



**Shenzhen Goodix Technology Co., Ltd.**  
**2019 Annual Report Summary**



## I. Important Notes

1. This annual report summary is extracted from the full text of annual report (hereinafter referred to as the “2019 Annual Report” or “Annual Report”). To comprehensively understand the operating results, financial position and future development plans of Shenzhen Goodix Technology Co., Ltd. (hereinafter referred to as “Goodix”), investors should carefully read the full text of the Annual Report, which is available on the media designated by China Securities Regulatory Commission.
2. The board of directors (hereinafter referred to as the “Board”), the supervisory committee (hereinafter referred to as the “Supervisory Committee”), the directors, the supervisors and senior management of Goodix guarantee the authenticity, accuracy and completeness of the content of the Annual Report, in which there are no false representations, misleading statements or material omissions, and are severally and jointly liable for its content.
3. The Board of Goodix considered the 2019 Annual Report together with its summary. All directors attended the meeting. This report was approved unanimously at the meeting.
4. The 2019 financial report prepared by Goodix was audited by Da Hua Certified Public Accountants according to the PRC GAAP with unqualified audit opinions.
5. Zhang Fan (David) (CEO), Hou Xueli (CFO) and He Fang (the accounting manager) undertake the authenticity, accuracy and completeness of the financial report contained in the 2019 Annual Report.
6. Forward-looking statement involving risks: This Annual Report Summary includes forward-looking statements involving future plans. The Annual Report Summary does not constitute the company’s material commitments to investors. Investors are advised to be cautious about the risks associated with investments.

## II. Corporate Information

### 1. Company Profile

Stock Short Name	GOODIX	Stock Code	603160
Stock Exchange on which the Shares are Listed	Shanghai Stock Exchange		
Contact Person and Means of Contact	Secretary to the Board	Representative of Securities Affairs	
Name	Wang Li	Cheng Xiaohua	
Office Address	Floor 8, Building 4D, Software Industry Base, Haitian 1st Road, Nanshan District, Shenzhen, Guangdong, the PRC	Floor 8, Building 4D, Software Industry Base, Haitian 1st Road, Nanshan District, Shenzhen, Guangdong, the PRC	
Facsimile	+86 755 33338830	+86 755 33338830	
Telephone	+86 755 36381882	+86 755 36381882	
Email	ir@goodix.com	ir@goodix.com	

