華能新能源股份有限公司
Huaneng Renewables Corporation Limited*

(A joint stock limited company incorporated in the People's Republic of China with limited liability)
(Stock Code: 0958)

Annual Report 2018

* For identification purpose only

Overview

The Company is committed to the investment, construction and operation of new energy projects. It focuses on developing and operating wind power projects while promoting synergistic growth of solar power and other renewable energies. The Company adheres to scientific development and rational business distribution. With operations of scaled wind farms and distributed wind farms, utilization of onshore and offshore wind resources, attention to both development and acquisition, the Company strives to improve its growth quality and efficiency and to continuously increase its profitability, competitiveness and sustainable development capabilities, so as to maintain its established position in the People's Republic of China (the "**PRC**") and to expand into international markets with a view to becoming an internationally competitive and premier renewable energy provider.

Since its establishment, the Company has been focusing on its mission of green power development and clean energy production. The Company places great emphasis on protecting and improving the environment and on fulfilling its social responsibilities, and strives to bring sustainable, stable and increasing returns to its shareholders.

Contents

Chairman's Statement

LIN Gang
Chairman

Dear shareholders,

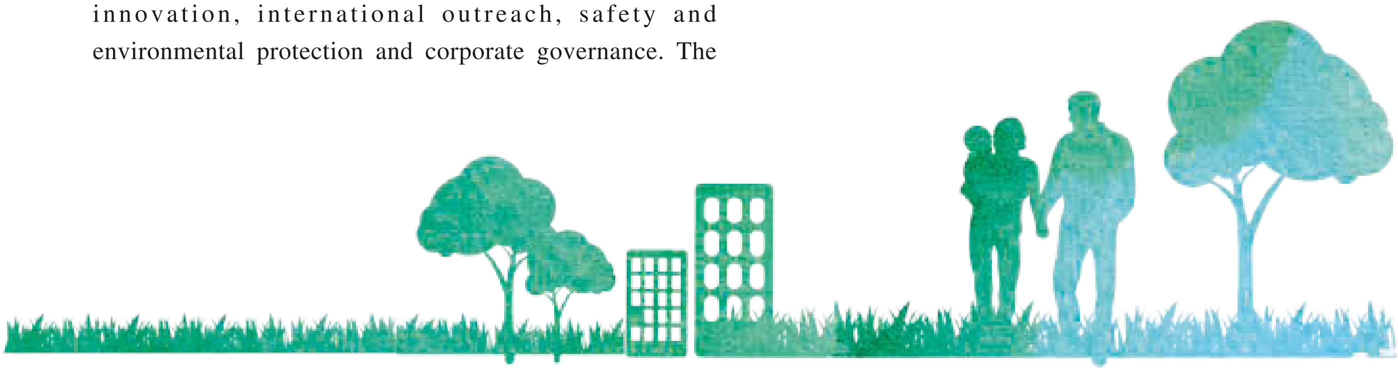
In 2018, faced with the complicated external environment, the Board of Directors, faithfully adhered to the goal of maximizing the shareholders' interest, led the management and all the staff to adapt to the evolving situation, actively grasp arising opportunities and constantly overcome emerging challenges. The operating results of the Company reached another record high, its market image and influence were further improved and a solid progress has been made towards realizing the goal of establishing a world-class new energy enterprise with global competitiveness.

At the moment, the Company is facing both challenges and opportunities simultaneously, while opportunities outweighed challenges. On the one hand, taking concerted action to accelerate the development of non-fossil energy, especially new energy such as wind and photovoltaic power has already become the global consensus. The State has been vigorously implementing the new strategy of energy security, "four revolutions and one cooperation", to construct a clean, low carbon, safe and efficient energy system, which provides a wider leeway for the

development of China's new energy industry. On the other hand, with the acceleration of grid parity and the continuous expansion of the market trading scale at the end of the 13th Five-Year Plan, the trend of "volume up, price down" will continue, which puts forward higher requirements for China's new energy industry to achieve high-quality development.

In 2019, the Board of Directors will continuously adhere to the "economic efficiency centric" principle, closely follow industry policies and market trend and make further improvement in six aspects including green development, operational excellence, technological innovation, international outreach, safety and environmental protection and corporate governance. The Board of Directors will pre-emptively seize the time gap prior to grid parity, unswervingly promote the Company's high-quality development in light of three guidelines of "base form, large scale and high technology", thus standing out from the competition, wining in the market, building a bright future and creating stable return growth for its shareholders.

Finally, on behalf of the Board of Directors, I would like to express my sincere gratitude to all shareholders, investors, the public and our friends for their long-held trust and support!



President's Statement

CAO Shiguang
President

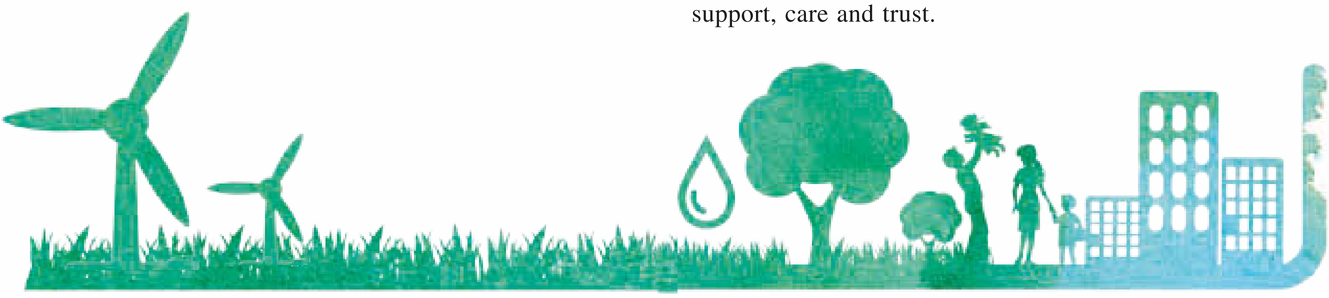
Dear shareholders,

In 2018, with the substantial support of all shareholders and under the professional leadership of the Board of Directors, the management actively put the philosophy of high-quality development in place, focused on laying a solid foundation of safety, made great efforts to deepen quality improvement and efficiency enhancement, seized development opportunities and consummated corporate governance. The Company’s profitability, competitiveness, risk resistance and sustainable development capabilities has been further increased.

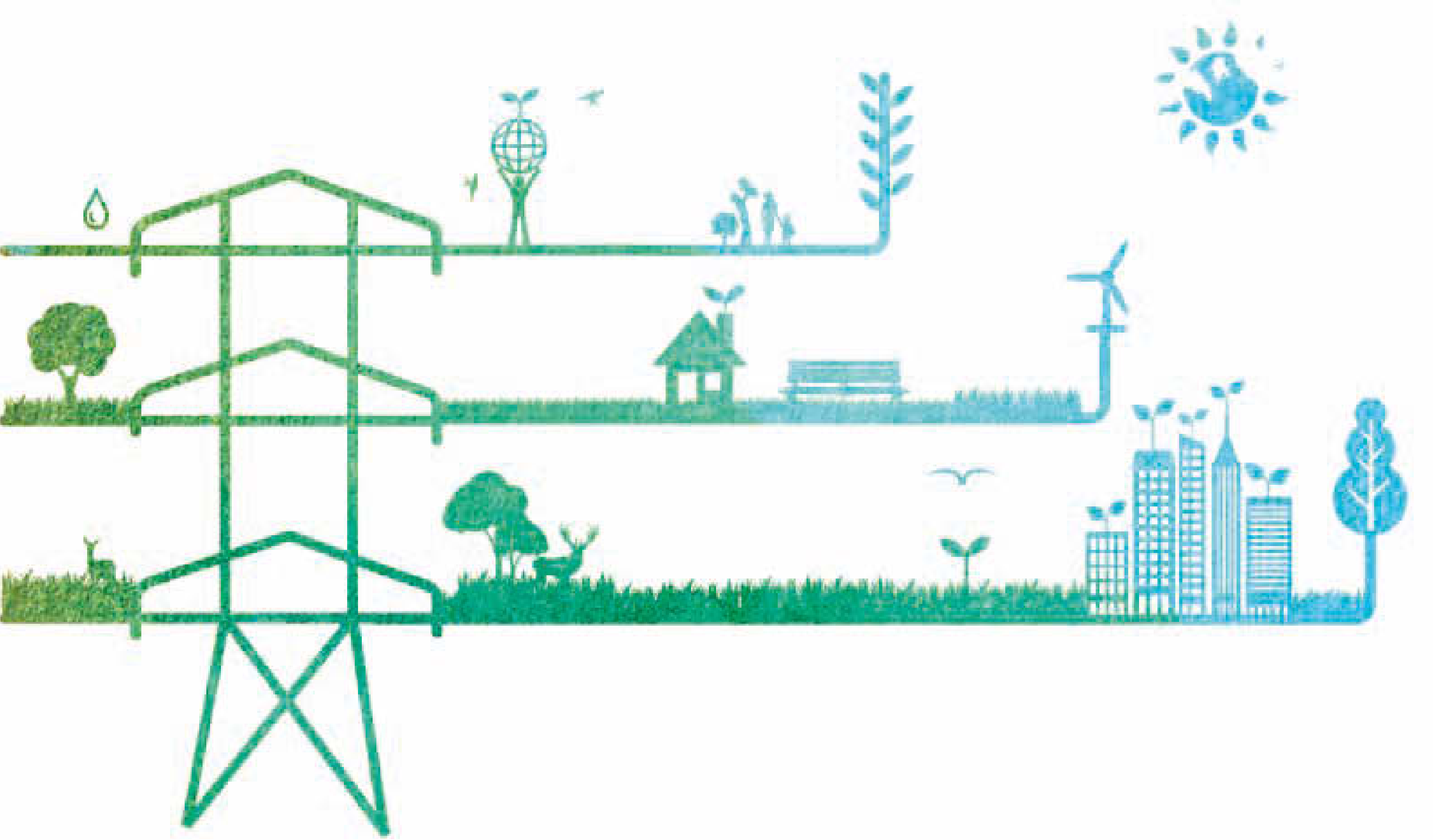
The Company maintained a stable situation of safe operation. The gross power generation of the Company reached 24,973,793.2 MWh, representing a year-on-year increase of 11.3%, and the weighted average utilization hours of wind power were 2,234 hours, maintaining a leading position in the industry; the operation performance has reached a new height with revenue amounting to RMB11.65 billion, representing a year-on-year increase of 10.4%, and net profit attributable to equity shareholders of the Company reaching RMB3.09 billion, representing a year-on-year increase of 2.5%. The Company won multiple awards in capital market. Chairman LIN Gang was entitled the “Outstanding Contribution Entrepreneur in the Forty Years Course of Reform and Opening Up” of the 8th China Securities Golden Bauhinia Awards. The Company was granted various important awards in capital market such as the highest corporate governance award “Platinum Award” presented by “The Assets”.

In 2019, facing increasingly stringent market competition, the management will effectively strengthen the sense of crisis alertness, urgency, and responsibility, unswervingly implement all the work assigned by the Board of Directors, closely center around the annual task, seize opportunities ahead of others and integrate innovation into work. We will lead all the staff to make great efforts to consolidate safe operation, continuously deepen quality improvement and efficiency enhancement, strive for development breakthroughs, strengthen the leading role of science and technology and innovate corporate governance, endeavoring to open up a new prospect for high-quality development and constantly create new values for shareholders.

Lastly, on behalf of the management and all the staff of the Company, I would like to extend my sincere gratitude to all the shareholders and investors for their continued support, care and trust.



Corporate Profile



CORPORATE INTRODUCTION

The predecessor of Huaneng Renewables Corporation Limited (the "**Company**") is Huaneng New Energy Industrial Co., Ltd., which was established in November 2002. On 10 June 2011, the Company was successfully listed on the Main Board of the Stock Exchange of Hong Kong Limited ("**Hong Kong Stock Exchange**") with an aggregate of 8,446,898,000 shares in issue, and later in 2013, 2014 and 2017, 582,317,360 new H shares, 698,780,832 new H shares and 838,536,000 new H shares were issued respectively by way of non-public offering. As at the end of 2018, the total number of shares of the Company was 10,566,532,192 shares, of which China Huaneng Group Co., Ltd. ("**Huaneng Group**"), the controlling shareholder of the Company, and its subsidiary held 52.39% of the Company's total issued shares.

The Company is committed to the investment, construction and operation of new energy projects. It focuses on developing and operating wind power projects while promoting synergistic growth of solar power and other renewable energies. The Company adheres to scientific development and rational business distribution. With operations of scaled wind farms and distributed wind farms, utilization of onshore and offshore wind resources, attention to both development and acquisition, the Company strives to improve its growth quality and efficiency and to continuously increase its profitability, competitiveness and sustainable development capabilities, so as to maintain its established position in the People's Republic of China (the "**PRC**") and to expand into international markets with a view to becoming an internationally competitive and premier renewable energy provider.

Since its establishment, the Company has been focusing on its mission of green power development and clean energy production. The Company places great emphasis on protecting and improving the environment and on fulfilling its social responsibilities, and strives to bring sustainable, stable and increasing returns to its shareholders.

CORPORATE STRUCTURE

HUANENG GROUP

- 61.22% — Huaneng Capital Services Corporation Ltd.
- 47.61% — The Company

Huaneng Capital Services Corporation Ltd.

- 2.62% — The Company

Holders of H Share

- 49.77% — The Company

The Company

- 100% Huaneng Tongliao Wind Power Co., Ltd.
- 100% Huaneng Baotou Wind Power Co., Ltd.
- 100% Huaneng Huhhot Wind Power Co., Ltd.
- 100% Huaneng Chenbaerhuqi Wind Power Co., Ltd.
- 100% Huaneng Manzhouli Wind Power Co., Ltd.
- 100% Huaneng Fuxin Wind Power Co., Ltd.
- 100% Huaneng Jinzhou Wind Power Co., Ltd.
- 100% Huaneng Gaizhou Wind Power Co., Ltd.
- 100% Huaneng Rongcheng Wind Power Co., Ltd.
- 100% Huaneng Changyi Wind Power Co., Ltd.
- 100% Huaneng Weifang Binhai Wind Power Co., Ltd.
- 100% Huaneng Lijin Wind Power Co., Ltd.
- 100% Huaneng Dongying Hekou Wind Power Co., Ltd.
- 100% Huaneng Jimo Wind Power Co., Ltd.
- 100% Huaneng Yantai Wind Power Co., Ltd.
- 100% Huaneng Weifang Wind Power Co., Ltd.
- 100% Huaneng Yishui Wind Power Co., Ltd.
- 100% Huaneng Dali Wind Power Co., Ltd.
- 100% Huaneng Nanhua Wind Power Co., Ltd.
- 100% Huaneng Changning Wind Power Co., Ltd.
- 100% Huaneng Kunming Wind Power Co., Ltd.
- 100% Huaneng Yangjiang Wind Power Co., Ltd.
- 100% Huaneng Raoping Wind Power Co., Ltd.
- 100% Huaneng Zhanjiang Wind Power Co., Ltd.
- 100% Huaneng Tianzhen Wind Power Co., Ltd.
- 100% Huaneng Weining Wind Power Co., Ltd.
- 100% Huaneng Hezhang Wind Power Co., Ltd.
- 100% Huaneng Chengde Wind Power Co., Ltd.
- 100% Huaneng Xinjiang Santanghu Wind Power Co., Ltd.
- 100% Huaneng Tangshan Fengnan Wind Power Co., Ltd.
- 100% Huaneng Xinjiang Qinghe Wind Power Co., Ltd.

- 100% Huaneng New Energy Shanghai Power Co., Ltd.
- 100% Huaneng Baicheng Wind Power Co., Ltd.
- 100% Huaneng Dingbian New Energy Power Co., Ltd.
- 100% Huaneng Zhaojue Wind Power Co., Ltd.
- 100% Huaneng Butuo Wind Power Co., Ltd.
- 100% Huaneng Renewables (Hong Kong) Ltd.
- 100% Huaneng Huailai Wind Power Co., Ltd.
- 100% Huaneng Gansu Jinchang New Energy Power Co., Ltd.
- 100% Huaneng Ningnan Wind Power Co., Ltd.
- 100% Huaneng Qingtongxia New Energy Power Co., Ltd.
- 100% Huaneng Fuchuan Wind Power Co., Ltd.
- 100% Huaneng Gonghe Solar Power Co., Ltd.
- 100% Huaneng Shanwei Wind Power Co., Ltd.
- 100% Huaneng Yunhe Wind Power Co., Ltd.
- 100% Huaneng New Energy Panzhou Wind Power Co., Ltd.
- 100% Huaneng Ge'ermu Solar Power Co., Ltd.
- 100% Huaneng Chifeng New Energy Co., Ltd.
- 100% Huaneng New Energy Shilin Solar Power Co., Ltd.
- 100% Huaneng Zhenglanqi New Energy Power Co., Ltd.
- 100% Huaneng Siziwangqi New Energy Power Co., Ltd.
- 100% Huaneng Qinhuangdao Wind Power Co., Ltd.
- 100% Huaneng Hami Solar Power Co., Ltd.
- 100% Huaneng Wulate Zhongqi New Energy Power Co., Ltd.
- 100% Huaneng Burqin Wind Power Co., Ltd.
- 51% Huaneng Hulunbuir Wind Power Co., Ltd.
- 53% Huaneng Panjin Wind Power Co., Ltd.
- 75% Huaneng Tieling Wind Power Co., Ltd.
- 75% Huaneng Tieling Daxing Wind Power Co., Ltd.
- 55% HNEEP-CLP Changdao Wind Power Co., Ltd.
- 55% HNNE-CLP Weihai Wind Power Co., Ltd.
- 55% Huaneng Shouguang Wind Power Co., Ltd.

