accessed August 2017.

55 "Just now Bank of China and Tencent announced a significant piece of news [in Chinese]," June 22, 2017, http://cj.sina.com.cn/article/detail/5908834803/294681, accessed August 2017.

56 "After China Construction Bank and Alibaba, JD.com and Industrial and Commercial Bank of China were teaming up [in Chinese]," http://www.treasurer.org.cn/node/137664, accessed October 2017.

57 "Top 100 Banks in the World 2017," https://www.relbanks.com/worlds-top-banks/assets, accessed October 2017.

58 "#2 China Construction Bank," May 2017, https://www.forbes.com/companies/china-construction-bank/, accessed October 2017.

59 "The World's Biggest Public Companies," https://www.forbes.com/global2000/#79f59dbc335d, accessed October 2017.

60 "China Construction Bank 'Good Finance' Business Platform [in Chinese]," http://buy.ccb.com/, accessed October 2017.

61 "Observations of New Finance: War on Internet finance commences with Mainland Chinese banks accumulating 'firepower' [in Chinese]," April 10, 2017, http://www.chinatimes.com/realtimenews/20170410002799-260410, accessed August 2017.

62 "Ant Financial and China Construction Bank signed a three-party strategic cooperation agreement [in Chinese]," March 29, 2017, http://tech.sina.com.cn/i/2017-03-29/doc-ifycstww1709763.shtml, accessed August 2017.

63 "Top 100 Banks in the World 2017," https://www.relbanks.com/worlds-top-banks/assets, accessed October 2017.

64 "Agricultural Bank of China introduced Internet credit management measures for rural households [in Chinese]," http://www.abchina.com/cn/aboutabc/nonghzx/NewsCenter/201705/t20170504_1062707.htm, accessed August 2017.

65 "Just now Bank of China and Tencent announced a significant piece of news [in Chinese]," June 22, 2017, http://cj.sina.com.cn/article/detail/5908834803/294681, accessed August 2017.

66 "Top 100 Banks in the World 2017," https://www.relbanks.com/worlds-top-banks/assets, accessed October 2017.

67 "History of Bank of China," http://www.boc.cn/en/aboutboc/ab1/200808/t20080814_1601747.html, accessed October 2017.

68 "Bank of China Mobile Banking won the Banker's Magazine's 'Top Ten Internet Financial Products Innovation Award' [in Chinese]," June 16, 2017 http://www.boc.cn/big5/aboutboc/bi1/201706/t20170616_9618386.html, accessed August 2017.

[69] "Bank of China and Tencent teaming up for the 'Bank of China-Tencent Financial Technology Joint Laboratory' [in Chinese]," June 22, 2017, http://www.boc.cn/aboutboc/bi1/201706/t20170622_9651860.html, accessed October 2017.

[70] "Gopher Asset Management," http://www.gopherasset.com/en-us, accessed November 2017.

[71] "Noah Holdings: Corporate Profile," http://ir.noahwm.com/Corporate_Profile, accessed November 2017.

[72] "Gopher Asset Management," http://www.gopherasset.com/en-us, accessed November 2017.

[73] Yuansiong Lee, "Boost Value of Traditional Financial Businesses with Technologies," November 2017, "http://www.pingan.com/app_upload/images/info/upload/05b57852-37c0-4b70-a613-60adb801add5.pdf, accessed December 2017.

[74] "Ping An Launches 10 AI+ Innovative Services," September 21, 2017, http://fintechnews.hk/2266/insuretech/ping-launches-ten-ai-innovative-services/, accessed November 2017.

[75] "[Definition of] FinTech," November 12, 2014, http://logophilialimited.com/index.php/index.php?word=fintech, accessed November 2017.

[76] "Profile of Lufax," June 24, 2014

[77] "Ping An Launches 10 AI+ Innovative Services," September 21, 2017, http://fintechnews.hk/2266/insuretech/ping-launches-ten-ai-innovative-services/, accessed November 2017.

[78] "Lufax CEO Gibb on China Peer-to-Peer Financing," January 14, 2017, https://www.bloomberg.com/news/videos/b/a40022de-eecf-42a4-9d74-29d4c3773b7d, accessed November 2017.

[79] Peggy Sito, "Lufax plans online platform as part of transformation from P2P to wealth management company," March 23, 2017, http://www.scmp.com/business/companies/article/2081538/lufax-plans-online-platform-part-transformation-p2p-wealth, accessed November 2017.

[80] "Lufax launches mobile offshore wealth management platform in Singapore," July 19, 2017, http://www.asiaasset.com/news/Lufax_lm_nim2_final_DM1807.aspx, accessed November 2017.

[81] "Ping An leverages FinTech to follow the "One Belt, One Road" initiative: Lu International platform goes live in Singapore," July 17, 2017, https://www.prnewswire.com/news-releases/ping-an-leverages-fintech-to-follow-the-one-belt-one-road-initiative-lu-international-platform-goes-live-in-singapore-300488919.html, accessed November 2017.

[82] Soong Fee Chen, "Lufax awarded as Trading Platform of the Year for 2017," June 9, 2017, http://www.asianbankerawards.com/financialmarkets/press/2017/Lufax.pdf, accessed November 2017.

[83] Soong Fee Chen, "Lufax awarded as Trading Platform of the Year for 2017," June 9, 2017, http://www.asianbankerawards.com/financialmarkets/press/2017/Lufax.pdf, accessed November 2017.

[84] Yunfeng, Dong, "What happened to Lufax [in Chinese]?" July 21, 2017, https://mp.weixin.qq.com/s/QAX8n2178ObJcoc_Y8lT5A, accessed December 2017.

[85] "The regulatory authorities are concerned about Lufax? Response: Everything is normal [in Chinese]," July 20, 2017, http://bank.jrj.com.cn/2017/07/20183422777238.shtml, accessed December 2017.

[86] "Circular on the Rectification of Illicit Collaboration between Fintech Platforms and Various Exchanges as well as the Associated Illegal Activities on Fintech Platforms [in Chinese]," July 6, 2017, http://www.szlawyers.com/info/a5a4abe3157d402bbaa81043f058d070, accessed December 2017.