### 2. The Main Business

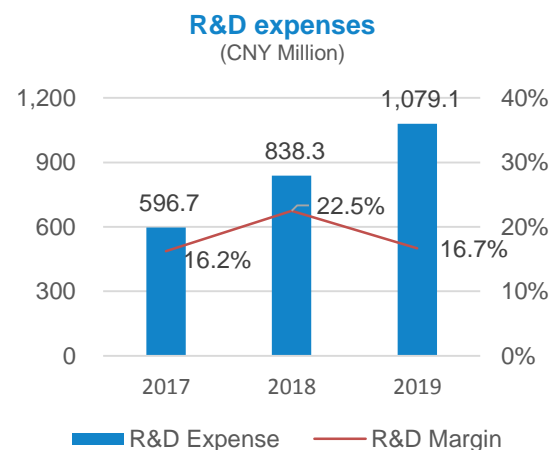
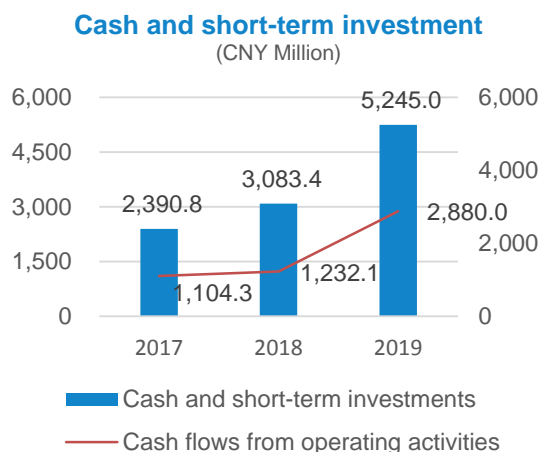
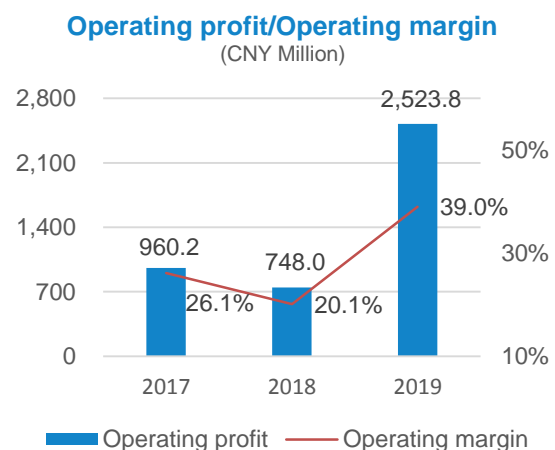
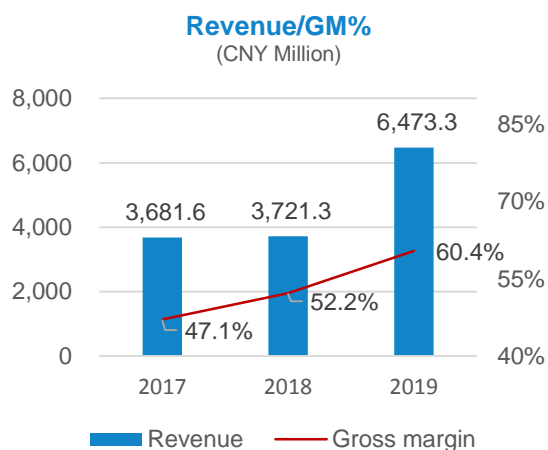
Goodix Technology is an integrated solution provider for applications based on IC design and software development offering industry-leading software and hardware semiconductor solutions. It is recognized as the largest biometric authentication solution provider for Android devices in the global market. Currently, Goodix product lines cover the areas of biometric authentication, human interface, and IoT. Looking forward, the company aims for growing into an enterprise targeting at comprehensive IC designs as the goal for its strategic development.

As an IC design house, Goodix adopts the fabless model and focuses on the design, research, and development of chips that are driven by market demands, while outsourcing tasks such as wafer fabrication, packaging and testing to professional fabrication, packaging and testing vendors. The products Goodix offers are sold both directly as well as via agents and distributors to module makers, integrated solution providers, and device manufactures.

### 3. Key Financial Result Within Three Years

<b>Fiscal years Ended December</b> (CNY Million)	<b>2019</b>	<b>2018</b>	<b>2017</b>
Revenue	<b>6,473.3</b>	3,721.3	3,681.6
Gross margin	<b>60.4%</b>	52.2%	47.1%
Operating profit	<b>2,523.8</b>	748.0	960.2
Operating margin	<b>39.0%</b>	20.1%	26.1%
Net profit	<b>2,317.4</b>	742.5	886.9
Cash and short-term investments	<b>5,245.0</b>	3,083.4	2,390.8

Total assets	<b>7,848.8</b>	5,345.2	4,417.9
Shareholder's equity	<b>6,439.4</b>	4,107.5	3,485.8
Liability ratio	<b>18.0%</b>	23.2%	21.1%
Cash flows from operating activities	<b>2,880.0</b>	1,232.1	1,104.3
R&D expense	<b>1,079.1</b>	838.3	596.7
R&D margin	<b>16.7%</b>	22.5%	16.2%



#### 4. Operation Performance During the Reporting Period

(1) **Revenue:** The company achieved comprehensive operating revenue of CNY 6,473 million, an increase 73.95% comparing with the revenue of CNY 3,721 million in 2018. The large-scale commercial use of the optical IN-DISPLAY FINGERPRINT SENSOR™ not only rapidly increased its market share, but also became the main support for the growth of the business performance.

(2) **Profitability:** The company achieved a comprehensive gross margin of 60.40%, a YOY increase of 8.21%. The operating profit rate was 38.99%, a YOY increase of 18.94%.

Operating expenses were CNY 1,739 million, a YOY increase of 39.55 %. Benefiting from the increase of the revenue, the net profit attributable to the owner of the parent company was CNY 2,317 million, a YOY increase of 212.10%.