- 55% Huaneng Hong Kong Electric Dali Wind Power Co., Ltd.
- 50% Huaneng Shantou Wind Power Co., Ltd.
- 63% Huaneng Mingyang New Energy Investment Co., Ltd.
- 60% Huaneng Shantou Nan'ao Wind Power Co., Ltd.
- 55% Huaneng Laoting Wind Power Co., Ltd.
- 100% Huaneng Qingyuan Wind Power Co., Ltd.
- 100% Huaneng Pingyi Wind Power Co., Ltd.
- 100% Huaneng Zhalaiteqi Solar Power Co., Ltd.
- 100% Huaneng Jishangweichang Manchu Mongolian Autonomous County Wind Power Co., Ltd.
- 51% Huaneng Xiongfei (Beijing) New Energy Power Co., Ltd.
- 100% Huaneng Haixing Wind Power Co., Ltd.
- 100% Huaneng Jinyun New Energy Power Co., Ltd.
- 100% Huaneng Huoshan New Energy Power Co., Ltd.
- 100% Huaneng Muli Wind Power Co., Ltd.
- 100% Huaneng Xifeng Wind Power Co., Ltd.
- 100% Huaneng Yijun New Energy Power Co., Ltd.
- 100% Huaneng (Fujian Liancheng) New Energy Co., Ltd.
- 100% Huaneng Qinglong Wind Power Co., Ltd.
- 100% Huaneng Abagaqi New Energy Power Co., Ltd.
- 51% Huaneng Butuo Photovoltaic Agriculture Power Co., Ltd.
- 100% Huaneng New Energy Huilongxu Power Co., Ltd.
- 100% Huaneng Wugang New Energy Power Co., Ltd.
- 100% Huaneng New Energy Xiangxiang Wind Power Co., Ltd.
- 100% Huaneng Wushan New Energy Co., Ltd.
- 100% Huaneng Zhangbei Wind Power Co., Ltd.
- 100% Huaneng Laiyuan Wind Power Co., Ltd.
- 100% Huaneng Wuchuanxian Photovoltaic Power Co., Ltd.
- 100% Huaneng Wulateqianqi Photovoltaic Power Co., Ltd.
- 100% Huaneng LanLing Wind Power Co., Ltd.
- 100% Huaneng Xinzhou New Energy Power Co., Ltd.
- 100% Huaneng Liangshanzhou New Energy Power Co., Ltd.
- 100% Huaneng Fuyu New Energy Power Co., Ltd.

Note: Numbers may not add up due to rounding.

Xinjiang (solar)

Installed Capacity	50.0 MW
Percentage of Installed Capacity	0.4%

Gansu (solar)

Installed Capacity	150.0 MW
Percentage of Installed Capacity	1.3%

Xinjiang (wind)

Installed Capacity	447.5 MW
Percentage of Installed Capacity	3.7%

Qinghai (solar)

Installed Capacity	255.0 MW
Percentage of Installed Capacity	2.1%

Ningxia (solar)

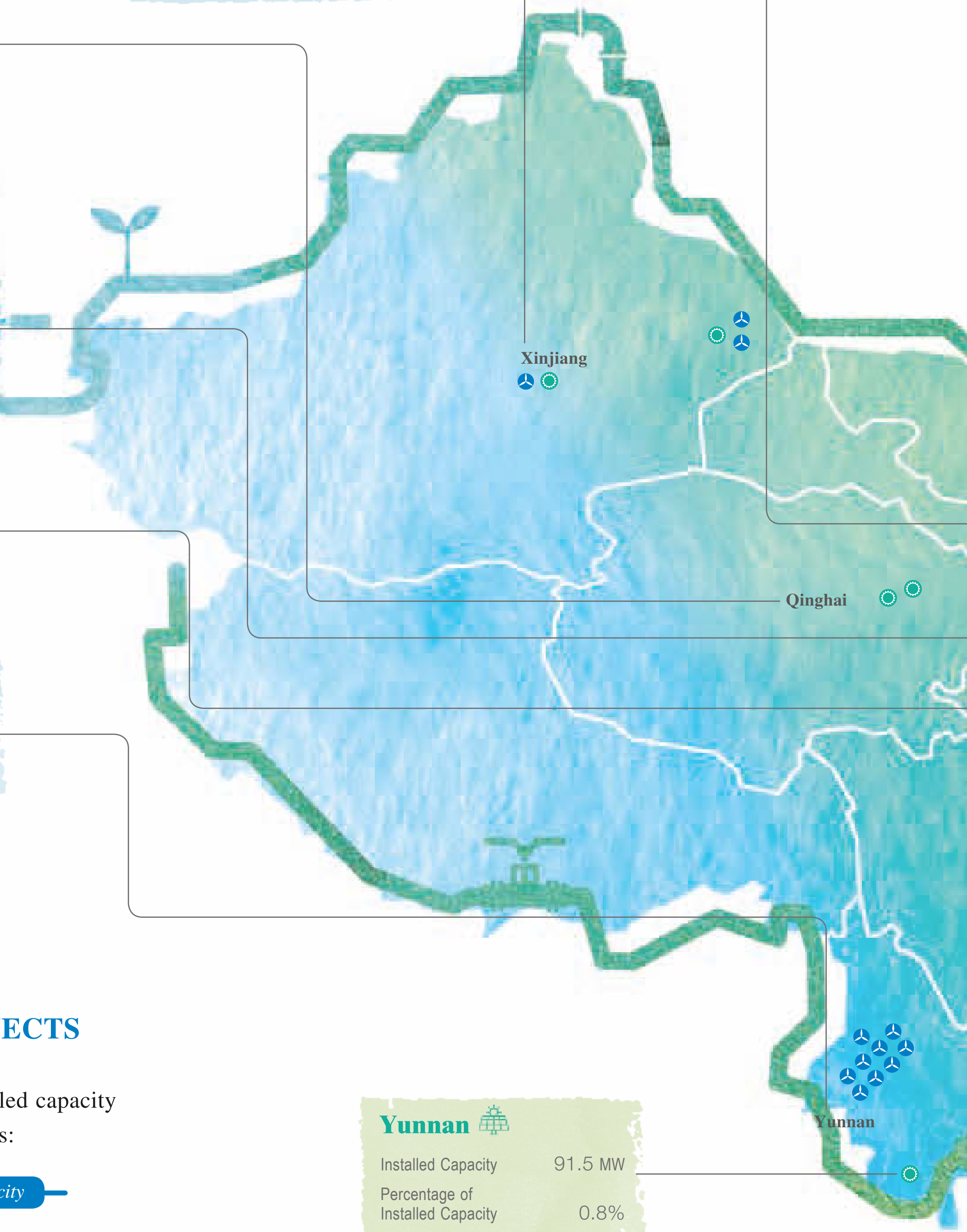
Installed Capacity	30.0 MW
Percentage of Installed Capacity	0.3%

Shaanxi (wind)

Installed Capacity	508.5 MW
Percentage of Installed Capacity	4.2%

Yunnan (wind)

Installed Capacity	1,116.5 MW
Percentage of Installed Capacity	9.3%



DISTRIBUTION OF PROJECTS

Distribution of the Company's installed capacity as at 31 December 2018 is as follows:

denotes wind power installed capacity

denotes solar power installed capacity

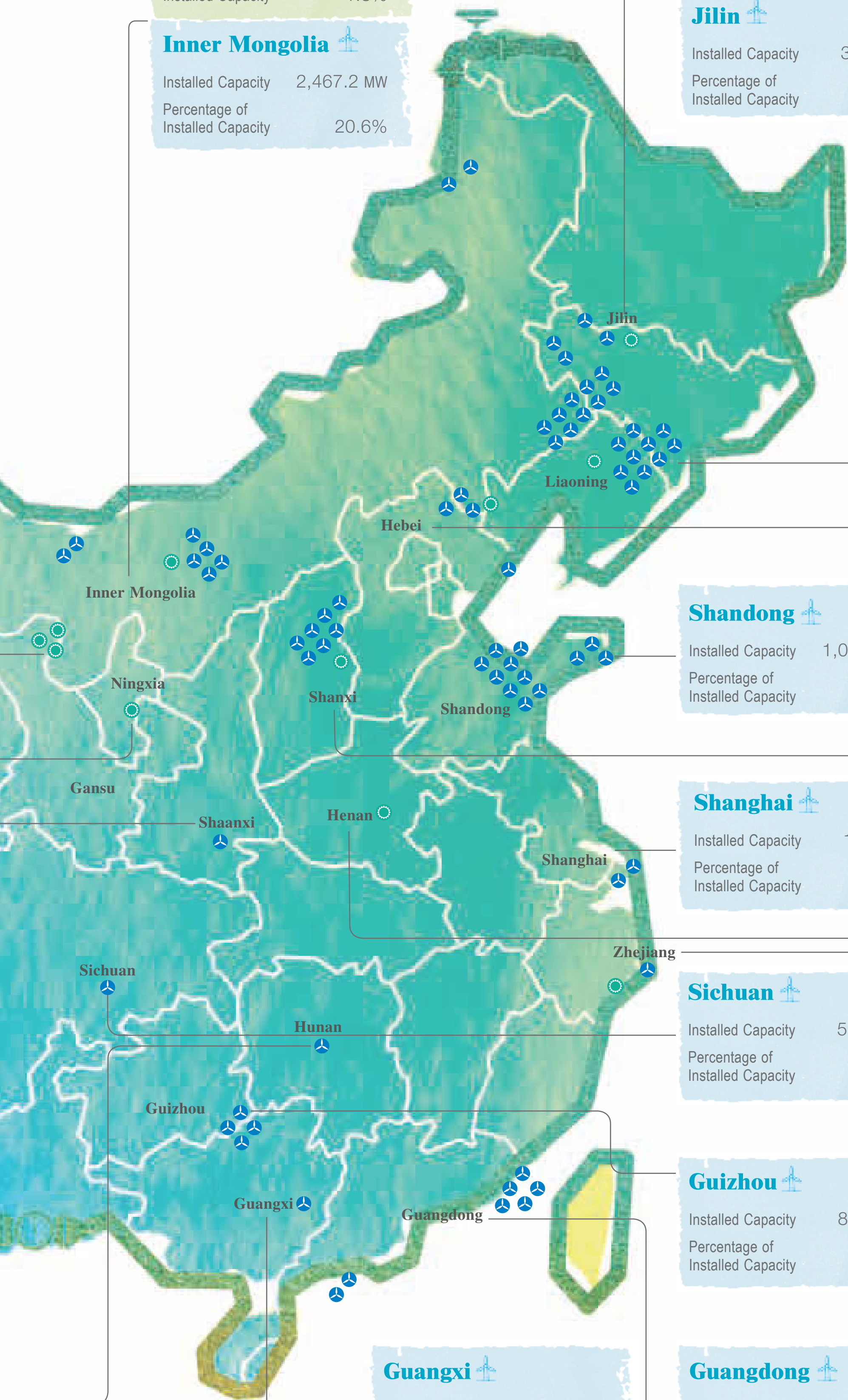
Note: *Percentage of the installed capacity represents the percentage ratio of the Company's installed capacity in each region to the total installed capacity of the Company (Due to rounding, the total percentage may not add up to 100%)*

Yunnan (solar)

Installed Capacity	91.5 MW
Percentage of Installed Capacity	0.8%

Hunan (wind)

Installed Capacity	41.0 MW
Percentage of Installed Capacity	0.3%



Inner Mongolia

Installed Capacity	220.0 MW
Percentage of Installed Capacity	1.8%

Inner Mongolia

Installed Capacity	2,467.2 MW
Percentage of Installed Capacity	20.6%

Jilin

Installed Capacity	10.0 MW
Percentage of Installed Capacity	0.1%

Jilin

Installed Capacity	396.0 MW
Percentage of Installed Capacity	3.3%

Liaoning

Installed Capacity	56.0 MW
Percentage of Installed Capacity	0.5%

Liaoning

Installed Capacity	1,408.5 MW
Percentage of Installed Capacity	11.8%

Hebei

Installed Capacity	20.0 MW
Percentage of Installed Capacity	0.2%

Hebei

Installed Capacity	459.5 MW
Percentage of Installed Capacity	3.8%

Shandong

Installed Capacity	1,024.5 MW
Percentage of Installed Capacity	8.6%

Shanghai

Installed Capacity	108.0 MW
Percentage of Installed Capacity	0.9%

Shanxi

Installed Capacity	40.0 MW
Percentage of Installed Capacity	0.3%

Shanxi

Installed Capacity	805.5 MW
Percentage of Installed Capacity	6.7%

Sichuan

Installed Capacity	591.0 MW
Percentage of Installed Capacity	4.9%

Henan

Installed Capacity	1.0 MW
Percentage of Installed Capacity	0.01%

Guizhou

Installed Capacity	883.0 MW
Percentage of Installed Capacity	7.4%

Zhejiang

Installed Capacity	74.5 MW
Percentage of Installed Capacity	0.6%

Zhejiang

Installed Capacity	8.0 MW
Percentage of Installed Capacity	0.1%

Guangxi

Installed Capacity	199.5 MW
Percentage of Installed Capacity	1.7%

Guangdong

Installed Capacity	502.6 MW
Percentage of Installed Capacity	4.2%

Major Corporate Events in 2018

JANUARY

The Company held the first session of the second staff representative meeting and 2018 work meeting to review its works in 2017, analyse the circumstances faced by the Company and study and assign its work plan in 2018.

The Company issued the announcement on power generation for 2017, announcing its power generation of 22,433,827.0 MWh, representing a year-on-year increase of 15.4%.

MARCH

The Company announced its annual results for 2017 with net profit attributable to equity shareholders of the Company reaching RMB3,011.7 million, representing a year-on-year increase of 13.3%.

The Company held its 2017 annual results analyst/fund manager meeting and press conference in Hong Kong and carried out its 2017 annual results roadshow afterwards.

MAY

The Company organized a reverse roadshow in Liaoning Province by inviting 21 domestic and foreign analysts from securities companies to visit the project sites and conduct the research on the wind-agriculture-solar complement power station in Zhangwu, Liaoning, the wind power project in Daxing and the centralized control center in Liaoning.

JUNE

The Company held its 2017 annual general meeting. Resolutions including the Work Report of the Board of Directors for 2017, Work Report of the Supervisory Committee for 2017, Financial Report for 2017 and the Profit Distribution for 2017 were considered and passed.

The Company commissioned poverty alleviation photovoltaic projects in Bayannaoer and Wuchuan, respectively, and the phase II photovoltaic project in Shilin Xijiekou, which secured a higher tariff.

LIN Gang, the Chairman of the Company was awarded with the "National Outstanding Entrepreneurs for 2017-2018" in the Activity Day of National Entrepreneur and Annual Meeting of Entrepreneurs in 2018, which was held by China Enterprise Union and China Entrepreneur Association.

JULY

The Company held its 2018 mid-year work meeting cum economic activities analysis meeting and summarized its work in the first half of the year, analyzed the circumstances faced by the Company and made work plan for the second half of the year.

The Company issued the announcements on power generation for June and the first half of 2018 respectively, announcing its gross power generation for the first half of the year of 13,609,562.7 MWh, representing a year-on-year increase of 14.7%.

AUGUST

The Company announced its interim results for 2018 with net profit attributable to equity shareholders of the Company reaching RMB2,348.9 million, representing a year-on-year increase of 15.6%.

The Company held its 2018 interim results analyst/fund manager meeting and press conference in Hong Kong and carried out its 2018 interim results roadshow afterwards.

The Company announced the implementation of the profit distribution in 2017 and distributed a cash dividend of RMB0.043 (tax inclusive) per ordinary share for the end of 2017 to its shareholders.

The Company was officially selected as one of pilot units for "Double-Hundred Actions" with regard to reform of state-owned enterprises by the State-owned Assets Supervision and Administration Commission.

OCTOBER

The Company successfully issued the first, second and third tranches of super short-term debentures for 2018 each with a total amount of RMB1.0 billion and the interest rate of 3.3%, 3.45% and 3.3%, respectively.

NOVEMBER

The Company successfully issued the fourth tranche of super short-term debenture for 2018 with a total amount of RMB1.0 billion with the interest rate of 2.9%.

DECEMBER

The Company was awarded with the "Best Investor Relations Management Listed Company Award" of the 8th China Securities Golden Bauhinia Awards, Chairman LIN Gang was entitled the "Outstanding Contribution Entrepreneur in the Forty Years Course of Reform and Opening Up".

The Company was granted the 2018 highest corporate governance award "Platinum Award" by "The Assets" for the second consecutive year.

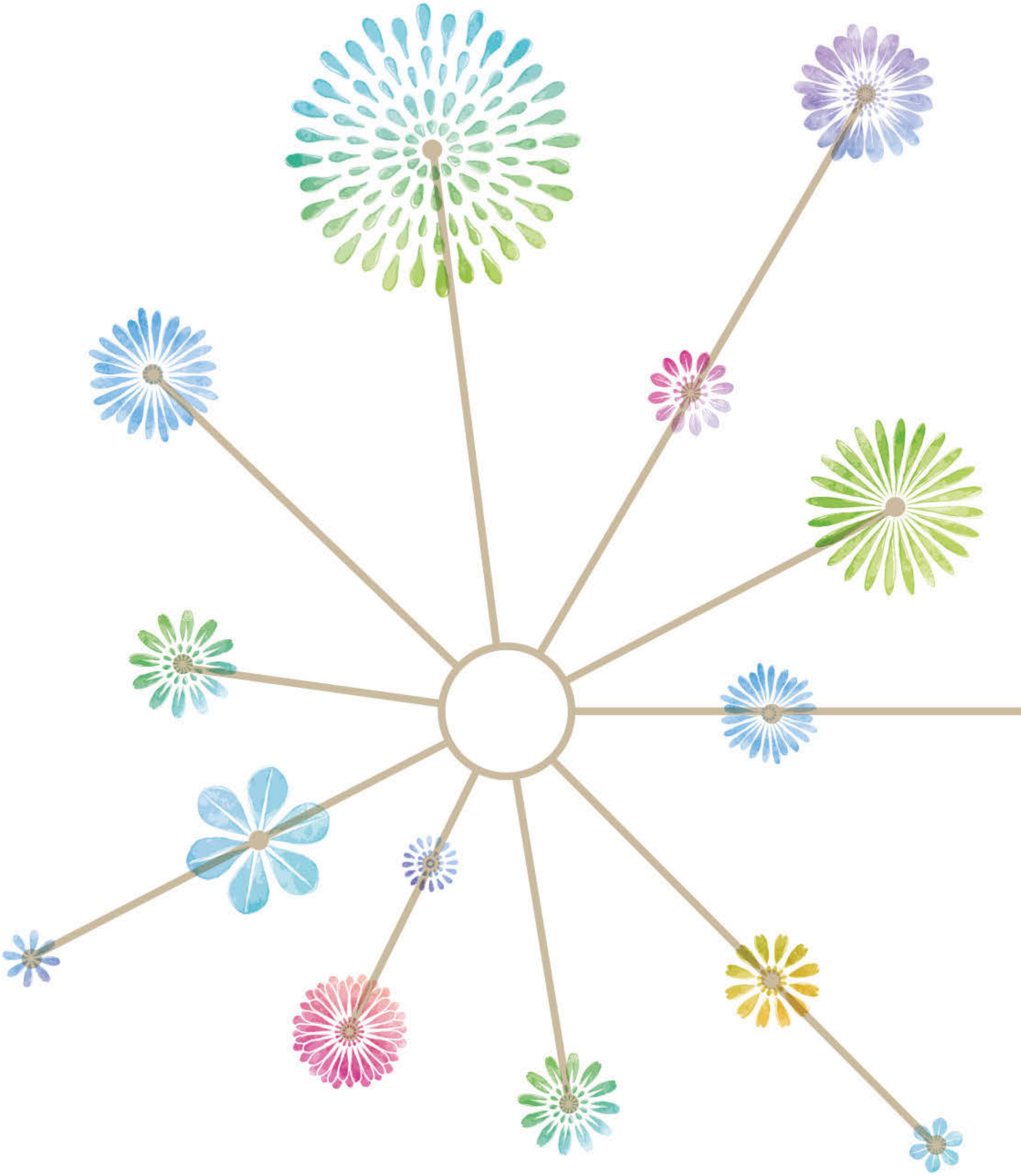
The Company successfully issued the fifth tranche of super short-term debenture for 2018 with a total amount of RMB1.0 billion with the interest rate of 3.1%.

The Company obtained approval for the 100MW phase II wind power projects in Lanling, Shandong province and the 50MW wind power projects in Wushan, Chongqing.

The Company achieved power generation of 2,851,854.4 MWh, representing an increase of 29.5% and the record high of the Company's monthly power generation.

The Company obtained an intellectual property regarding the structure of an Isolating switch link, which is the 21st intellectual property of the Company and has further improved the ability of independent innovation.

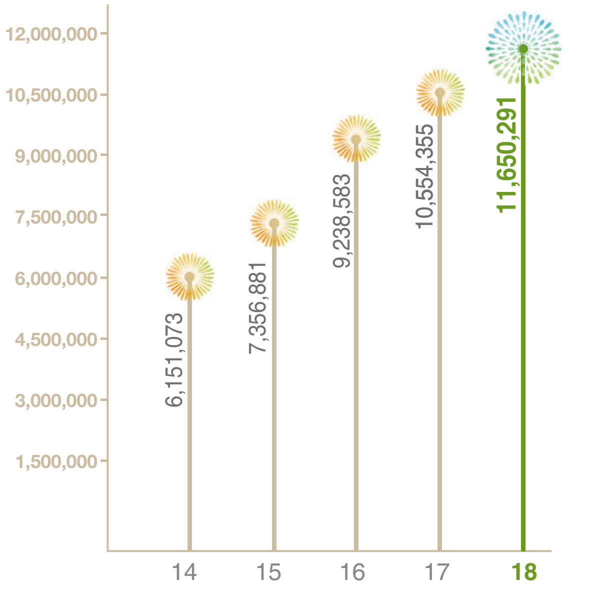
Financial and Operational Summary




Lighting
Up
Everywhere

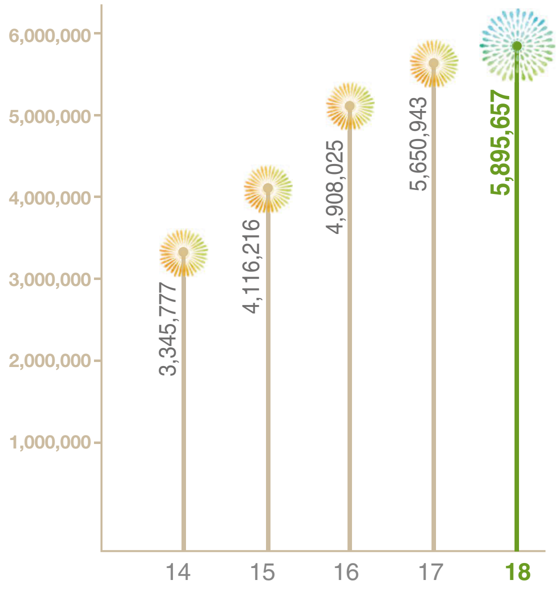
Revenue

Unit: RMB in thousands



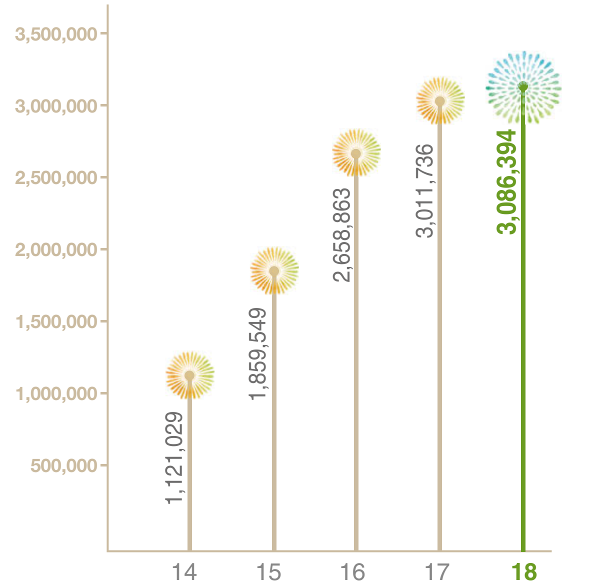
Operating profit

Unit: RMB in thousands



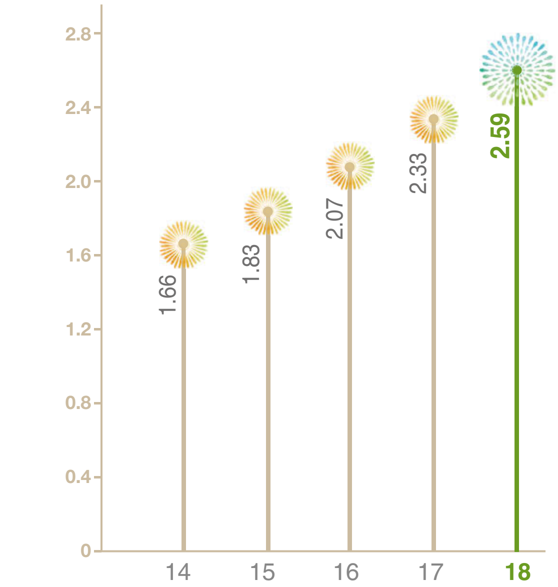
Net profit attributable to equity shareholders of the Company

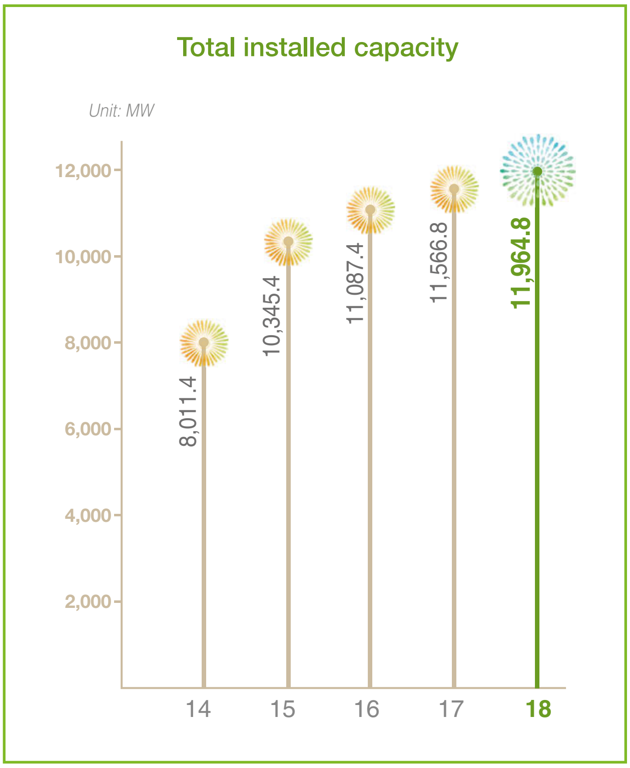
Unit: RMB in thousands

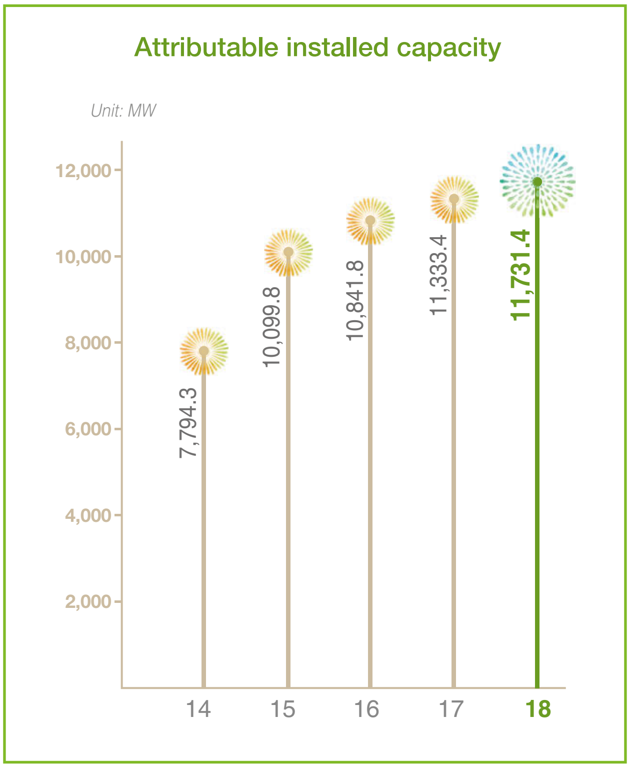


Net assets per share (exclusive of interests held by non-controlling interests)

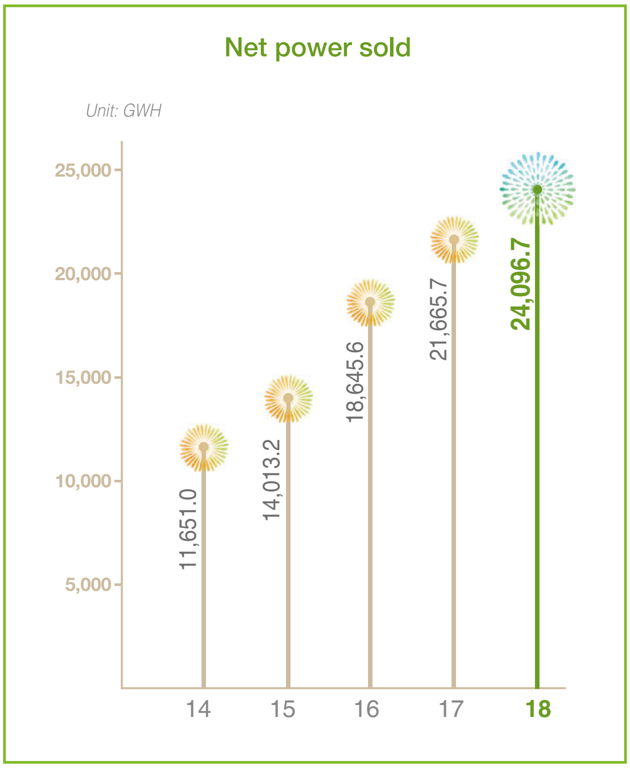
Unit: RMB




Total installed capacity
Unit: MW
12,000
10,000
8,000
6,000
4,000
2,000
8,011.4
10,345.4
11,087.4
11,566.8
11,964.8
14
15
16
17
18


Attributable installed capacity
Unit: MW
12,000
10,000
8,000
6,000
4,000
2,000
7,794.3
10,099.8
10,841.8
11,333.4
11,731.4
14
15
16
17
18


Gross power generation
Unit: GWH
25,000
20,000
15,000
10,000
5,000
12,177.8
14,669.1
19,435.1
22,433.8
24,973.8
14
15
16
17
18


Net power sold
Unit: GWH
25,000
20,000
15,000
10,000
5,000
11,651.0
14,013.2
18,645.6
21,665.7
24,096.7
14
15
16
17
18

FIVE YEARS SUMMARY OF CONSOLIDATED STATEMENT OF COMPREHENSIVE INCOME

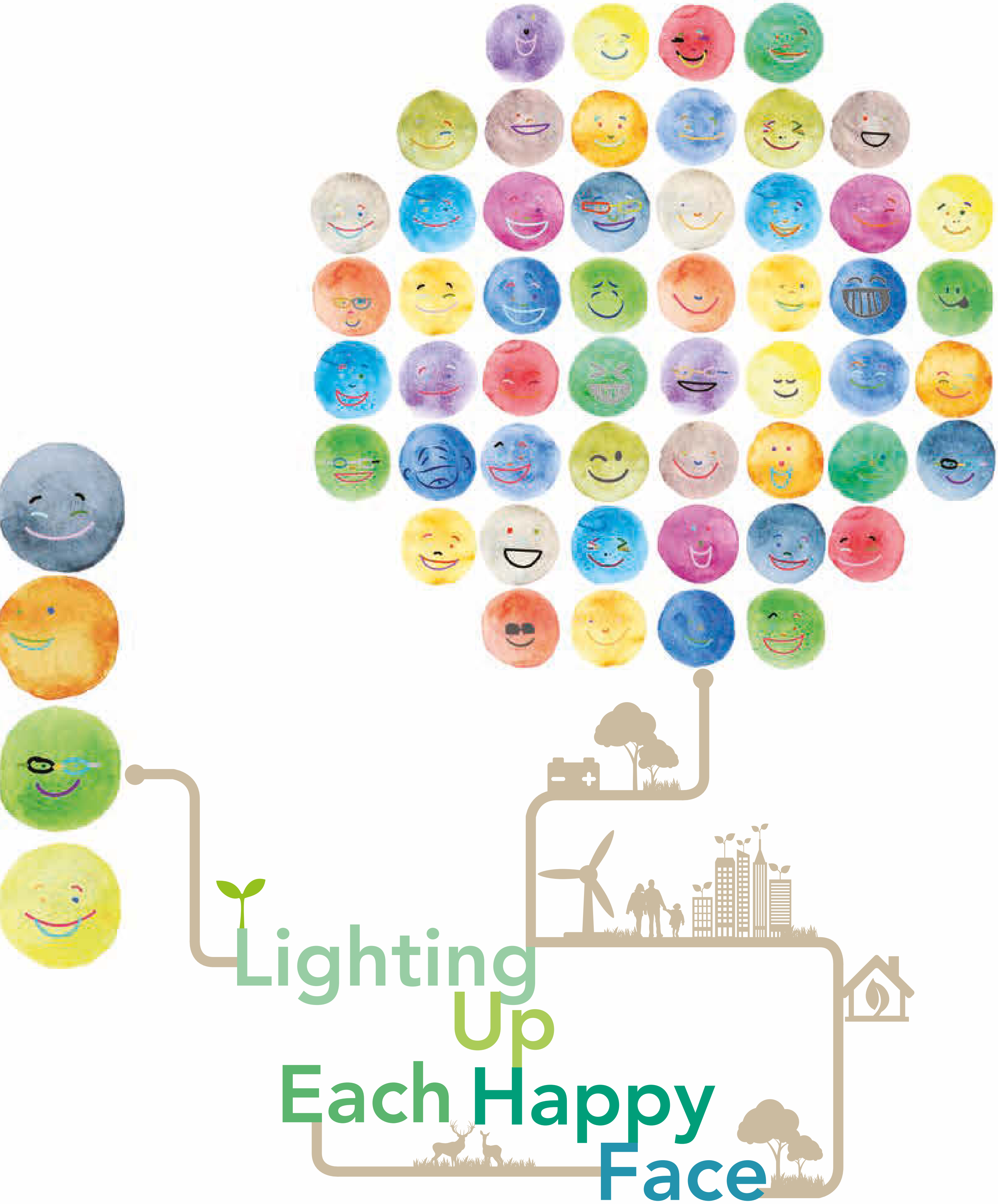
	2014	2015	2016	2017	**2018**
	RMB'000	*RMB'000*	*RMB'000*	*RMB'000*	***RMB'000***
Revenue	6,151,073	7,356,881	9,238,583	10,554,355	**11,650,291**
Other net income	167,651	434,889	321,698	468,859	**387,748**
Operating expenses	(2,972,947)	(3,675,554)	(4,652,256)	(5,372,271)	**(6,142,382)**
Operating profit	3,345,777	4,116,216	4,908,025	5,650,943	**5,895,657**
Net Profit	1,146,764	1,899,186	2,708,014	3,061,322	**3,128,460**
Net profit attributable to:					
Equity shareholders of the Company	1,121,029	1,859,549	2,658,863	3,011,736	**3,086,394**
Non-controlling interests	25,735	39,637	49,151	49,586	**42,066**
Basic and diluted earnings per share (RMB cents)	12.39	19.12	27.33	29.38	**29.21**

FIVE YEARS SUMMARY OF CONSOLIDATED STATEMENT OF FINANCIAL POSITION

	At 31 December				
	2014	2015	2016	2017	**2018**
	RMB'000	*RMB'000*	*RMB'000*	*RMB'000*	***RMB'000***
Total non-current assets	62,996,820	74,900,999	76,749,036	75,106,816	**74,089,240**
Total current assets	11,141,483	7,651,780	8,695,572	11,241,753	**14,582,235**
Total assets	74,138,303	82,552,779	85,444,608	86,348,569	**88,671,475**
Total current liabilities	25,740,898	28,533,234	30,517,250	27,086,065	**29,030,965**
Total non-current liabilities	31,512,204	35,395,087	33,933,395	33,820,602	**31,426,967**
Total liabilities	57,253,102	63,928,321	64,450,645	60,906,667	**60,457,932**
NET ASSETS	16,885,201	18,624,458	20,993,963	25,441,902	**28,213,543**
Total equity attributable to equity shareholders of the Company	16,101,254	17,797,808	20,137,150	24,601,613	**27,408,378**
Non-controlling interests	783,947	826,650	856,813	840,289	**805,165**
TOTAL EQUITY	16,885,201	18,624,458	20,993,963	25,441,902	**28,213,543**

Note: The Group adopted IFRS 9, *Financial instruments*, from 1 January 2018. As a result, the Group has changed its accounting policies in relation to financial instruments. As allowed by IFRS 9, the Group has not restated information relating to prior years. Differences in the carrying amounts of the financial assets resulting from the adoption of IFRS 9 were recognised in reserves at 1 January 2018. There was no difference in the carrying amounts of the financial liabilities. Prior to 1 January 2018, figures were stated in accordance with the policies applicable in those years.