(3) **R&D cost:** The company's R&D expenditure in 2019 was CNY 1,079 million, an increase of 28.76% from 2018's CNY 838 million. The R&D investment accounted for 16.67% of the operating income, which echoes the company's long-term strategic development, insisting on strong R&D investment and continuous innovation to promote advancement of technology, constantly expanding innovative product portfolio and application areas, which led to significant extension of the company's growth potential.

(4) **General financial status:** The company's overall financial situation is in a good place. Sales and profitability in 2019 continued to maintain a steady growth trend. As of December 31, 2019, the current ratio was 4.70, showing the company's good solvency. The annual net cash provided by operating activities was CNY 2,880 million, a YOY increase of 133.75%, indicating that the company's operating efficiency is in a good place. In the meanwhile, the debt to equity ratio is 17.96%, which reserves sufficient expansion strength for the company's long term development.

### III. Management Discussion

#### 1. Industry and Market

During the reporting period, Goodix's products are mainly used in smartphones, tablets, notebook computers, automotive electronics, and IoT. Products for smartphones are the main source of the company's revenue. At the same time, Goodix has been putting efforts into the expansion of the markets of IoT and automotive electronics, and has achieved significant performances.

- In the smartphone market, 2019 marked the dawn of the commercialization of 5G. The large-scale commercialization will boost the need for 5G smartphones tremendously and expand the market capacity, while bringing along upgrades with respect to the hardware, functionalities, and experiences of smartphones, all of which will in turn create new opportunities for handset components manufacturers.
- Regarding the automotive electronics market, the applications of new technologies such as touch screens, fingerprint authentication, and voice recognition solutions are growing rapidly, introducing smarter and more agile "driver-vehicle interaction" experiences. Future automotive electronic systems will be smarter while adopting more applications of Internet of Vehicles (IoV) and integrated functions. With the basis of abundant accumulation of experiences in technologies related to human-interface, Goodix possesses great potential in the development of automotive electronics.
- In terms of IoT, the speedy development of 5G and AI technologies will accelerate the massive IoT applications. According to forecasts by IDC, the scale of the global IoT market will expand by nearly as double in 2020, hitting USD1.7 trillion. The diversified areas of applications, together with a vast market, will create advantageous conditions of development for the upper-stream chip industry.

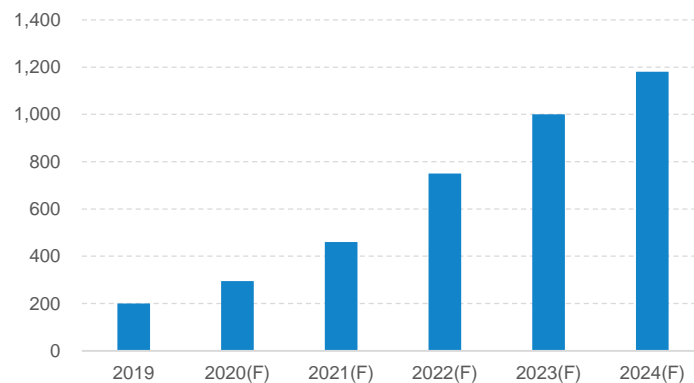
## 2. Products and Solutions

### (1) The biometric authentication product line

In the age of bezel-less smartphones, in-display fingerprint sensors, especially the optical ones, are gaining popularity. Data published in CINNO Research reports show that the total global shipment of smartphones with in-display fingerprint sensors was about 200 million units in 2019, a year-on-year growth of 614%. It is estimated that the number will reach 1.18 billion by 2024, among which 980 million will come from the growth of the shipment of OLED display smartphones with in-display fingerprint sensors.

#### Global Shipment of Smartphone with In-Display Fingerprint Sensor

(Unit: Million Pcs)



\*Data from CINNO Research

Goodix's optical in-display fingerprint solutions continue to lead the innovation of biometric authentication technologies in bezel-less smartphones. As of the end of 2019, more than 100 models had been released commercially.