Management Discussion and Analysis


Lighting
Up
Each Happy
Face

2018 BUSINESS REVIEW

In 2018, the Company's management, together with all its staff, made joint efforts to proactively cope with the challenges brought about by the increasingly stringent eco-environmental protection requirements, changes in tariff fixing mechanism and the increased difficulties in obtaining project approvals. Adhering to the principle of high-quality development, the Company maintained a stable momentum of safe operation and achieved a stable growth of operating performance.

1. Power generation

The Company precisely grasped the orientation of the State policies, closely kept up with the dynamics of power market, actively reflected the industry appeals and continuously lowered the curtailment rate. Adhering to the "economic efficiency centric" principle, the Company endeavored to consummate its marketing mechanism, and optimize its market trading strategies, consequently achieved the most optimal economic outcome.

In 2018, the gross power generation of the Company reached 24,973,793.2 MWh, representing a year-on-year increase of 11.3%, of which wind power generation amounted to 23,563,445.2 MWh, representing a year-on-year increase of 11.2%; solar power generation amounted to 1,410,348.0 MWh, representing a year-on-year increase of 13.5%.

The breakdown of power generation of the Company in 2018 and 2017 is set out as follows:

	Gross power generation of the year (MWh)		
Business sector and region	**2018**	2017	Change
Wind power generation	**23,563,445.2**	21,191,298.6	11.2%
Including: Inner Mongolia	**5,175,269.6**	4,679,903.0	10.6%
Yunnan	**3,436,014.5**	3,123,417.4	10.0%
Liaoning	**3,149,863.6**	2,946,416.3	6.9%
Shandong	**1,857,496.1**	1,757,762.5	5.7%
Shanxi	**1,631,682.4**	1,423,831.4	14.6%
Sichuan	**1,527,352.8**	1,319,413.0	15.8%
Guizhou	**1,451,741.2**	1,270,628.1	14.3%
Xinjiang	**1,012,343.3**	924,719.8	9.5%
Guangdong	**951,271.1**	1,068,443.2	-11.0%
Shaanxi	**936,945.5**	713,090.9	31.4%
Jilin	**888,134.3**	754,087.7	17.8%
Hebei	**804,404.8**	743,606.3	8.2%
Guangxi	**381,951.9**	131,268.3	191.0%
Shanghai	**213,357.0**	195,471.6	9.1%
Zhejiang	**145,617.1**	139,239.1	4.6%
Solar power generation	**1,410,348.0**	1,242,528.4	13.5%
Total	**24,973,793.2**	22,433,827.0	11.3%

The weighted average utilization hours of the Company's wind farms in 2018 were 2,234 hours, representing an increase of 152 hours as compared to 2017, achieving an industry-leading position. The weighted average utilization hours of the Company's solar power projects in 2018 were 1,642 hours, representing an increase of 52 hours as compared to 2017.

The breakdown of weighted average utilization hours of the Company in 2018 and 2017 is set out as follows:

	Weighted average utilization hours (hour)		
Business sector and region	**2018**	2017	Change
Weighted average utilization hours of wind power	**2,234**	2,082	7.3%
Including: Guangxi	**3,452**	3,772	-8.5%
Yunnan	**3,080**	2,799	10.0%
Sichuan	**2,611**	2,643	-1.2%
Liaoning	**2,268**	2,137	6.1%
Xinjiang	**2,262**	2,066	9.5%
Jilin	**2,243**	1,904	17.8%
Shanxi	**2,195**	1,947	12.7%
Hebei	**2,146**	2,057	4.3%
Inner Mongolia	**2,097**	1,897	10.5%
Shaanxi	**2,056**	1,989	3.4%
Shanghai	**1,976**	1,810	9.2%
Zhejiang	**1,955**	2,051	-4.7%
Shandong	**1,905**	1,774	7.4%
Guangdong	**1,893**	2,133	-11.3%
Guizhou	**1,814**	1,770	2.5%
Weighted average utilization hours of solar power	**1,642**	1,590	3.3%

2. Project construction

The Company promoted project construction in full swing and reinforced quality control of construction, which ensured the successful on-grid commissioning of the poverty alleviation photovoltaic project in Bayannaoer, Inner Mongolia, the poverty alleviation photovoltaic project in Wuchuan and the phase II photovoltaic project of Shilin Xijiekou, Yunnan by 30 June 2018. The on-grid commissioning of the wind power project in Meiqiao town, Hunan marked an operating coverage breakthrough of the Company in Hunan Province. In 2018, the newly installed capacity was 398.0 MW, of which wind power projects and photovoltaic power projects amounted to 346.5 MW and 51.5 MW, respectively.

As at 31 December 2018, the Company accumulated a total installed capacity of 11,964.8 MW, of which the total installed capacity of wind power projects and photovoltaic projects was 11,033.3 MW and 931.5 MW, respectively.

The breakdown of the Company's installed capacity as at 31 December 2018 and 2017 is set out as follows:

	Installed capacity (MW)		
Business sector and region	**As at 31 December 2018**	As at 31 December 2017	Change
Wind power installed capacity	**11,033.3**	10,686.8	3.2%
Including: Inner Mongolia	**2,467.2**	2,467.2	–
Liaoning	**1,408.5**	1,408.5	–
Yunnan	**1,116.5**	1,116.5	–
Shandong	**1,024.5**	975.0	5.1%
Guizhou	**883.0**	787.0	12.2%
Shanxi	**805.5**	743.5	8.3%
Sichuan	**591.0**	591.0	–
Shaanxi	**508.5**	458.5	10.9%
Guangdong	**502.6**	502.6	–
Hebei	**459.5**	411.5	11.7%
Xinjiang	**447.5**	447.5	–
Jilin	**396.0**	396.0	–
Guangxi	**199.5**	199.5	–
Shanghai	**108.0**	108.0	–
Zhejiang	**74.5**	74.5	–
Hunan	**41.0**	–	–
Solar power installed capacity	**931.5**	880.0	5.9%
Including: Qinghai	**255.0**	255.0	–
Inner Mongolia	**220.0**	170.0	29.4%
Gansu	**150.0**	150.0	–
Yunnan	**91.5**	90.0	1.7%
Liaoning	**56.0**	56.0	–
Xinjiang	**50.0**	50.0	–
Shanxi	**40.0**	40.0	–
Ningxia	**30.0**	30.0	–
Hebei	**20.0**	20.0	–
Jilin	**10.0**	10.0	–
Zhejiang	**8.0**	8.0	–
Henan	**1.0**	1.0	–
Total	**11,964.8**	11,566.8	3.4%

3. Preliminary development

In response to the State's policy trend of speeding up the reduction of subsidies and promoting grid parity of new energy projects, the Company actively carried out its work to enrich resources reservation. During the year, 332.0 MW capacity of wind power projects (including 32.0 MW capacity of distributed wind power projects) were included in the annual wind power development plan; 150.0 MW capacity of wind power project was approved; 1.6 MW capacity of photovoltaic project was filed and obtained construction scale.

4. Cost control

The Company strengthened cost management in the entire process of project construction, strictly examined project settlement and effectively controlled the project costs. The Company also seized favorable market windows to issue super short-term debentures with an amount of RMB5 billion, which has effectively controlled its capital cost.

5. Science and technology support

Adhering to the doctrine of having science and technology to take the leading role, the Company continuously deepened the integration between preliminary development of projects and technology innovation in order to improve the project efficiency in full life cycle . The Company has completed 11 intellectual properties such as *One Kind of Variable Pitch Slip-ring for Onshore Wind Turbines* and established three national or industrial standards including the *Basic Technical Requirements for Offshore Wind Turbines*.

6. Awards in the capital market

In 2018, the Company won multiple awards in the capital market. The Company was granted the "Best Investor Relations Management Listed Company" of the 8th China Securities Golden Bauhinia Awards, Chairman LIN Gang was entitled the "Outstanding Contribution Entrepreneur in the Forty Years Course of Reform and Opening Up". The Company won the highest corporate governance award "Platinum Award" presented by "The Assets", and was named as the "Most Valuable Company in Energy and Resources Sector" for the first time in Golden H share listed company Awards organized by Zhitong Caijing.

2019 BUSINESS OUTLOOK

In 2019, China will adhere to the green and low-carbon development mode and will accelerate the optimization of energy structure. In virtue of policy impetus, gird structure renovation and the continuous improvement of market mechanism, the consumption of renewable energy will maintain a good momentum and the curtailment issue will be further alleviated with a dual reduction in rate and volume. Concurrently, faced with the reduction in subsidies and the accelerated process of grid parity, the Company will encounter additional challenges in its operation and development.

Confronted with complicated and variable external situation and increasingly fierce market competition, the Company will continually take quality and efficiency as its core task and take reform and innovation as its driving force, actively adapt to market changes, pre-emptively seize opportunities, develop in an innovative way, so as to further improve its market competitiveness and promote the realization of the sustainable high-quality development.

In 2019, the Company will focus on the following aspects:

1. In terms of safe operation, the Company will further consolidate the foundation of safe operation, intensify the equipment management and improve the operating efficiency.

2. In terms of cost control, the Company will optimize its financing structure and strengthen the refined cost control to achieve cost reduction and efficiency enhancement.

3. In terms of project construction, the Company will firmly seize the time gap prior to grid parity, advance the commissioning of projects and secure the project's returns.

4. In terms of preliminary development, the Company will pre-emptively layout base-form, scaled and economically efficient projects and enrich quality reservation.

5. In terms of power market, the Company will pay close attention to the policy trend and the introduction of supporting measures, actively conduct research on business operating arrangements in order to capture market opportunities in the first instance.

6. In terms of scientific and technological innovation, the Company will proactively exert the leading role of scientific and technological innovation and promote the profound application of scientific and technological achievements in the project's full life cycle.

RESULTS OF OPERATIONS AND ANALYSIS

1. Overview

In 2018, profit before taxation of the Group amounted to RMB3,695.2 million, representing an increase of RMB287.5 million or 8.4% as compared with RMB3,407.7 million of the previous year. Net profit amounted to RMB3,128.5 million, representing an increase of RMB67.2 million or 2.2% as compared with RMB3,061.3 million of the previous year. Net profit attributable to equity shareholders of the Company amounted to RMB3,086.4 million, representing an increase of RMB74.7 million or 2.5% as compared with RMB3,011.7 million of the previous year.

2. Revenue

In 2018, revenue of the Group amounted to RMB11,650.3 million, representing an increase of RMB1,095.9 million or 10.4% as compared with RMB10,554.4 million of the previous year. The change in revenue was primarily due to the fact that the power sold by the Group in 2018 amounted to 24,096.7 million kWh, representing an increase of 2,431.0 million kWh or 11.2% as compared with 21,665.7 million kWh of the previous year; and the on-grid tariff (tax inclusive) of the Group in 2018 was RMB0.563/kWh, representing a decrease of 1.2% as compared with the previous year.

3. Other net income

In 2018, other net income of the Group amounted to RMB387.7 million, representing a decrease of RMB81.2 million or 17.3% as compared with RMB468.9 million of the previous year.

4. Operating expenses

In 2018, operating expenses of the Group amounted to RMB6,142.4 million, representing an increase of RMB770.1 million or 14.3% as compared with RMB5,372.3 million of the previous year. The increase was primarily due to the increase in depreciation and amortisation expenses and personnel costs arising from the newly-added installed capacity of operational projects, as well as the influence of impairment losses.

Depreciation and amortisation expenses: In 2018, depreciation and amortisation expenses of the Group amounted to RMB3,972.9 million, representing an increase of RMB174.4 million or 4.6% as compared with RMB3,798.5 million of the previous year. The increase was primarily due to the increase in the installed capacity of operational projects.

Personnel costs and administration expenses: In 2018, personnel costs and administration expenses of the Group amounted to RMB924.7 million, representing an increase of RMB163.1 million or 21.4% as compared with RMB761.6 million of the previous year. The increase was primarily due to the Group's expansion and more projects being put into operation.

Repairs and maintenance and other operating expenses: In 2018, the Group's repairs and maintenance and other operating expenses amounted to RMB1,244.8 million, representing an increase of RMB432.6 million or 53.3% as compared with RMB812.2 million of the previous year. The increase was primarily due to (1) the increased repair and maintenance expenses, materials expenses and other expenses resulting from the increase in installed capacity of operating projects; and (2) the impairment losses of project under construction of RMB419.0 million recognised in 2018, representing an increase of RMB214.8 million as compared with impairment losses recognised in the previous year.

5. Operating profit

In 2018, operating profit of the Group amounted to RMB5,895.7 million, representing an increase of RMB244.8 million or 4.3% as compared with RMB5,650.9 million of the previous year.

6. Net finance expenses

In 2018, net finance expenses of the Group amounted to RMB2,189.3 million, representing a decrease of RMB49.0 million or 2.2% as compared with RMB2,238.3 million of the previous year. This was primarily due to a certain amount of exchange loss occurred in the previous year as a result of exchange fluctuation.

7. Income tax

In 2018, income tax of the Group amounted to RMB566.7 million, representing an increase of RMB220.4 million or 63.6% as compared with RMB346.3 million of the previous year. The increase was mainly due to the increase in profit before taxation and the maturity of the preferential tax treatment that a number of projects was entitled to.

8. Liquidity and source of funding

As at 31 December 2018, the current assets of the Group amounted to RMB14,582.2 million, including bank deposits, cash and restricted deposits of RMB3,482.2 million, trade debtors and bills receivable of RMB9,968.2 million. Current liabilities of the Group amounted to RMB29,031.0 million, comprising RMB21,614.3 million of short-term borrowings (including short-term borrowings, super short-term debentures and long-term borrowings due within one year) and RMB6,816.9 million of other payables (which primarily consisted of payables for equipment purchased from suppliers, construction payables and retention payables). As at 31 December 2018, the current ratio (the current assets to current liabilities ratio) of the Group was 0.50, representing an increase of 0.08 as compared with 0.42 as at 31 December 2017.

As at 31 December 2018, the Group's outstanding borrowings (including bonds) amounted to RMB50,225.2 million, representing an increase of RMB421.1 million as compared with RMB49,804.1 million as at 31 December 2017. As at 31 December 2018, the Group's outstanding borrowings comprised short-term borrowings (including short-term borrowings, super short-term debentures and long-term borrowings due within one year) of RMB21,614.3 million and long-term borrowings (including bonds) of RMB28,610.9 million, which were all denominated in RMB.

9. Capital expenditure

In 2018, the capital expenditure of the Group amounted to approximately RMB4,176.7 million, representing an increase of RMB520.8 million or approximately 14.2% as compared with RMB3,655.9 million of the previous year, which was primarily due to the year-on-year increase in construction investment of the Group in 2018.

10. Net gearing ratio

As at 31 December 2018, the net gearing ratio of the Group, which was calculated by dividing net debt (total borrowings and obligations under finance leases minus cash and cash equivalents) by the sum of net debt and total equity, was 63.0%, representing a decrease of 2.8 percentage points as compared with 65.8% as at 31 December 2017.

11. Material investments

In 2018, the Group did not have any material investment.

12. Material acquisitions and disposals

In 2018, the Group did not have any material acquisition or disposal.

13. Pledge of assets

As at 31 December 2018, Huaneng Ge'ermu Photovoltaic Power Generation Co., Ltd. of the Group pledged certain property, plant and equipment for its bank loans.

14. Contingent liabilities

As at 31 December 2018, the Group did not have any material contingent liability.

RISK FACTORS AND RISK MANAGEMENT

1. Risk associated with policies

The development of wind power and solar power companies closely relate to the State policy, regulations and the incentive schemes. Considering the recent policies released by government to speed up the reduction of subsidies, there will be certain changes in the profit model of future projects of the Company. In addition, with further deepening of power system reform and continuous improvement in power market trading mechanism, the scale of the market trading generation increases accordingly and the average tariff will be impacted in a certain degree. As the State's requirements on eco-environmental protection becomes increasingly stringent, the difficulties in project commencement consequently increase.

With regard to this, the Company will proactively adapt to the new situation and new requirements, closely follow the policy changes, actively reflect corporate appeals, correctly interpret policy trend, grasp market dynamics in real time and pre-emptively seize development opportunities. The Company will also strengthen the leading role of science and technology, intensify ecological protection, innovate its profit model, enhance its corporate competitiveness, improve its risk resistance and profitability and strive all efforts for high-quality development.

2. Risk associated with climate

Wind power and solar power generation are sensitive to climate changes. The total wind power and solar power resources in an area change every year, which is the key factor affecting the power generation in the area. Furthermore, wind farms are usually located in remote areas with adverse environment conditions and frequently occurring natural disasters. Extreme weather like freeze, typhoons, strong thunderstorm, tornadoes, poses great risks to the operation safety of the wind farm.

With regard to risks associated with climate, the Company constantly optimizes the layout of wind farms and solar power stations, which are now distributed among 20 regions across the country, effectively reducing the impact of wind (solar) resources changes in some regions on the overall operation of the Company. In light of extreme weather, the Company has summarized past experience, made technical changes to the existing projects in a timely manner and optimized the newly built projects in terms of project design, equipment selection, project construction and other aspects. The Company has also formulated various contingency plans to establish a smooth and efficient contingency response mechanism. The Company will prepare various kinds of emergency supplies and carry out special inspections to proactively cope with disasters in advance and maximally prevent and control the loss of disasters.

3. Risk associated with grid curtailment

The mismatch between the planning and construction of grid supporting facilitates and that of new energy power sources as well as the relatively low power load in certain regions result in the curtailment of renewable energy at some power stations in different degrees, which brings certain risks to the Company's operations.

Since 2016, China has successively issued a number of policies to promote the consumption of renewable energy, which has greatly alleviated the curtailment issue of the industry. At the same time, the Company continued optimizing the layout of its projects, shifting the focus of project development to regions with better grid access conditions; improved the operating level of the facilities by strengthening equipment management; and actively participated in the formulation of favorable consumption policies with an aim to create a sound business environment and increase its market share in power generation. The Company's curtailment rate is expected to decline further in 2019.

4. Risk associated with capital

With the implementation of the targeted Required Reserve Ratio (RRR) cut policy, in 2019, the capital market is expected to maintain a stable and good momentum, and monetary credit will maintain stable growth, whereas periodical financial constraints may occur.

To actively respond to market changes, the Company will attach equal importance to direct and indirect debt financing while ensuring the safety of capital, and profoundly diversify the financing channels. Besides traditional financing platform, the Company will make full use of the close integration of capital and business, continue innovating the financing mode, optimize the structure, coordinate the capital arrangement, strengthen capital management and control, strictly control the risk associated with capital, and further lower the cost, so as to provide strong financial support for the continuous and healthy development of the Company.

Human Resources

1. SUMMARY OF HUMAN RESOURCES

As at 31 December 2018, the Company had a total of 2,614 full-time employees, among which 179 received postgraduate degrees or above (representing 6.9% of the total number of employees), 1,836 received undergraduate degrees (representing 70.2% of the total number of employees) and 599 received college diplomas or below (representing 22.9% of the total number of employees).

The Company had 20 employees aged above 55 (representing 0.8% of the total number of employees); 486 employees aged between 36 (inclusive) and 55 (representing 18.6% of the total number of employees); 2,108 employees aged 36 or below (representing 80.6% of the total number of employees).

2. EMPLOYEE INCENTIVES

The Company has adopted various incentive mechanisms to attract talents and has established an effective mechanism for staff performance appraisal and management. It has also studied and formulated incentive policies to attract professional technical and management talents in the wind power industry. To cope with development needs, the Company has established a sound performance assessment mechanism based on the position-specific target accountability system, which is conducted by objectively evaluating the performance of staff against all performance targets framed in a sense that incentives and restraints run concurrently. Open promotion is adopted for some management positions, thus creating opportunities for staff development. The Company is strived to achieve the multi-channel development of management talents, technical talents, and talents with special skills.

3. STAFF TRAINING

To meet the needs for healthy development of the Company and self-development of employees, the Company attaches great importance to the build up of its workforce and has been strengthening employee training. With a view to enhancing the professional capability and management skills of employees, the Company organized a wide range of trainings under different levels and categories in 2018 for various personnel ranging from the management to technical employees. The Company provides a four level orientation and training program to newly-joined staff including management interface cognition, standardized management of power generation system, wind power enterprises basic practice and scientific and refined management of listed companies, and designs training programs based on the professional and specialty backgrounds of individual employees. The Company organized various professional training and induction training courses delivered by professional lecturers and experienced technical experts in its subsidiaries as well as held contest for diversified skills. The Company also organized our staff to join the professional skills training relating to wind and power with a total of 124 staffs gained wind and power professional skills grade certification. The Company actively encouraged its subsidiaries to carry out on-the-job training, appraisal and certification of skilled personnel so as to improve employees' quality.

4. REMUNERATION POLICY

The Company has fully implemented an annual remuneration system for the management of its subsidiaries with different categories of remuneration mechanisms. The Company scientifically determines employee's remuneration based on the remuneration policy, with an emphasis on the evaluation results of employees in determining performance-based remuneration. It awards its subsidiaries that meet or exceed expectations on task completion or have special contributions. The remuneration policy favours subsidiaries with good performance. The Company cares about the income of frontline staff and staff working in remote areas or facing difficult living conditions. The Company provides income incentives and links job performance of the management and employees of its subsidiaries with their income. Based on evaluation results, remunerations are adjusted to favour individuals and departments with outstanding contributions, and collaboration among different departments is also taken into account, which cultivates a result, performance and contribution oriented working culture.

In 2018, the Company made active exploration in incentives mechanism and promulgated a series of systems as Advice on the Position Sequence Management in subsidiaries of the Company (《公司基層企業崗位序列管理指導意見》), Administrative Measures on Company's Payroll (《公司工資總額管理辦法》), Company's Basic Salary Approval Measures (Trial) (《公司基數工資核定辦法(試行)》), Measures on Linking Salaries with Performance (Trial) (《公司績效考核與工資總額掛鉤辦法(試行)》), the revised Measures on Remuneration Management for Managers in subsidiaries of the Company (《公司基層企業負責人薪酬管理暫行辦法》), to instruct the subsidiaries to formulate and revise the relating management rules, whereby the Company developed a relative well-established remuneration incentive system.

Environmental, Social and Governance Report

As a leading domestic new energy company, Huaneng Renewables adheres to the direction of "low-carbon economy and green development", sets "building a first-class new energy enterprise in China and even in the world" as the strategic goal and promotes "harmony, innovation and pursuit of excellence" as the spirit of enterprise. The Company makes every effort to contribute clean energy and improve power supply structure. With quality improvement and efficiency enhancement as its main line, deepening reform as the driving force, Huaneng Renewables actively promotes the sustainable development of enterprises and society.

STAKEHOLDER ENGAGEMENT

Huaneng Renewables upholds the principle of sincerity openness, attaches great importance to responsibility communication and focuses on establishing a comprehensive, multi-channel and normalized social responsibility communication system, through which it can listen to external voices carefully, continuously improves itself, and effectively enhance the capability and effectiveness of performance.

In 2018, the Company further expanded communication channels by actively working with government departments, strengthened industry policy study, so as to deeply understand and respond to stakeholders' needs. The Company actively communicated with the national energy authorities and provided suggestions to promote the effective landing of national policies. Mr. LIN Gang, the Chairman of the Board of the Company, was entitled the "Outstanding Contribution Entrepreneur in the Forty Years Course of Reform and Opening Up" of the 8th China Securities Golden Bauhinia Award.

The Company actively interacts with investors. For the fifth consecutive year, the Company has been granted the "Best Investor Relations Management Listed Company" of China Securities Golden Bauhinia. In 2018, the Company was awarded the highest corporate governance award "Platinum Award for All-Round Excellence" presented by "The Assets", and the "Most Valuable Company in Energy and Resource Sector" in Golden Hong Kong Stocks Awards 2018.

Based on industry characteristics and business model, the Company identified the following important stakeholders that interact with the enterprise, and determined the Company's material Environmental, Social and Governance ("**ESG**") matters through interviews and surveys with stakeholders.

Stakeholders	Expectations and requirements	Engagement
Government and Regulators	– Compliance operations – Guaranteeing the safety and reliability of the product – Promoting technological progress – Implementing the tasks of energy saving and reducing emissions – Providing employment	– Information disclosures – Regular communications – Visiting reception
Investors	– Providing a sustained and stable return on investment – Compliance operations – Strengthening information disclosures	– Shareholders' meetings – Information disclosures – Performance roadshow – Visiting reception – Investment summit

Stakeholders	Expectations and requirements	Engagement
Customers	– Providing high–quality products and services – Creating value for customers	– Customer activity – Regular communications
Employees	– Protecting the rights and interests of employees – Improving development channels – Improving professional skills – Safeguarding occupational health – Promoting work–life balance	– Labor contracts – Workers congress – Opinion inquiries – Making public the affairs of enterprises
Suppliers and Partners	– Procurement with openness, equality, and fairness – Adhering to contracts – Mutual benefit and long–term cooperation	– Contracts, agreements – Products and services
Peer Companies and Industry Organizations	– Fair operations – Win–win cooperation – Promoting industry development	– Integrity – Technical exchanges – Holding industry activities
Community	– Participating in community development – Poverty alleviation – Ecological environment protection	– Targeted poverty alleviation – Cooperation – Safety and environmental protection – Public service

MATERIAL ISSUES ANALYSIS

In compliance with national macro-policy, the requirements of the ESG Report Guide of HKEX, the Company identified the material ESG issues that are the subject of this report based on corporate development strategy and planning, industry benchmarking and stakeholder interviews and surveys.

Through the analysis of "stakeholders' concerns" and the "importance to the sustainable development of the Company", the issues matrix of sustainable development is formulated.

Screening Flow for Material Environmental, Social and Governance Topics

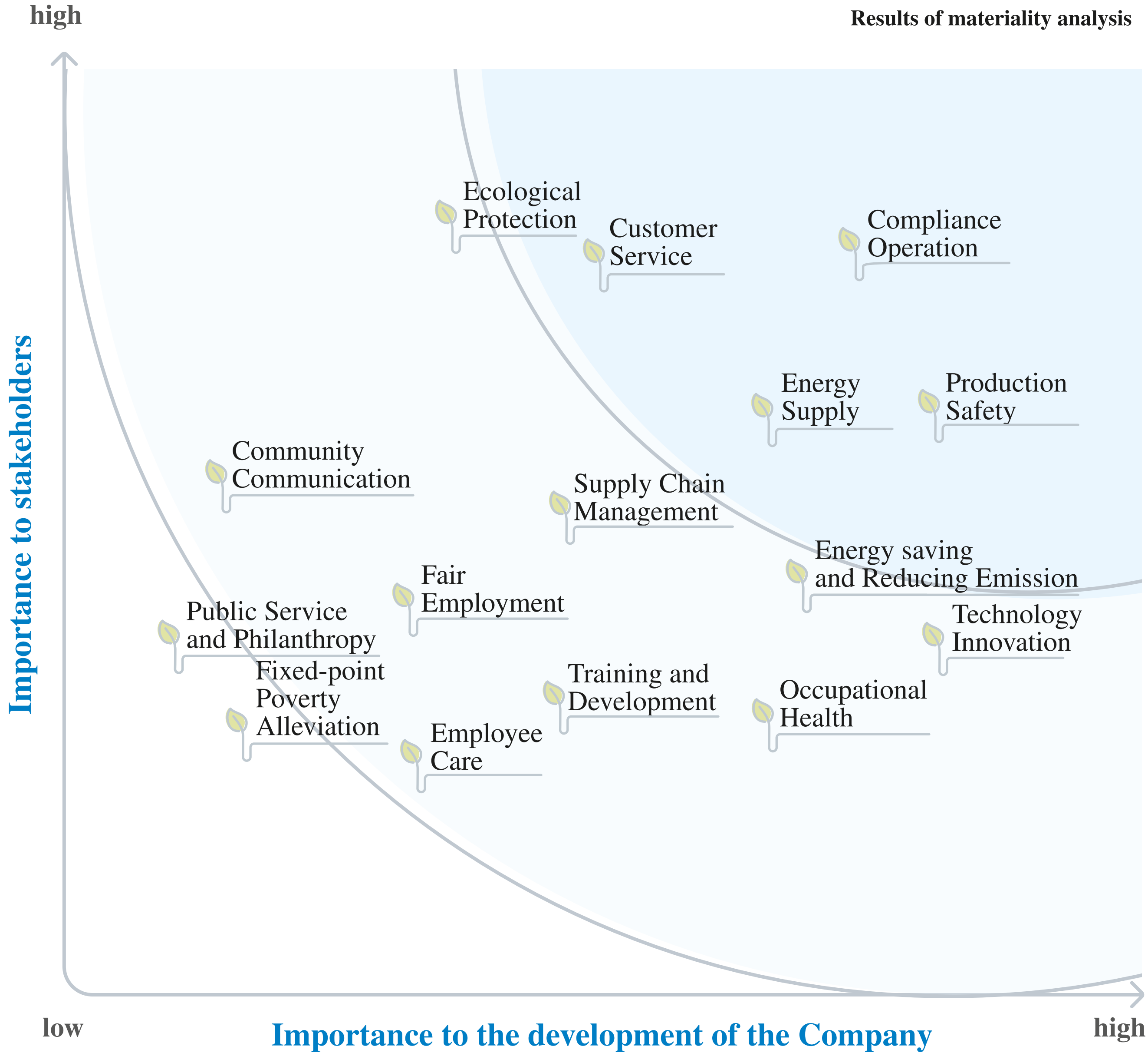
Topic Sources

- Analysis and suggestions from internal and external experts
- Multimedia analysis
- National and international peer companies benchmarking study
- Corporate management suggestions
- Industry frontier research

Screening standard

- Contribution to sustainable development
- Stakeholders' universal concerns
- Reference to related ESG report guidelines
- Accordance with the needs of corporate strategic development

Results of materiality analysis



1. CORPORATE GOVERNANCE

1.1 Risk management

The Company attaches great importance to risk management and internal controls. The Company formulated a number of policies, such as Overall Risk Management Measures, Measures for Managing Legal Affairs and others, to strengthen the prevention and control of risk exposure and process control, enhance supervision and accountability, and improve the legal risk early warning mechanism. In addition, the Company regularly invited experts to provide employees with training on compliance so as to raise company-wide awareness of compliance issues.

During the Reporting Period, the Company actively consolidated the management of lawsuit disputes in grass-roots enterprises, strengthened business training, and continuously improved the level of legal affairs management. At the same time, it actively promoted the comprehensive application of online legal system and improved the level of risk management informatization. In 2018, the Company organized 40 compliance training sessions, providing compliance training of 5,070 hours.

1.2 Clean governance

Huaneng Renewables has always attached great importance to enhancing the sense of integrity and self-discipline of its staff and building a solid ideological defense line against corruption.

Employees of the Company strictly abide by the Party's discipline and national laws. Regulation on the Integrity of State-owned Enterprise Officials has set a high standard and a strict bottom line for leading cadres of companies. Considering the requirements of Huaneng Group and the Company's actual situation, relevant rules were developed and implemented, including Measures for Clean Governance and Liability System, Detailed Rules for the Supervision of Clean Governance, List of Supervisory Responsibilities, Measures for the Management of Records of Recommendation and Intervention in the Field of Procurement and Bidding (for Trial Implementation), Regulations on Business Avoidance Management (for Trial Implementation), etc. These rules and measures make the Company's clean governance more systematic, scientific, and comprehensive.

In 2018, the Company formulated the Responsibility Letter for Clean Governance at various levels, establishing and improving nine discipline inspection and supervision systems. The Company set up a leading group for inspection work, established a talent pool for inspection work, set up inspection teams, carried out special inspection in the field of procurement and bidding for 10 grass-roots units in the Company's system, and carried out routine inspection for two grass-roots units. These have help to identify problems, form deterrence and rectify them in time.

During the Reporting Period, no corruption-related incidents or litigation occurred.

The Company held a symposium on "Discipline Accompanying Healthy Growth"

On 3 July 2018, the Company held a symposium on the theme of "strengthening the awareness of discipline, sticking to the bottom line, and promoting the healthy growth of young employees". This is an important measure for the Company to continuously promote the discipline construction, targeting on young employees under 35 years old, who account for more than 70% of the Company's employees. At the symposium, the delegates shared their learning experience on the definition, use, substance of discipline, and understanding of the bottom line and how to observe discipline. They also had a heated discussion on the relationship between discipline and morality, whether discipline representing incompetence, and how young people confronting injustice. The leaders of the discipline inspection and supervision department of the Company also put forward hopes and requirements for young employees to strengthen their sense of discipline and stick to the bottom line.

2. CREATING RESPONSIBLE PRODUCTS

A new round of energy reform with the theme of clean energy development and utilization is booming all over the world. New energy, represented by wind power and photovoltaic, is developing rapidly. With wind power development and operation as the core task, supplemented by solar energy and other renewable energy sources, the Company, as a domestic specialized company for the construction of wind power industry, seeks to develop energy sources in a coordinated manner. Adhering to scientific development and rational principles, the Company aims to grow by combining the successful management and efficient distribution of existing products with trail-blazing development and mergers and acquisitions. The Company now owns photovoltaic and wind power generating operations across the country, and is expanding to more areas to improve power supply structure, contributing clean energy and fulfilling social responsibility.

2.1 Improving the quality of products and services

In 2018, Guided by the doctrine of "focusing on quality and efficiency" and full integrated "quality improvement and efficiency enhancement" into the operation position, the Company actively carried out various work in system construction, technical review, scientific research management, promotion of key demonstration projects, promotion and training of frontier technologies. The Company promoted all-round innovation in business model, system and mechanism, technical products and other fields.

By organizing video conference from time to time and with daily report system, the Company can keep abreast of the construction progress of the project site and promote the construction process. At the same time, the Company strengthens quality supervision and management, its quality supervision center carries out quality inspection on the projects under construction and new projects.

From the design, commencement to completion phase of the project, the Company has designed the relevant management and control processes to ensure product quality:

- Strengthen the quality control of infrastructure construction to achieve "zero defect" of quality, and further consolidate the preliminary design of the project, strictly supervise the internal and external evaluation work to ensure the design quality from the beginning

- Fully push forward the progress of projects to achieve "zero delay" of project progress

- Enhance supervision and control to achieve "zero waste" of construction cost

- Accelerate the handling of historical legacy issues to achieve "zero accountability" for rectification work, and supervise the areas where the completion of the closing work lags behind, so as to promote project rectification

2.2 Technology-driven Innovation

Following the guidelines for the scientific and technological work of "independent innovation, multiple cooperation, key breakthroughs and guidance for the development", and firmly adhering to the new concept that "Innovation is the primary impetus to development", the Company fully mobilized the enthusiasm and creativity of employees and stimulated their vigor in innovation and entrepreneurship in 2018 in combination with the Guiding Opinions on the Enhancement of Innovation and Entrepreneurship Work of Huaneng Group, with the purpose of enhancing the level of scientific and technological management, consolidating the technical reviews, and giving impetus to the high-quality development of the Company.

In terms of the system, the Company revised three systems, including the Administrative Regulations on the Scientific and Technological Work of Huaneng Renewables Corporation Limited, the Administrative Measures on the Fundraising and Usage of Technology R&D Expenditures of Huaneng Renewables Corporation Limited and the Detailed Rules for the Implementation of the Scientific and Technological Innovation Individual Award of Huaneng Renewables Corporation Limited, which provided powerful support for the motivation of the front-line innovation.

Development of "Innovation Studio" in Front-line Enterprises

Huaneng Renewables fully mobilized the innovation enthusiasm of front-line employees to establish the innovation platform and create a favorable environment for innovation. Yunnan branch established "Yelin Innovation Studio" and had good performance in the trial operation. Based on the above experience, the Company proactively helped regional branches with powerful technology and good development in Liaoning and Inner Mongolia to promptly establish the "technology innovation studio", in order to build a favorable environment in support of the talent growth, technological innovation and achievement transformation.