#### Goodix's In-Display Fingerprint Sensor Achieves 100+ commercialization



HUAWEI  
Mate 30 Pro

OPPO  
Reno3 Pro

vivo  
X30 Pro 5G

Xiaomi  
Mi CC9 Pro

OnePlus  
7T Pro

Motorola  
one zoom

ZTE  
Axon 10 Pro 5G

MEIZU  
16s

\* Representative models of various brands

Meanwhile, capacitive fingerprint sensors have become more popular in markets involving smartphones, tablets, and notebook computers. With the ultra narrow side-key capacitive fingerprint solution, Goodix leads the new trends in the applications of side-key fingerprint sensors. The scale of applications of this solution is expected to take off quickly.

- Massive commercialization of 5G and the growing popularity of OLED displays will increase the market scale of optical in-display fingerprint sensors. Research reports by IHS Markit predict that the global shipment of 5G smartphones will likely reach 253

million units in 2020. Goodix's ultra-thin optical IN-DISPLAY FINGERPRINT SENSOR™, the first of its kind in the world, frees up excess space for hardware optimizations in 5G devices with the compact design in module size. As of the end of 2019, the solution has been adopted for commercialization by many flagship models of various brands, such as OPPO, Xiaomi and OnePlus. At the same time, Goodix has grasped the core technology of in-display fingerprint sensor for LCD display and had the initial ability of commercialization. However, the large scale commercialization of this technology not only depends on its own performances, but also the fact that the display performances must meet the requirements of commercialization. Goodix will continue to work with its partners to realize the commercial scale of this technology at the earliest opportunity.

- In the area of capacitive fingerprint sensors, Goodix outpaced the industry peers in launching the ultra narrow side-key capacitive fingerprint solution. This solution has since been adopted by renowned customers such as Huawei, HONOR, and Redmi for mass production and commercialization, enabling Goodix to achieve the leading role in this market segment. In the meantime, the market share of Goodix's capacitive fingerprint sensors for PC thrived. With a Global Mobile (GLOMO) Awards 2019, the "Security MCU + Live Fingerprint™" innovative smart lock solution has been adopted for commercial uses on various best-selling smart locks offered by ASSA ABLOY, Yunding Network Technology, Xiaomi, and other brands.

## **(2) The human-interface product line**

Thanks to the fast penetration of OLED displays to middle-to-high end smartphone markets, the demand for OLED touch controllers has increased dramatically. Some IDC data show that the global shipment of smartphone panels out of AMOLED displays was 180 million pieces in 2019 and is expected to grow to over 300 million in 2020. In addition, with the continuous infiltration of touch-control technologies into notebook computers, tablets and other devices, the increase of the market of tablets and notebook computers for education due to the popularity of online learning, and the acceleration of applications in areas such as automotive electronics and industrial control, the future shipment of touch controllers is set to boost.

Currently, Goodix's ranks among the top three in terms of the market share of touch controllers in the industry. Relevant products have been running on more than one billion mobile devices worldwide and are widely embraced by the global market.

- In the area of smartphone touch control, Goodix's AMOLED touch controller series are equipped with excellent performance and user experience, and have successfully won the trust of mainstream brands such as Huawei, OPPO, vivo, and Xiaomi. Just in the year of 2019 alone, we have seen the commercialization of more than 30 middle-to-high end flagship models.
- With regards to the area of PC and tablet touch control, the PC touch control solutions have entered the supply chains of global top-tier brands, including HP, Dell, Huawei, and Lenovo, while maintaining the leading role in the Chromebook market. The mousepad solutions have been commercialized on notebook computers offered by Dell, Xiaomi, etc. Moreover, touch control products for tablets have won the trust of internationally renowned brands. The latest touch controller model for the new generation of middle-to-large sized panels has been mass produced for commercialization on MatePad Pro, Huawei's flagship tablet.

- In the area of automotive touch control, in 2019, Goodix's automotive touch controller realized its commercial scale on products offered by domestic automotive brands including Geely, Changan, and Chery. Our efforts for the future will focus on introducing Goodix's products to top-tier international automotive brands.

### **(3) Voice and audio solutions**

Goodix now owns a brand-new product line and a world-class R&D team through the acquisition of the VAS (Voice and Audio Solutions) business of NXP. The acquisition not only benefits Goodix in providing more diversified product portfolios to handset and smart mobile device customers, but also helps Goodix to further explore new opportunities for growth in areas such as automotive applications.