In terms of management, the Company gradually standardized the scientific and technological management, effectively integrated scientific research resources, actively carried out research and development and organized and coordinated the management of the Group's scientific and technological projects:

Firstly, the Company continuously enhanced the level of the project review, focused on the micro-siting, equipment selection and other aspects in the "genetic engineering", improved the accuracy of review, and promoted the in-depth integration between the preliminary development and scientific and technological innovation of the project;

Secondly, the Company completed the approval of the scientific research projects and selected 45 new energy (wind power and PV) projects in the preliminary contest of the technological innovation competition among employees as the nucleus in the new energy technology field;

Thirdly, the Company promoted the scientific and technological work among front-line enterprises and extended the scientific and technological management system to the frontline workers. The Company required that each regional branch should establish the leading group and working group for the scientific and technological work, and the working group is composed of members from each wind farm and photovoltaic power station of the front-line unit;

Fourthly, the Company deeply carried out the mass entrepreneurship and innovation;

Fifthly, the Company conducted researches on new technology such as energy storage, heat storage and micro-grid as the leader in the industry.

In 2018, the Company carried out 71 technical innovation projects in 12 regional branches, including the update of dynamic reactive power compensation equipment, reform of grid-related characteristics of wind turbines, security reform of the secondary system, and change of climb-assisted devices into climb-free devices. The Company applied for 23 patents and was granted 15.

In addition, the Company strengthened the application of the scientific and technological achievements in regional branches, gradually generalized the practical scientific and technological achievements effective for the safe and stable operation such as the Research on the Wind Power Three-dimensional Digital Simulation Technology and Development and Application of the Training System, and facilitates the transformation of scientific and technological achievements into productivity and industrial activities by holding exchange meetings for advanced technology such as PV and energy storage.

2.3 Optimization of Supply Chain Management

High-quality supply chain management is the foundation for guaranteeing project development and product and service quality, as well as the essential condition for ensuring the smooth running of the Company. Focusing on the communication and cooperation with suppliers, Huaneng Renewables established harmonious, interactive and sound relationship in the form of technology exchange seminars with suppliers and created the responsibility supply chain, in order to achieve cooperation and benefits.

The Company has formulated relevant regulations such as the Supplier Management Methods and Detailed Rules for Implementation of Supplier Management. It is stipulated in the supplier access policy and scoring standards that, the bidders (except public institutions) for all bidding sections should pass the ISO9000 quality control system certification. Supplier evaluation is carried out on an annual basis. In 2018, the Company established and improved the material procurement system, printed and issued 42 procurement systems, which classified procurement procedures, enhanced procurement efficiency, and prevented unbudgeted and unplanned procurement. Meanwhile, the Company made the bid invitation and procurement of each unit more standardized by establishing special inspection tour and long-term functional supervision and inspection mechanism, organized the annual supplier evaluation, included relevant suppliers into list of bad records, realized dynamic management of suppliers, and effectively improved the order of the bid invitation and tendering management.

In 2018, Huaneng Renewables had 580 suppliers, all of which are domestic.

3. CARING THE GREEN HOME

As a renewable energy company, Huaneng Renewables adheres to the concept of green development and is based on national conditions and energy revolution trend. The Company proactively develops the wind power generation and solar energy power generation business, optimizes the domestic energy structure, and enhances the sustainable development of the company, industry and society. Meanwhile, the Company thoroughly implements the energy conservation and environmental protection concept, conducts the environmental impact assessment system, improves the environmental management and monitoring plans, prevents and reduces the adverse environmental impacts of operating activities, and creates the "environment-friendly, eco-friendly and efficiency-oriented" green wind power projects.

During the Reporting Period, the Company didn't violate any environmental laws, and was involved in no incidences of environmental pollution.

3.1 Responding to Climate Changes

Active response to the climate changes is the inherent requirement to realize the sustainable development in China, as well as the responsibility to deeply participate in the global governance and promote the mutual development of all the human beings. Devoted to the investment in the establishment and operation of new energy projects, the Company focuses on the development and utilization of wind energy resources, delivers green energy and improves the environmental quality in active response to the domestic and foreign policies on climate change. By actively following the Guiding Opinions on the Establishment of the Goal Guidance System of Renewable Energy Development and Utilization, the 13th Five-Year Plan for Power Development, the 13th Five-Year Plan for Renewable Energy and the 13th Five-Year Plan for Energy Development issued by the National Energy Administration, the Company strives to establish the clean development mechanism, and reduce the emission of greenhouse gas.

In 2018, the Company actively sped up the development of clean energy, eased the shortage of power supply and adjusted the energy structure. As of 31 December 2018, the gross power generation of the Company reached 24,973,793.2MWh, representing a year-on-year increase of 11.3%, of which wind power generation amounted to 23,563,445.2MWh, representing a year-on-year increase of 11.2%; solar power generation amounted to 1,410,348.0MWh, representing a year-on-year increase of 13.5%.

During the Reporting Period, the emission reduction through wind power generation was 29,519,144.00 tons of CO_2 equivalent, and the emission reduction through photovoltaic power generation was 3,248,912.34 tons of CO_2 equivalent.

3.2 Promoting Energy Conservation and Emission Reduction

The Company strives to improve the environmental quality following the concept of energy conservation and emission reduction. The Company strictly abided by the Environmental Protection Law of the People's Republic of China, and the Environmental Protection Management Regulations of China Huaneng Group Corporation. It is stipulated in the Management Regulations that, all the pollutants emitted in the production should comply with the emission standards and total quantity control requirements of the local and national governments, and treatment or transformation is required in case of failure to reach above standards and requirements; the unqualified environmental protection facilities should be promptly upgraded and reformed in strict accordance with relevant regulations of Huaneng Group such as the Power Generation Capital Expenditure Management Measures and Guiding Opinions on the Upgrading and Transformation of Flue Gas Pollutant Emission Control of Coal-fired Units.

During the Reporting Period, the only hazardous waste produced by the Company was used oil, all of which was disposed of by a qualified third party.

Emissions Produced by Huaneng Renewables in 2018

Index	Data
Waste water emissions (ton)	67,625.76
Greenhouse gas emissions (ton of CO_2 equivalent)	57,830.73
Used oil production (ton)	94.36
Harmless waste production (ton)	561.05

In 2018, the Company actively enhanced the upgrading and transformation of energy-saving technology and continuously improved the energy utilization efficiency. It also encouraged all the employees to enhance resource-saving awareness, and educated the office personnel on energy conservation and environmental protection. In addition, the Company further intensified the management of official vehicles and vehicle use records and strengthened the supervision and assessment of fuel consumption of vehicles. During the Reporting Period, 13 official vehicles of the head office consumed fuel of 5,699.52L, representing a decrease compared with the corresponding period of the previous year.

Resource Consumption by Huaneng Renewables in 2018

	Index	**Data**
Energy consumption	Power consumption (KWH)	53,739,147.41
	Gas consumption (ton)	733.16
	Diesel consumption (ton)	55.43
	Natural gas consumption (m^3)	10,565.00
	Liquefied petroleum gas (canned gas) (ton)	16,014.37
Water resource consumption	Municipal water consumption (ton)	67,660.16
	Surface water (including well and river water) consumption (ton)	40,821.71
	Reclaimed water (ton)	20,571.22

3.3 Carrying Out Ecological Protection

The wind power development plays an important role in easing the power supply shortage, energy conservation, emission reduction and adjustment of energy structure. The wind farm construction projects also have significant impacts on natural resources including occupying land resources and changing land use functions and structure. The development and construction of wind farms will inevitably have certain impacts on the regional eco-environment such as the aboveground vegetation deterioration and water and soil loss. Considering most of the wind farms are built on ridges with a high altitude and fragile ecosystem, the Company will take several years for wind farms to restore the vegetation. Therefore, Huaneng Renewables has been adhering the principle of "protecting in development and developing in protection" and devoting to the vegetation restoration and subsequent improvement in wind farms, adhering to the principle of "protection in development and development while protection".

The Company strictly abides by relevant laws and regulations including the Environmental Protection Law of the PRC, the Law of the PRC on Environmental Impact Assessment, and the Environmental Protection Management Regulations of China Huaneng Group during the project operation, and implements the environmental impact assessment system.

During the project design, the Company analyzes the possible impacts of the project on the environment, mainly including the eco-environment, water environment, acoustic environment, atmospheric environment, natural landscape and electromagnetic radiation, comes up with protective measures, makes environmental management and monitoring plans, formulates the environmental protection investment budget, and strives to strike a balance between the clean energy development and utilization and the protection of eco-environment.

After the project is put into operation, the Company continuously carries out the vegetation restoration and subsequent improvement in wind farms. For instance:

- Apply to the superior company for the allocation of post-project funds for replanting grass and trees upon completion of each wind farm project;
- Continuously organize training classes for water and soil conservation to enhance the employees' awareness of water conservation and environmental protection;
- Organize all the employees to participate in activities such as tree planting, fertilization and soil improvement on the wind farms;
- Add protective barricades on the side slope of roads on the wind farms;
- Carry out the large-scale greening transformation of wind turbine platforms, entrance roads, booster stations, slag fields, etc.;
- Invite botany experts to carry out manual intervention, speed up vegetation restoration, and make independent seedling and transplantation;
- Build the bare surface vegetation restoration pilot areas, flower and grass seeds experimental fields, and sapling cultivation bases on the plateau-type wind farms, and carry out sowing and seedling raising experiments;
- Sow the seeds of several plants that are adapted to the local climate around the wind power plants and take care of them in the long term with equipment such as watering carts and excavators.

Vegetation Restoration for Yuntai Mountain and Tile Kiln Wind Power Project of Yunnan Branch

Since most of the wind farms are built in places with a high altitude and fragile ecosystem, the Company will take several years to restore the vegetation upon completion of the project construction. Yunnan branch actively organizes the training class for water and soil conservation, enhances the eco-environmental awareness of employees, leads all the employees to deeply carry out vegetation restoration on the wind farms, and massively plants trees in regions with damaged vegetation such as the wind turbine platforms, entrance roads, booster stations, slag fields.

3.4 Advocating Green Office

The Company integrates the green operation and environmental protection concept into the enterprise operation and management, effectively enhances employees' environmental awareness, energy conservation and low carbon in response to the green trend, and improves the resource utilization rate.

The Company continuously advocates the green office, realizes paperless office in the circulation of official documents and various meetings, and covers the video conferencing system all over the Company. In 2018, the head office saved approximately RMB50,286 due to the green office, and realized mutual benefits of environmental protection and economic benefits.

The major solid waste generated by the Company is office trash and kitchen garbage, which is collected and treated by the professional third party. During the Reporting Period, 260.59 tons of office trash and 266.42 tons of kitchen garbage were respectively produced, amounting to 527.01 tons.

4. CULTIVATING OUTSTANDING EMPLOYEES

Adhering to the concepts of "talents are the primary resources of the enterprise" and "people-orientation", and implementing the principles of "respecting labor, knowledge, talents and creation", the Company protects the employees' rights and interests in the recruitment, training and incentive, actively provides individual growth channels and platforms for employees, enhances employees' sense of happiness and belonging, and pursues for the mutual growth of the enterprise and employees.

4.1 Protecting Employees' Rights and Interests

The Company attach great importance to the protection of employees' rights and interests, creates an equal and comfortable working environment in terms of talent recruitment, occupational health and employee communication, and prevent any infringements upon employees' rights and interests.

Equal Employment

The Company implements equal and fair labor policies and formulates the Personnel Labor Management Regulations of the Head Office of Huaneng Renewables Corporation Limited in accordance with relevant laws and regulations including the Labor Law of the PRC, the Labor Contract Law of the PRC, and the Law of the Protection of Juveniles of the PRC, in order to guarantee the equal treatment for employees of different nationalities, ethnic groups, genders and religions without any kind of discrimination, and focus on the legitimate rights and interests of female and difficult employees. In 2018, there was no discrimination, use of child labor or forced labor in the employment of the Company.

Number of Employees of Huaneng Renewables in 2018

	Category of employees	Number (person)
Total number of employees		2,614
By gender	Male	2,218
	Female	396
By age	Below 35 years old	2,089
	35-45 years old	339
	Above 45 years old	186
By place of employment	Employees from mainland China	2,614
	Employees from foreign countries and Hong Kong, Macao and Taiwan	0

Safe Production

Regarding production safety as the foundation for the enterprise development, the Company implements the Production Safety Law of the PRC and continuously and independently carries out the safe production and management. Four production safety systems were newly released in 2018, including the Safety Rewards and Punishment Measures of Huaneng Renewables Corporation Limited and the Production Safety Responsibility Implementation, Inspection and Evaluation Management Measures of Huaneng Renewables Corporation Limited (Trial). Meanwhile, the Company provides guidance for subsidiaries to adjust and improve the production safety responsibility system, establishes production safety bonus fund, classifies the production safety assessment circumstances, comprehensively establishes the production safety reward and punishment system, and enhances the level of refined management of production safety. In 2018, Huaneng Renewables did not have production safety accidents, work-related deaths or loss of working days due to work-related injuries.

In 2018, the Company organized various special inspections, successfully got through disastrous weather such as typhoons, snow and rain, completed 45 on-site inspections of production and construction projects, supervised and guided the subsidiaries to effectively eliminate potential safety hazards and management blind spots.

On the basis of the "Year of Implementing the Production Safety Responsibility System" in 2017, the Company further improved and enhanced the promotion and implementation of the production safety responsibility system in 2018.

The working contents of the "Year of Implementing the Production Safety Responsibility System among All the Employees" in 2018 were as follows:

January:	The Company revised and improved the Production Safety Responsibility System Implementation Evaluation Standards (for Wind Power and PV)
March:	The Company formulated and issued the Production Safety Responsibility System Implementation, Inspection Tour and Evaluation Management Measures
April:	The Company formulated the inspection tour and evaluation plans, and issued the Notification concerning the Implementation, Inspection Tour and Evaluation of the Production Safety Responsibility System
May-October:	The Company carried out comprehensive inspection tours and evaluations on 14 subsidiaries, issued the feedback letters and assessment reports, and found out 853 problems. The Company supervised and urged the correction of problems in each unit, and the correction has been basically completed.

Shanxi Branch Successfully Held the 3rd "Ankang Cup" Knowledge Contest

On 20 June 2018, Shanxi branch held the 3rd "Ankang Cup" Knowledge Contest, which was attended by 39 contestants from 13 representative teams from each department and wind farm of the branch. This production safety knowledge contest motivated all the employees to further study the production safety knowledge and applied the production safety governance and safety culture innovation into the actual work, which guaranteed the safety and sustainable development of the Company.

Occupational Health

In terms of the occupational health of employees, the Company strictly abided by national laws and regulations such as the Law of the PRC on Prevention and Control of Occupational Diseases and formulated the Occupational Health Monitoring Management Regulations and the Management System of Labor Protective Articles on the aforesaid basis. In 2018, the Company carried out special inspections on occupational health management. Each subsidiary formulated the annual occupational health management plans, raised the fund budget, purchased and provided adequate labor safety appliances and individual protective articles regularly organized normal physical examinations and occupational health examinations for employees, and established the occupational health monitoring records for each employee. Meanwhile, the Company detected occupational hazards on wind farms on a regular basis, posts occupational health and safety marked on the production site, provided detection and protective articles, improved and protected the occupational health and safety of employees, and continuously enhanced the level of the occupational health of employees.

In 2018, under the leadership of Huaneng Group, the Company firmly grasped and solidified the development of "four systems" (namely, production safety responsibility system, institutional system, guarantee system and prevention and control system), continued to maintain stable production safety, successfully fulfilled the annual objectives of production safety, and achieved full-score performance for six consecutive years.

4.2 Motivating Employees' Development

The Company helped employees to grow with clear career development paths and training mechanism, continuously expanded the channels for employees' growth through a series of talent cultivation programs, and formulated employee recruitment measures such as the Ordinary Employee Recruitment of the Headquarters of Huaneng Renewables and the Measures for the Selection and Management of Senior Technicians (trial). The Company established the two-channel promotion mechanism "focusing on the order of posts, supplemented by professional skills", carried out a series of employee training activities such as the induction training and professional knowledge and skill training, guided employees to continuously improve the professional competence, and helped employees to realize their career development.

Employee Training Situation of Huaneng Renewables in 2018

Category of employees		Number of trainees (person)	Average training hours (hour/person)
Number of trained employees by gender	Male employee	1,739	39.91
	Female employee	321	38.37
Number of trained employees by category	Senior employee	105	34.01
	Intermediate employee	281	34.00
	Ordinary employee	1,674	41.22

Mengdong Branch Carried Out Induction Training for New Employees

On 6 August 2018, Mengdong branch initiated the induction training for new employees according to the training program of the superior company, and newly increased courses such as department functions, management process and online study, amounting to 222 class hours. Meanwhile, new employees participated in the military training and quality expansion training for eight days. Diversified induction training activities helped new employees to have a rapid understanding of the corporate culture, and integrate into the new environment.

Mengxi Branch Organized Wind Power and PV Operation Overhaul Skill Competition

Mengxi branch organized the wind power and PV operation overhaul skill competition in May 2018. After intensified competition, 20 contestants from wind and PV power stations entered the finals. The finals mainly checked the specialized theories and knowledge, safe operation in production and technical fault handling in the wind power and PV field. Mengxi branch took advantage of this skill competition to continuously enhance the professional ability of employees, and promote the technical exchange and study between employees.

4.3 Caring Employees' Life

The Company focuses on the mental and physical development of employees. In 2018, the Company conducted various cultural and sports activities, and caring activities for employees, in order to enhance the sense of happiness of employees, help employees strike a balance between work and life, and advocate positive, green and healthy life style.

Guangdong Branch Organized Pottery Making Activity

At the advent of the Women's Day, Guangdong branch organized the pottery experience activity with the theme of "experience the charm of traditional culture". Female employees participating in the experience made various forms of potteries such as vases and cups by giving full play to the imagination and creativity. The activity helped female employees relax themselves and promoted the development of their individual interests and hobbies.

Shaanxi Branch Carried Out Consoling Activity Before Festival

In September 2018, Shaanxi branch carried out consoling activity in Hequan Xindun Project Unit and each wind farm before festival. The branch sent gifts and greetings to those who stayed at their stations during the festival, exchanged experience with frontline employees, and listened to employees' opinions and suggestions, in order to promote the mutual growth of the enterprise and employees.

5. BUILDING A HARMONIOUS COMMUNITY

Following the corporate culture of "harmony, innovation and pursuit for excellence", the Company actively undertakes social responsibilities, participates in the local economic development as the leader in the industry, and extensively carries out public welfare activities such as voluntary service and poverty alleviation. In 2018, the Company invested RMB260,797 in social welfare, and the employees had 421 hours of voluntary service.

5.1 Providing Assistance for Poverty Alleviation

In 2018, the Company established the leading group and office to provide assistance for poverty alleviation, following the spirits of the Decision of the State Council on Achieving Poverty Alleviation and the Working Proposal on Targeted Poverty Alleviation of China Huaneng Group Co., Ltd. The Company formulates the Poverty Alleviation Management Measures of Huaneng Renewables Corporation Limited, which specifies the requirements on the project arrangement, budget formulation, fund usage, organization, implementation, supervision, inspection, assessment and evaluation, and strengthens the standardized management of the poverty alleviation. In 2018, the Company realized the poverty alleviation objectives in a scientific and effective manner in Qinghai, Mengxi, Mengdong, Shanxi and Sichuan by means of education, science and technology, industry and dispatching poverty alleviation leaders.

PV Power Generation Poverty Alleviation Project

According to the industrial characteristics and the working requirements of Inner Mongolia Autonomous Region and the State on the PV poverty alleviation, the Company, carried out two PV poverty alleviation projects Wuchuan County and Urad Front Banner based on its core advantages. The Company helped 1,948 households get rid of the poverty, and successfully achieved the objective of grid-connected power generation prior to 30 June 2018. Through the construction of PV poverty alleviation power stations, each household could stably achieve an annual income of more than RMB3,000.

Overview of Some Targeted Poverty Alleviation Projects of Huaneng Renewables in 2018

Subsidiary	Place of poverty alleviation	Poverty alleviation contents
Shanxi branch	Dadadian Village, Dongmafang Town, Xinzhou City, Shanxi Province	Establish a working team and dispatch poverty alleviation leaders to provide assistance for the Major Secretary stationed in the village in the information update and publicity; Adopt the "one file and one policy for one household" for all the poverty-stricken population, and gradually determine the person in charge of the poverty alleviation; Console the poverty-stricken family with five articles including "one bag of rice and one barrel of oil".
Mengxi branch	Heishatu Village, Erfenzi Town, Hohhot City, Inner Mongolia Autonomous Region	Visit and console 40 poverty-stricken families with "rice, flour and oil"; Provide active assistance in the repair of road damaged by storms in the poverty-stricken villages; Dig wells for villagers to irrigate the farm.
Sichuan branch	Jiutieluogu Town, Zhaojue County, Liangshan Prefecture, Sichuan Province	Dispatch one poverty alleviation leader, taking a temporary post of the Deputy Party Secretary of Jiutieluogu Town; Carry out inspections at home on "one exceeding and six guarantees" of 120 poverty-stricken families; Enhance the comprehensive AIDS prevention and treatment by the township government.
Liaoning branch	Beiqiao Village, Heishanke Town, Huludao City, Liaoning Province; Huabaotun Village, Xintaizi Town, Tieling City, Liaoning Province	Dispatch two leaders to the village subordinate to the provincial-level poverty-stricken county.
Mengdong branch	Horqin Left Wing Middle Banner, Tongliao City, Inner Mongolia Autonomous Region	Dispatch one Major Secretary stationed in the village; Purchase buckwheat seeds for 22 poverty-stricken families, and each household increases their income by RMB3,000 upon harvest.

5.2 Showing Concern for Community Activities

The Company is devoted to the philanthropic activities and diversified voluntary service in the community, in order to continuously enhance its integration into local communities, improve people's welfare, and make contributions to the sustainable development of the community.

Shandong Branch Carried Out Environmental Protection Activities

Shandong branch carried out environmental protection activities in Jinan Weishan Park on 8 March 2018, encouraging employees to participate in the philanthropic environmental protection in the community. Employees picked up the litters in the grove, publicized environmental protection knowledge to tourists, and implemented the green environmental protection concept of Huaneng Renewables with practical actions.

Zhejiang Branch Donated Books on Children's Day

On 22 May 2018, Zhejiang branch carried out "Shuxiang Huaneng" book donation activity in the Central Primary School of Zuoxi Town, Qingyuan County. Meanwhile, its employees publicized the knowledge of safe usage of electricity to primary school students, in order to enhance children's awareness of safe usage of electricity, prevent dangerous accidents in the electricity usage in the mountainous areas, and improve their anti-risk ability.

Corporate Governance Report

The board (the "**Board**") of directors (the "**Directors**") of the Company hereby presents to the shareholders the corporate governance report for the period between 1 January 2018 and 31 December 2018 (the "**Reporting Period**").

CORPORATE GOVERNANCE PRACTICES

The Company has always placed an emphasis on corporate governance and promotion of innovative management of its corporate governance system. The Company is committed to maintaining and promoting stringent corporate governance, and considers it as an indispensable part in creating values for shareholders. The principle of the Company's corporate governance is to promote effective internal control measures and to increase the transparency and accountability of the Board to all shareholders. The Company has complied with Corporate Governance Code (the "**Code**") in Appendix 14 of the Rules Governing the Listing of Securities on the Hong Kong Stock Exchange (the "**Stock Exchange**") (the "**Listing Rules**"). The Company periodically reviews its corporate governance practices to ensure continuous compliance with the Code. During the Reporting Period, the Company strictly complied with the principles and code provisions and some of the recommended best practices as set out in the Code.

Set out below is a summary of how the Company strengthens its corporate governance, improves its operation quality and complies with the Code.

1. BOARD OF DIRECTORS

The Board exercises its powers and functions in accordance with the provisions as set out in the articles of association of the Company (the "**Articles of Association**"). The Articles of Association contains certain requirements regarding the composition and operation of the Board. The Board reports its work at the shareholders' meetings, implements the resolutions passed thereupon and is accountable to shareholders' meetings.

1. Composition of the Board

The Board comprises eleven Directors, including three Executive Directors, four Non-executive Directors and four Independent Non-executive Directors. The biographical details of the Directors as at the date of this report are set out on page 83 to page 87 of this annual report. There are no relationships (including financial, business, family or other material or relevant relationship) among the Board members. Each Director has sound knowledge, experience and expertise relevant to the business operation and development of the Company. All Directors are aware of their joint and several responsibilities to shareholders.

The Company has entered into service contracts with each of the Directors with a term ending on 1 July 2019 from the relevant date of appointment[1].

The information of the Directors during the Reporting Period is as follows[2]:

Name	Position in the Company	Date of Appointment
LIN Gang	Chairman of the Board, Executive Director	28 March 2017
CAO Shiguang	President, Executive Director	28 March 2017
YANG Qing [2]	Executive Director	4 August 2010
WEN Minggang [2]	Executive Director	23 March 2018
WANG Kui	Non-executive Director	12 August 2014
DAI Xinmin	Non-executive Director	28 March 2017
LU Fei [3]	Non-executive Director	28 March 2017
SUN Deqiang [3]	Non-executive Director	28 March 2017
ZHANG Qi [3]	Non-executive Director	21 August 2018
ZHAI Ji [3]	Non-executive Director	21 August 2018
QIN Haiyan	Independent Non-executive Director	6 August 2010
DAI Huizhu	Independent Non-executive Director	6 August 2010
ZHOU Shaopeng	Independent Non-executive Director	6 August 2010
WAN Kam To	Independent Non-executive Director	6 August 2010

Notes:

(1) The terms of Directors' Service Contract stipulate that "the term of office of Party B shall begin on the date when Party B is appointed by the Board as a supplemental director and end on the date of the next general meeting on which Party B is eligible for re-election. If Party B is re-elected, the contract shall continue to be valid".

(2) On 23 March 2018, Ms. YANG Qing resigned as the executive director of the company due to work arrangement. On the same day, the Board of the Company appointed Mr. WEN Minggang as the executive director of the Company. For details please refer to the Company's announcement dated 23 March 2018.

(3) On 21 August 2018, Mr. LU Fei and Mr. SUN Deqiang resigned as the non-executive Director of the Company due to work arrangement. On the same day, the Board of the Company appointed Mr. ZHANG Qi and Mr. ZHAI Ji as the non-executive director of the Company. For details please refer to the Company's announcement dated 21 August 2018. On 12 March 2019, Mr. ZHANG Qi resigned as the non-executive director of the Company due to retirement. For details, please refer to the Company's announcement dated 12 March 2019.

During the Reporting Period, the Board had been in compliance with the requirements of the Listing Rules regarding the appointment of at least three Independent Non-executive Directors with at least one Independent Non-executive Director possessing appropriate professional qualifications, or accounting or related financial management expertise, and no less than one third of the Board was represented by Independent Non-executive Directors. The qualifications of the four Independent Non-executive Directors of the Company are in full compliance with the requirements under Rules 3.10(1) and (2) and Rule 3.10A of the Listing Rules. Moreover, the Company has received annual confirmations from each Independent Non-executive Director of his/her independence in accordance with Rule 3.13 of the Listing Rules. The Company therefore considered that all Independent Non-executive Directors are in compliance with the independence requirements as set out in the Listing Rules.

On the diversity of Board members, the Company fully understands the benefits of diversity of Board members to its development. It has adopted a Board diversity policy and has further enriched the composition of the Board members at the re-election of a new session of the Board. The current composition of the Board members reflects differentiation and diversification in various aspects such as expertise, industry experience, age, gender, qualification and background.

The Board has made conclusion on its performance during the Reporting Period, obtained advice from senior management and considered the advice contained in the report of the Supervisory Committee. The Board believes that it effectively performed its responsibilities and maintained the interests of the Company and its shareholders in the past year.

2. Board Meetings and General Meetings

The Articles of Association set forth detailed responsibilities and procedures of the Board (please refer to the Articles of Association for details). The Board will convene regular meetings to hear business results report of the Company and make prompt decisions. Major business decisions of the Company are subject to discussion and approval by the Board. The Board may convene ad hoc meetings. Each Director should be notified no less than 14 days prior to a regular Board meeting and a reasonable period of time for sufficient communication prior to ad hoc meeting to ensure each Director is duly informed of meeting agenda and will be able to express opinion. Each Independent Non-executive Director should express opinion within their responsibility.

Except for the Board's consideration of matters in relation to connected transactions as stipulated by the Articles of Association, the quorum for a Board meeting is at least half of the total number of the Directors. A Director may attend the Board meeting in person, or appoint another Director in writing as his proxy to attend the Board meeting. The secretary to the Board of the Company is responsible for preparing and keeping minutes of Board meetings and ensuring that such minutes are available for inspection by any Director.

During the Reporting Period, six Board meetings and one general meeting were held by the Company. Details of Directors' attendance of Board meetings and general meeting are as follows:

		Third Sessions of the Board (six meetings)		General Meetings (one meeting)	
Name	**Position in the Company**	**Number of Meetings Attended/ Held**	**Attendance Rate**	**Number of Meetings Attended/ Held**	**Attendance Rate**
LIN Gang	Executive Director, Chairman of the Board	6/6	100%	1/1	100%
CAO Shiguang	Executive Director, President	6/6	100%	1/1	100%
YANG Qing (1)	Executive Director	1/1	100%	0/0	–
WEN Minggang (1)	Executive Director	4/4	100%	1/1	100%
WANG Kui	Non-executive Director	6/6	100% (Attendance by proxy: 2)	1/1	100%
DAI Xinmin	Non-executive Director	6/6	100% (Attendance by proxy: 2)	0/1	0%
LU Fei (2)	Non-executive Director	3/3	100%	0/1	0%
SUN Deqiang (2)	Non-executive Director	3/3	100% (Attendance by proxy: 1)	0/1	0%
ZHANG Qi (2)	Non-executive Director	2/2	100%	0/0	–
ZHAI Ji (2)	Non-executive Director	2/2	100%	0/0	–
QIN Haiyan	Independent Non-executive Director	6/6	100% (Attendance by proxy: 1)	0/1	0%
DAI Huizhu	Independent Non-executive Director	6/6	100% (Attendance by proxy: 1)	0/1	0%
ZHOU Shaopeng	Independent Non-executive Director	6/6	100%	0/1	0%
WAN Kam To	Independent Non-executive Director	6/6	100%	1/1	100%

Notes:

(1) On 23 March 2018, Ms. YANG Qing resigned as the executive Director of the Company due to work arrangement. On the same day, the Board of the Company appointed Mr.WEN Minggang as the executive Director of the Company. Please refer to the announcement dated 23 March 2018 of the Company for relevant details.

(2) On 21 August 2018, Mr. LU Fei and Mr. SUN Deqiang resigned as the non-executive Director of the Company due to work arrangement. On the same day, the Board of the Company appointed Mr. ZHANG Qi and Mr. ZHAI Ji as the non-executive Director of the Company. Please refer to the announcement dated 21 August 2018 of the Company for relevant details. On 12 March 2019, Mr ZHANG Qi resigned as the non-executive director of the Company due to retirement. For details, please refer to the Company's announcement dated 12 March 2019.

The Company believes that all Directors have contributed sufficient time to perform their responsibilities.

3. Powers Exercised by the Board and the Management

The powers and duties of the Board and the management have been clearly defined in the Articles of Association. The Board is responsible for deciding on the Company's business strategies and investment plans and the establishment of the Company's internal management structure, formulating the Company's fundamental management system, deciding on and monitoring the implementation of the Company's risk management system, determining other material business and administrative matters of the Company and monitoring the performance of the management.

The management of the Company is responsible for implementing resolutions approved by the Board and administering the Company's daily operation and affairs.

4. Chairman and President

During the Reporting Period, Mr. LIN Gang was the Chairman of the Board while Mr. CAO Shiguang was the president. The roles of the Chairman of the Board and President (i.e. Chief Executive Officer pursuant to the relevant requirements under the Listing Rules) of the Company are separated and held by different persons to ensure independence of responsibilities and balance of power and authority between them. The Rules of Procedures of Board Meetings approved by the Board clearly defined the division of duties between the Chairman and the President.

Mr. LIN Gang, Chairman of the Board, was primarily responsible for leading the Board in determining the overall development strategies of the Company, ensuring that the Board is functioning effectively in performing its duties, ensuring the formulation of good corporate governance system and practices and ensuring that the Board acts in the best interest of the Company and all of its shareholders. Mr. CAO Shiguang, the President, was primarily responsible for matters related to the Company's daily operation and management, including the implementation of Board resolutions, formulating basic management provisions and making daily operation decisions.

5. Remuneration of the Directors and Senior Management

The remuneration committee makes recommendations in respect of Directors' remuneration according to criteria such as work experience. Directors' remuneration is determined by the Board with reference to recommendations from the remuneration committee, Directors' experience, work performance, position and market condition and is subject to the approval at general meetings.The remuneration packages of senior management are determined by the Board with reference to recommendations from the remuneration committee.

6. Appointment and Re-election of Directors

Pursuant to the Articles of Association, Directors shall be elected at general meetings with a term of office of three years and may be re-elected. The Company has implemented a set of effective procedures for the appointment of new Directors. Nomination of new Directors shall first be considered by the nomination committee whose recommendations will then be put forward to the Board for consideration. All newly nominated Directors are subject to election and approval at general meetings. Any person appointed by the Board to fill a casual vacancy on or as an addition to the Board shall only hold office until the next annual general meeting of the Company, and shall then be eligible for re-election.

7. Continuing Professional Development of Directors

During the Reporting Period, all Directors were provided with necessary orientation training and adequate data in a timely manner to ensure their appropriate understanding of the operations and businesses of the Company and their responsibilities under relevant regulations, ordinances, rules and the Listing Rules.

The Company also keeps all Directors informed of any update of the Listing Rules and any other applicable regulations, provides relevant training to the Directors to ensure their compliance with and enhance their understanding of good corporate governance practices. In addition, the Company provides briefing and other trainings to improve and update the knowledge and skills of the Directors.

Below is the summary of the training received by the Directors for the Reporting Period based on the records provided by the Directors:

Name	Category of Continuing Professional Development
LIN Gang	B
CAO Shiguang	B
YANG Qing	B
WEN Minggang	B
WANG Kui	A, B
DAI Xinmin	A, B
LU Fei	A, B
SUN Deqiang	A, B
ZHANG Qi	A, B
ZHAI Ji	A, B
QIN Haiyan	B
DAI Huizhu	A, B
ZHOU Shaopeng	A, B
WAN Kam To	A, B

Notes:

A: Attending briefing and/or seminar

B: Reading seminar materials and other updated information regarding the latest development of the Listing Rules and other applicable regulations

2. BOARD COMMITTEES

There are three Board committees in the Company, namely the audit committee, remuneration committee and nomination committee.

Audit Committee

During the Reporting Period, the audit committee consists of three Non-executive Directors, namely Mr. ZHOU Shaopeng (Independent Non-executive Director), Mr. WANG Kui (Non-executive Director) and Mr. WAN Kam To (Independent Non-executive Director). Mr. ZHOU Shaopeng currently serves as the chairman of the audit committee.

The primary responsibilities of the audit committee are to review and supervise the risk management, internal control and financial reporting process of the Company and to maintain an appropriate relationship with its external auditors, including, among other things:

- advising the Board in respect of appointment, re-appointment and removal of external auditors, reviewing and approving the compensation of external auditors, supervising the work of external auditors and formulating policies in terms of non-audit services to be provided by external auditors;

- reviewing the Company's annual and interim financial statements, monitoring its financial control, internal control and risk management systems, examining and reviewing its financial and accounting policies and supervising the implementation of such policies;

- examining and reviewing the procedures for the treatment of complaints received by the Company regarding its financial reporting process, risk management, internal control and other violation of laws and regulations; and

- examining and reviewing the Company's continuing connected transactions and ensuring that the terms of such transactions are consistent with those approved by the shareholders of the Company.

The audit committee will meet with the management of the Company from time to time in performing its obligations to review annual results, risk management and internal control systems of the Company and other responsibilities under the Code, so as to review the interim and annual results, interim and annual reports, and other financial, internal control, corporate governance and risk management matters of the Company. The audit committee also proposes recommendations to the Board. The audit committee will meet with external auditors in the absence of the management of the Company (as the case may be) to discuss its independent review of the interim financial report and the annual audit of the consolidated financial statements.