### **(4) IoT product line**

According to forecasts by IHS Markit, the number of connectable devices worldwide will increase to 125 billion units in 2030, marking a compound annual growth rate of over 12%. Goodix is dedicated to building a comprehensive IoT platform based on "Sensor + MCU + Security + Connectivity" and has thus formed its strategic planning in the key market of IoT.

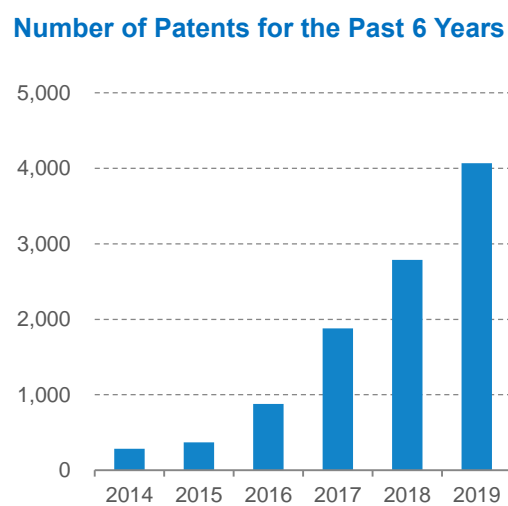
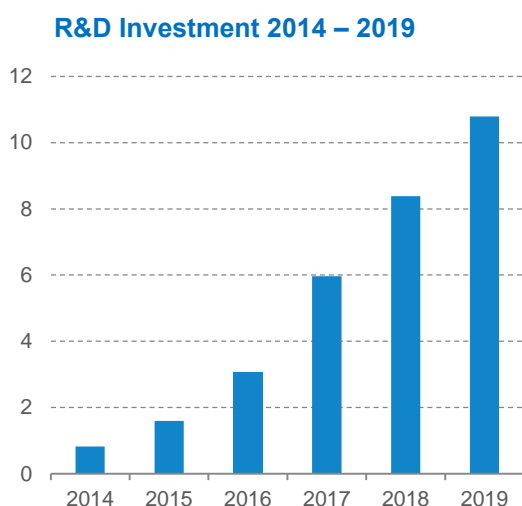
- With regards to the wearable market, Goodix's innovative 2-in-1 solution of in-ear detection (IED) and touch control has seen the mass production and commercialization on the TWS (True Wireless Stereo) headsets offered by OPPO and vivo. The heart-rate detection product has also gained market attention, making it possible to monitor one's health anytime anywhere;
- In terms of wireless connection, the Bluetooth LE product has officially gone into mass production and is in a leading position in the market thanks to its outstanding performance as a result of ultra-low power consumption. Goodix accumulated experiences and know-how about the NB-IoT core technology, and the mass production of the product will be realized in 2020. The differentiating solutions targeting at different needs will be offered to various markets of applications, such as smart water meters (SWM) and intelligent fire alarms.

## **3. Business Strengths**

### **(1) An IC design house that combines both software and hardware solutions in the industry**

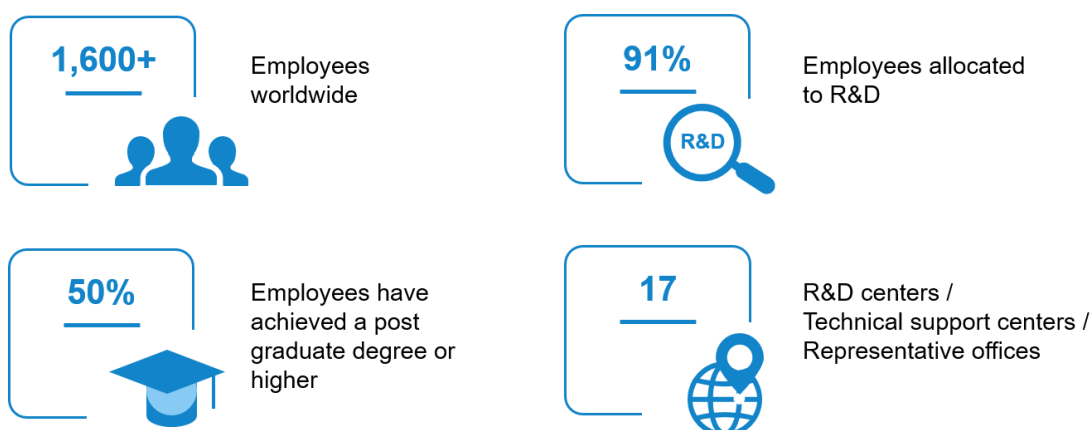
Centering around customers, Goodix always insists on building system-level integrated solutions that cover hardware, software, and algorithms. This has assisted Goodix in providing reliable protection to the one-stop services offered to its customers.





## (2) Attach great importance to talent cultivation and building an international team of top-tier talents

Goodix draws the source of energy from its R&D teams of employees with high educational levels and globalized background.



## (3) Expand strategically with a global vision

In recent years, Goodix has been making progress in becoming a global company. After acquiring the VAS business of NXP in 2019, more R&D resources were deployed in multiple locations including India and various countries in Europe. This allowed the formation of a more global R&D network that, in turn, attracted and gathered top-tier talents and enhanced the company's ability to innovate.

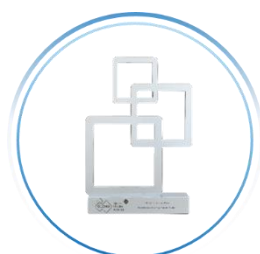
## (4) Extensive customer relations and global brand influence

Goodix owns market leadership, global brand influence, quality customer resources, and good customer relations, all of which have helped lay a solid foundation for the expansion of current and future technological applications and the market of highlighted products.

## Robust Roster of Global Clients



## Recognized by Major International Awards in 2019



Global Mobile (GLOMO)  
Awards 2019



2019 Best Financially  
Managed Semiconductor  
Company

## IV. Corporate Strategy

With the mission of “Enrich Your Life Through Innovation” in mind, Goodix carries on its strategic deployment in three major areas: smart devices, IoT applications, and automotive electronics, aiming to develop into a world-leading integrated IC design house and top-tier technology company with innovation.

### 1. Focusing on smart mobile device market to create better customer values

Goodix has been working on aggressively increasing the breadth and depth of its product lines while pushing the results of its innovation forward to commercialization. At the same time, Goodix is also seizing the new market opportunities arising from 5G and AI and strengthening the strategic cooperation with mobile device brand-owner customers with more quality and innovative product offerings.

### 2. Deploying in IoT and automotive electronics to broaden the new course for development

IoT is the new course for Goodix’s development for the next decade to come. Goodix continues to build a comprehensive IoT platform and ecosystem surrounding the areas of physical sensing, data processing, wireless transmission, and data security, while seeking

greater development in automotive electronics.

### **3. Promote diversified innovation and strengthen globalized operation**

Goodix's Strategy and Business Development Department was formed in 2019. The work of this department concentrates on the formation and fulfillment of the company's middle-term and long-term objectives. In the future, Goodix will accelerate the process of becoming a global company and promote diversified innovation and deployment by combining internal development and external acquisition, while devoting more efforts to expanding overseas markets and serving more international customers.

With regards to the management of the company, Goodix will continue to strengthen its capability of globalized operations as well as optimize the management system further. Various policies for talent and personnel incentives and stimulus will still be carried out in methods that include restricted stocks, stock options, employee stock ownership plans (ESOP), and others.

## Major Accounting Data and Financial Indicators

### Consolidated Statement of Position

As of December 31, 2019 and December 31, 2018

(The currency of the statements is Chinese Yuan, 'CNY', unless otherwise indicated)

<b>Assets</b>	<b>31-Dec-19</b>	<b>31-Dec-18</b>
<b>Current assets:</b>		
Cash and cash equivalents	3,519,545,051.96	583,433,563.53
Financial assets held for trading	1,725,466,079.73	
Notes receivables and trade receivables, net	691,445,515.88	1,039,921,176.80
Inventories	366,243,893.16	403,371,105.51
Prepayments	31,545,044.10	12,681,054.39
Other receivables	95,506,821.45	3,388,847.88
Current portion of non-current assets	30,520,875.00	
Other current assets	30,955,822.08	2,508,319,969.10
<b>Total current assets</b>	<b>6,491,229,103.36</b>	<b>4,551,115,717.21</b>
<b>Non-current assets:</b>		
Investment property		57,964,190.13
Fixed assets	245,699,345.08	169,203,257.10
Construction in progress	120,258,499.77	75,019,112.18
Intangible assets	775,920,639.31	116,666,599.14
Goodwill	43,138,491.19	43,307,014.37
Long-term deferred expenses	16,307,892.64	2,744,465.10
Deferred tax assets	48,818,704.33	48,531,129.61
Other non-current assets	107,409,862.02	280,669,853.33
<b>Total non-current assets</b>	<b>1,357,553,434.34</b>	<b>794,105,620.96</b>
<b>Total assets</b>	<b>7,848,782,537.70</b>	<b>5,345,221,338.17</b>

<b>Liabilities and Stockholders' Equity</b>	<b>31-Dec-19</b>	<b>31-Dec-18</b>
<b>Current liabilities:</b>		
Notes payables and trade payables	533,216,817.28	321,733,800.60
Advances from customers	2,171,196.46	69,752.87
Employee benefits payable	181,004,878.04	158,429,175.28
Taxes payable	86,287,228.34	117,379,510.26

Other payables	578,042,047.08	610,425,461.45
<b>Total current liabilities</b>	<b>1,380,722,167.20</b>	<b>1,208,037,700.46</b>
<b>Non-current liabilities:</b>		
Deferred income	12,182,037.01	14,094,638.29
Deferred tax liabilities	16,453,940.75	15,618,831.54
<b>Total non-current liabilities</b>	<b>28,635,977.76</b>	<b>29,713,469.83</b>
<b>Total liabilities</b>	<b>1,409,358,144.96</b>	<b>1,237,751,170.29</b>
<b>Equity:</b>		
Paid-in capital	455,732,298.00	456,651,659.00
Capital reserve	1,505,357,149.97	1,453,159,530.81
Less: Treasury shares	334,093,668.76	465,643,712.49
Other comprehensive income	-6,153,442.97	-8,848,336.73
Legal reserve	228,325,829.50	228,325,829.50
Undistributed earnings	4,590,255,867.36	2,443,825,197.79
Equity attributable to owners of the parent company	6,439,424,033.10	4,107,470,167.88
Equity attributable to minority shareholders	359.64	
<b>Total owner's equity</b>	<b>6,439,424,392.74</b>	<b>4,107,470,167.88</b>
<b>Total liabilities and owner's equity</b>	<b>7,848,782,537.70</b>	<b>5,345,221,338.17</b>

## Consolidated Statement of Profit or Loss and Other Comprehensive Income

For the years ended December 31, 2019 and December 31, 2018

(The currency of the statements is Chinese Yuan, 'CNY', unless otherwise indicated)

Items	Jan-Dec,2019	Jan-Dec,2018
<b>1. Operating Revenue</b>	6,473,254,534.50	3,721,291,685.55
Less: Operating cost	2,563,728,709.79	1,779,389,760.16
Taxes and surcharges	67,441,272.44	38,622,745.48
Selling expenses	528,121,645.28	322,112,612.59
Administrative expenses	132,289,470.32	86,044,409.07
Research and development expenses	1,079,061,259.53	838,327,764.76
Finance expenses	-5,905,649.67	-1,256,894.99
Including: Interest expense	513,864.56	3,113,214.91
Interest income	12,452,541.82	12,746,557.34
Add: Other income	343,077,115.12	125,296,565.28
Investment income	92,797,646.18	64,796,643.84
Earning from fair market value changes	25,466,079.73	
Impairment of credit	-809,598.63	
Impairment of assets	-45,227,045.73	-100,122,831.79
Proceeds from asset disposal		
<b>2. Operating profits</b>	2,523,822,023.48	748,021,665.81
Add: Non-operating income	3,638,157.22	320,128.19
Less: Non-operating expenses	3,706,999.47	2,189,918.59
<b>3. Profit before tax</b>	2,523,753,181.23	746,151,875.41
Less: Income tax	206,396,120.57	3,653,229.39
<b>4. Net profit</b>	2,317,357,060.66	742,498,646.02
Net profit contributed before the combination under common control		
I . Profit classified by continuity		
Continuous operating profit and loss	2,317,357,060.66	742,498,646.02
II. Profit classified by ownership		
Net profit attributable to owners of the parent company	2,317,356,706.02	742,498,646.02
Net profit attributable to minority shareholders	354.64	
<b>5. Other comprehensive income after tax</b>	2,694,890.80	-7,179,983.31
Other comprehensive income after tax attributable to owner of the parent company	2,694,893.76	-7,179,983.31
I . Comprehensive income not to be reclassified as profit or loss		

II. Comprehensive income to be reclassified as profit or loss	2,694,893.76	-7,179,983.31
i. Currency translation reserve	2,694,893.76	-7,179,983.31
Other comprehensive income after tax attributable to minority shareholders	-2.96	
<b>6. Total comprehensive income</b>	<b>2,320,051,951.46</b>	<b>735,318,662.71</b>
Total comprehensive income attributable to owner of the parent company	2,320,051,599.78	735,318,662.71
Total comprehensive income attributable to minority shareholders	351.68	
<b>7. Earning per share:</b>		
I. Basic earnings per share	5.17	1.65
II. Diluted earning per share	4.99	1.62

## Consolidated Statement of Cash Flows

For the years ended December 31, 2019 and December 31, 2018

(The currency of the statements is Chinese Yuan, 'CNY', unless otherwise indicated)

Items	Jan-Dec, 2019	Jan-Dec, 2018
<b>1. Cash flows from operating activities</b>		
Cash received from sales and services	7,632,271,488.36	4,240,567,204.17
Taxes and surcharges refunds	392,421,945.17	169,970,232.45
Other cash received from operating activities	92,361,326.36	86,514,173.35
Total cash inflows from operating activities	8,117,054,759.89	4,497,051,609.97
Cash paid for goods and services	2,746,245,663.96	2,012,842,905.37
Cash paid for employees related expenses	742,988,786.08	521,443,478.61
Taxes and surcharges cash payments	853,514,524.79	234,161,527.13
Other cash payments related to operating activities	894,276,155.55	496,505,629.79
Total cash outflows from operating activities	5,237,025,130.38	3,264,953,540.90
<b>Cash generated from operating activities</b>	<b>2,880,029,629.51</b>	<b>1,232,098,069.07</b>
<b>2. Cash flows from investing activities</b>		
Cash received from withdraw of investments	12,270,000,000.00	6,850,000,000.00
Cash received from investment income	112,840,883.84	64,796,643.84
Net cash received from disposal of fixed assets, intangible assets and other long-term assets	7,938.21	
Total cash inflows from investing activities	12,382,848,822.05	6,914,796,643.84
Cash paid for fixed assets, intangible assets and other long-term assets	499,235,544.02	362,539,161.52
Cash payments for investments	11,508,230,756.44	8,200,000,000.00
Cash paid for other investment related activities	68,942,000.00	
Net cash payments for acquisitions of subsidiaries and other business units		63,269,326.39
Total cash outflows from investing activities	12,076,408,300.46	8,625,808,487.91
<b>Net cash used in investing activities</b>	<b>306,440,521.59</b>	<b>-1,711,011,844.07</b>
<b>3. Cash flows from financing activities</b>		
Cash received from investments by others	40,555,907.96	132,172,692.20
Including: investment from minority shareholders	7.96	
Cash received from borrowings	29,969,760.00	103,490,578.81
Other cash received from other financing activities		30,700.20
Total cash inflows from financing activities	70,525,667.96	235,693,971.21
Cash repayments for debts	29,969,760.00	104,364,067.46
Cash payments for distribution of dividends, profit and interest expenses	228,901,999.06	276,706,010.80



Other cash payments related to financing activities	72,733,564.34	39,972,671.22
Total cash outflows from financing activities	331,605,323.40	421,042,749.48
<b>Net cash provided by financing activities</b>	<b>-261,079,655.44</b>	<b>-185,348,778.27</b>
<b>4. Effect of changes in exchange rate on cash and cash equivalents</b>	<b>720,992.77</b>	<b>6,846,847.77</b>
<b>5. Net increase in cash and cash equivalents</b>	<b>2,926,111,488.43</b>	<b>-657,415,705.50</b>
Add: Cash and cash equivalents at the beginning of the year	583,433,563.53	1,240,849,269.03
<b>6. Cash and cash equivalents at the end of the year</b>	<b>3,509,545,051.96</b>	<b>583,433,563.53</b>