During the Reporting Period, the audit committee held three meetings, the details of which are as follows:

(1) On 23 March 2018, the audit committee of the third session of the Board held its first meeting in 2018 to review and pass the following resolutions: (1) Resolution regarding the Company's 2017 Annual Results Announcement and 2017 Annual Report; (2) Resolution regarding the 2017 Annual Financial Report; (3) Resolution regarding the Company's 2017 Annual Profit Distribution; (4) Resolution regarding the Company's 2017 Annual Internal Control Report; (5) Resolution regarding the Company's 2017 Annual Internal Audit Report and 2018 Annual Audit Plan; (6) Resolution regarding the Appointment and Audit fee of the Auditor of the Company for 2018; (7) Resolution regarding the Company's 2017 Annual Connected Transactions Report; and (8) Resolution regarding the Audit Opinion from KPMG on the Company's 2017 Annual Financial Statements.

(2) On 21 August 2018, the audit committee of the third session of the Board held its second meeting in 2018 to review and pass the following resolutions: (1) Resolution regarding the Company's 2018 Interim Results Announcement and 2018 Interim Report; (2) Resolution regarding the Company's 2018 Interim Financial Report; and (3) Resolution regarding the Review Opinion from KPMG on the Company's 2018 Interim Financial Report.

(3) On 27 December 2018, the audit committee of the third session of the Board held its third meeting in 2018 to review and pass the Resolution regarding the Appointment and Audit fee of the Auditor of the Company for 2019.

All the members of the audit committee have attended the above meetings.

Remuneration Committee

During the Reporting Period, the remuneration committee consists of three Directors, namely Mr. QIN Haiyan (Independent Non-executive Director), Mr. CAO Shiguang (Executive Director) and Ms. DAI Huizhu (Independent Non-executive Director). Mr. QIN Haiyan currently serves as the chairman of the remuneration committee.

The remuneration committee has its rules of procedure, which provide that its primary responsibilities are to formulate the remuneration policies and structures for all Executive Directors, to evaluate the performance of Executive Directors and senior management, to review Directors' service contracts, to determine the compensation of all Directors and senior management and to ensure that neither the Director nor any of his or her associate may determine his or her own compensation, etc.

The remuneration committee will make recommendations to the Board regarding appropriate policies and structures for the compensations of all Directors and senior management. The remuneration committee considers the management's incentive plan with reference to the corporate objective and mission set by the Board as well as the compensation of comparable companies, the time committed and responsibilities undertaken by the management regarding the Company's businesses, and the employment conditions of other companies so as to ensure that the compensation incentive is in line with the interests of the shareholders.

During the Reporting Period, the remuneration committee held one meeting, the details of which are as follows:

On 23 March 2018, the remuneration committee of the third session of the Board held its first meeting in 2018 to consider the remuneration of Directors, supervisors and senior management members of the Company. All members of the remuneration committee attended the meeting.

Nomination Committee

During the Reporting Period, the nomination committee consists of three Directors, namely, Mr. LIN Gang (Executive Director), Mr. ZHOU Shaopeng (Independent Non-executive Director) and Mr. QIN Haiyan (Independent Non-executive Director). Mr. LIN Gang currently serves as the chairman of the nomination committee.

The primary responsibilities of the nomination committee are to identify and recommend to the Board candidates suitable to serve on the Board, to review the evaluation procedure of the performance of the Board, and to formulate and recommend to the Board nomination procedures and standards.

The nomination committee will consider the track record and qualifications of candidates, the Articles of Association and Board diversity in selecting and recommending candidates of directorship.

During the Reporting Period, the nomination committee held two meetings, the details of which are as follows:

(1) On 23 March 2018, the nomination committee of the third session of the Board held its first meeting in 2018 to consider the resolution regarding the election of Mr. WEN Minggang as an addition of the third session of the Board.

(2) On 21 August 2018, the nomination committee of the third session of the Board held its second meeting in 2018 to consider the resolution regarding the election of additional Director of the Company.

All the members of the nomination committee have attended the above meetings.

Board Diversity Policy

The Company fully understands the benefits of diversity of Board members to its development. It has adopted a Board diversity policy and has further enriched the composition of the Board members at the re-election of a new session of the Board. The current composition of the Board members reflects differentiation and diversity in many aspects such as expertise, industry experience, age, gender, qualifications and background. In the future, the Company will continue to explore and perfect the composition of the Board based on its business characteristics, and will formulate policies in relation to diversity for implementation.

3. DIRECTORS' RESPONSIBILITY FOR THE FINANCIAL STATEMENTS

The Directors acknowledged their responsibility for preparing the financial statements of the Company for the year ended 31 December 2018. There are no material uncertainties relating to events or conditions that may cast significant doubt on the Company's ability to continue as a going concern. In addition, appropriate insurance coverage for Directors' liability has been arranged against possible legal proceedings to be taken against the Directors.

4. CORPORATE GOVERNANCE FUNCTIONS

The members of the Board should be jointly responsible for performing corporate governance responsibilities. During the Reporting Period, the Board performed the following duties in accordance with its terms of reference:

- To develop and review the Company's policies and practices on corporate governance and make changes as it deems necessary, and to ensure their effectiveness;

- To review and monitor the training and continuing professional development of Directors and senior management;

- To review and monitor the Company's policies and practices on compliance with legal and regulatory requirements;

- To develop, review and monitor the code of conduct and the compliance manual (if any) applicable to Directors and employees; and

- To review the Company's compliance with the Code and to review the disclosures in the corporate governance report.

5. COMPLIANCE WITH THE CODE FOR SECURITIES TRANSACTIONS

The Company has adopted the Model Code for Securities Transactions by Directors of Listed Issuers (the "**Model Code**") set out in Appendix 10 of the Listing Rules to govern securities transactions by all Directors and supervisors. Having made specific enquiry to all Directors and supervisors of the Company, all Directors and supervisors have confirmed that they strictly complied with the required standard set out in the Model Code during the Reporting Period.

The Board will examine the corporate governance practices and operation of the Company from time to time so as to ensure compliance with relevant requirements under the Listing Rules.

6. RISK MANAGEMENT AND INTERNAL CONTROL

The Company places emphasis on its risk management and internal control. It has established a prudent risk management and internal control systems to protect shareholders' investments and the Company's assets.

The Company formulated several rules and regulations on risk management and internal control, including "Rules of Procedures of Board Meetings" (《董事會議事規則》), "Rules of Procedure of Meetings of the Audit Committee" (《審核委員會議事規則》), "Rules of Procedure of Meetings of the Remuneration Committee" (《薪酬委員會議事規則》), "Rules of Procedure of Meetings of the Nomination Committee" (《提名委員會議事規則》), "Rules of Procedure of Meetings of the Chairman's Office" (《董事長辦公會議事規則》), "Rules of Procedure of Meetings of the General Manager's Office" (《總經理辦公會議議事規則》) "Measures on the Administration of Connected Transactions" (《關連交易管理辦法》), "Measures on the Administration of Information Disclosure" (《信息披露管理辦法》), "Measures on the Administration of Legal Matters" (《法律事務管理辦法》), "Comprehensive Risk Management Measures" (《全面風險管理辦法》), "Measures on the Administration of Fixed Assets" (《固定資產管理辦法》), "Financial and Accounting Reporting System" (《財務會計報告制度》), "Routine Accounting System" (《日常會計核算制度》), and "Capital Management System" (《資金管理制度》), which have been updated in accordance with the prevailing laws and regulations of the PRC and the Listing Rules from time to time. In addition, the Company has also engaged experts to provide compliance training to its employees to enable them to understand the importance of compliance and internal audit practices.

The Company also established various departments to ensure compliance with relevant laws and regulations, including special department responsible for liaising with regulatory authorities to obtain necessary government approvals, permits, licenses and property certificates prior to the commencement of construction; commercial department responsible for organizing bidding processes, procurement of wind power equipment and selection of contractors for project construction; safety department responsible for periodically monitoring the safety conditions of project construction and operation of the subsidiaries of the Company; legal department responsible for the Company's standardized management and legal affairs management; and auditing department which reports their findings directly to the management based on their periodical review of the Company's financial management and the development, construction and operations of wind farms.

During the Reporting Period, the Board assessed and conducted a review on the effectiveness of the risk management and internal control systems of the Company and its subsidiaries and was not aware of any material deficiencies nor any material defaults with respect to financial, operational and compliance controls and risk management. The Board considers that the current risk management and internal control systems of the Company and its subsidiaries are effective and believes that the qualifications and experience of the staff of the Company's accounting and financial reporting functions, its training programs and budget are adequate.

7. AUDITORS AND REMUNERATION

KPMG and KPMG Huazhen LLP were engaged as the international and domestic auditors of the Company respectively for the year ended 31 December 2018.

For the year ended 31 December 2018, the fee for audit services was RMB12.5 million. For the year ended 31 December 2018, the fee for non-audit services amounted to RMB3.5 million. The non-audit services involved the review of the Company's 2018 interim financial report.

The responsibilities of the Company's external auditor, KPMG, regarding its report on the Financial Statements are set out on page 95 to page 97 of this annual report.

8. INVESTOR RELATIONS

The Company attaches great importance to the management of investor relations. It constantly strengthens and improves the investor relations management standards, discloses the information of the Company in a true, accurate, complete and timely manner in strict accordance with regulatory requirements, so as to increase the transparency and visibility of the Company, thereby improving the Company's image in the capital market.

In 2018, the Company has further strengthened its efforts in investor relations management by proactively developing new channels, communicating with investors by different means of communication in a timely manner, enhancing the daily communication with investors in particular. The Company has achieved a comprehensive and efficient exchanges, which helps in establishing a bridge for effective communication between the Company and the capital market.

- **Corporate presentations and roadshow**

  In March and August of 2018, the management of the Company carried out 2017 annual results roadshow and 2018 interim results roadshow respectively, and held two results presentations of analyst/fund manager and one press conference in Hong Kong and then carried out interim results roadshows in Beijing and Shanghai respectively.

- **Investment summits**

  In 2018, the Company attended two domestic and overseas major investment summits. Through one-to-one meetings and group meetings, the Company facilitated target-oriented and in-depth communications with investors and analysts from 30 institutions.

- **Reverse roadshow**

  In 2018, the Company successfully organized a reverse roadshow. A total of 21 analysts and investors from Hong Kong, Shenzhen, Shanghai and other cities was invited to visit and survey our Landscape-Agriculture-PV Power Complementation Project in Zhangwu, Liaoning, Wind-power Project in Daxing and centralised control center for Liaoning region, and attend forums to exchange ideas.

- **Visits by and general enquiries from investors**

  In 2018, the Company arranged nearly one hundred general investor meetings through one-to-one meetings, group meetings and telephone conferences, and facilitated in-depth and effective communication with over 210 institutional investors and analysts.

The Company has established websites in both Chinese and English as the platform for disclosure of the Company's information. The Company publishes its announcements, financial information and other relevant information on the website at www.hnr.com.cn. Shareholders are welcome to make enquiries directly to the Company and the Company will respond to all enquiries in a timely and appropriate manner.

During the Reporting Period, the Company convened one annual general meeting.

According to Article 63 of the Articles of Association, the Board shall convene an extraordinary general meeting within two months where shareholder(s) who individually or jointly holds 10% or more of the Company's issued and outstanding voting shares request(s) in writing for the convening of an extraordinary general meeting.

According to Article 66 of the Articles of Association, when the Company convenes a shareholders' general meeting, shareholder(s) holding 3% or more of the total voting shares of the Company are entitled to propose to the Company in writing ad hoc resolutions, which if within the functions and powers of the shareholders' general meeting, are required to be added to the agenda of the general meeting. The content of such resolutions mentioned shall (1) fall within the business scope of the Company and the functions and powers of the shareholders' general meeting without violating any laws or regulations; (2) contain definite subjects for discussion and specific matters to be resolved; and (3) be submitted or delivered before the Board in writing 10 days prior to the date of the shareholders' general meeting.

Shareholders may send written enquiries or proposals to the Company's principal place of business in Hong Kong at 31st Floor, Tower Two, Times Square, 1 Matheson Street, Causeway Bay, Hong Kong.

9. ARTICLES OF ASSOCIATION

During the Reporting Period, no amendments have been made to the Articles of Association.

10. COMPANY SECRETARY

During the period from 1 January 2018 to 22 October 2018, Ms. SONG Yuhong served as the sole company secretary of the Company. On 22 October 2018, Ms. SONG Yuhong resigned as the company secretary due to work adjustment and Ms. ZHU Tao was appointed as the sole company secretary on the same date. Please refer to the Company's announcement dated 22 October 2018 for details. During the Reporting Period, both Ms. SONG and Ms. ZHU had duly complied with the relevant training requirement under Rule 3.29 of the Listing Rules, satisfying the requirement of 15 hours per year.

Report of the Board of Directors

The Board hereby presents to shareholders the annual report and the audited financial statements for the year ended 31 December 2018.

PRINCIPAL BUSINESS

The Company is principally engaged in wind power and solar power generation. Details of the subsidiaries, associates and a joint venture of the Company are set out in Notes 16, 17 and 18 to the Financial Statements.

SHARE ISSUE AND LISTING

The Company issued an aggregate of 2,646,898,000 H shares (upon partial exercise of over-allotment option) with a nominal value of RMB1.00 each at a price of HK$2.50 per H share by way of initial public offering (the "**IPO**"). Subsequent to that, the listing of shares of the Company on the main board of the Hong Kong Stock Exchange took place in June 2011. 264,688,800 state-owned shares with a nominal value of RMB1.00 each were converted into H shares under international offering on a one-for-one basis and transferred to the National Council for Social Security Fund of the PRC. The total number of shares of the Company after the IPO was 8,446,898,000 shares, including 5,535,311,200 domestic shares and 2,911,586,800 H shares.

On 21 October 2013, the Company completed the placing of an aggregate of 582,317,360 H shares, representing approximately 6.40% of the total number of issued shares (as enlarged by the allotment and issue of the placing shares) and approximately 16.70% of the total number of H shares in issue (as enlarged by the allotment and issue of the placing shares). After the placing, the total number of issued shares of the Company increased from 8,446,898,000 shares to 9,029,215,360 shares. The total number of issued H shares increased from 2,911,586,800 H shares to 3,493,904,160 H shares. As at 31 December 2013, China Huaneng Group, the controlling shareholder of the Company, directly and indirectly held 61.30% of the Company's total issued shares. For further details, please refer to the Company's announcements dated 15 October 2013 and 21 October 2013, respectively. All proceeds has been fully utilized as at 31 December 2017.

On 23 December 2014, the Company completed the placing of an aggregate of 698,780,832 H shares, representing approximately 7.18% of the total number of issued shares (as enlarged by the allotment and issue of the placing shares) and approximately 16.67% of the total number of H shares in issue (as enlarged by the allotment and issue of the placing shares). After the placing, the total number of issued shares of the Company increased from 9,029,215,360 shares to 9,727,996,192 shares. The total number of issued H shares increased from 3,493,904,160 H shares to 4,192,684,992 H shares. As at 31 December 2014, China Huaneng Group, the controlling shareholder of the Company, directly and indirectly held 56.90% of the Company's total issued shares. For further details, please refer to the Company's announcements dated 16 December 2014 and 23 December 2014. The net proceeds from the placing amounted to approximately HK$1,720,613,283 (after deduction of the commissions and estimated expense), which has been fully utilized as at 31 December 2015.

On 18 May 2017, the Company completed the placing of an aggregate of 838,536,000 H shares, representing approximately 7.94% of the total number of issued shares (as enlarged by the allotment and issue of the placing shares) and approximately 16.67% of the total number of H shares in issue (as enlarged by the allotment and issue of the placing shares). After the placing, the total number of issued shares of the Company increased from 9,727,996,192 shares to 10,566,532,192 shares. The total number of issued H shares increased from 4,192,684,992 H shares to 5,031,220,992 H shares. As at 31 December 2017, China Huaneng Group, the controlling shareholder of the Company, directly and indirectly held 52.39% of the Company's total issued shares. For further details, please refer to the Company's announcements dated 11 May 2017 and 18 May 2017, respectively. The net proceeds from the placing amounted to approximately HK$2,166,524,650 (after deduction of the commissions and estimated expense), which has been fully utilized as at 31 December 2017.

SHARE CAPITAL

As at 31 December 2018, the Company had 10,566,532,192 shares in issue with nominal value of RMB1.00 each. The total issued share capital of the Company was RMB10,566,532,192.

RESULTS

The audited results of the Group for the year ended 31 December 2018 are set out in the consolidated statement of comprehensive income on page 98 to page 99. The financial position of the Group as at 31 December 2018 is set out in the consolidated statement of financial position on page 100 to page 101. The consolidated cash flow of Group for the year ended 31 December 2018 is set out in the consolidated cash flow statement on page 104 to page 106.

A discussion and analysis of the Group performance during the year, financial position as at the end of the year and the material factors underlying its results and future development of the Company's business are set out in the section headed "Management Discussion and Analysis" on page 20 to page 27.

RESERVES

Details of the movements in reserves of the Company during the year are set out in Note 29(a) to the Financial Statements. As at 31 December 2018, the aggregate amount of reserves available for distribution to equity shareholders of the Company was RMB6,770,024,000 (2017: RMB4,478,296,000).

PROFIT DISTRIBUTION

The Board recommends the payment of a final dividend of RMB0.044 per ordinary share (tax inclusive) in cash. Subject to the obtaining of shareholders' approval at the 2018 annual general meeting of the Company, final dividends will be distributed on or before 31 August 2019.

In accordance with the Enterprise Income Tax Law of the People's Republic of China and its implementation regulations which came into effect on 1 January 2008, the Company is required to withhold and pay enterprise income tax at the rate of 10% on behalf of the non-resident enterprise shareholders whose names appear on the register of members for H shares of the Company when distributing dividends to them. Any H shares registered not under the name of an individual shareholder, including HKSCC Nominees Limited, other nominees, agents or trustees, or other organizations or groups, shall be deemed as shares held by non-resident enterprise shareholders. Therefore, on this basis, enterprise income tax shall be withheld from dividends payable to such shareholders. If holders of H shares intend to change its shareholder status, please enquire about the relevant procedures with your agents or trustees. The Company will strictly comply with the laws or the requirements of the relevant government authority and withhold and pay enterprise income tax on behalf of the relevant shareholders based on the register of members for H shares of the Company.

For the individual holders of the H shares who are Hong Kong or Macau residents or residents of the countries which had an agreed tax rate of 10% for dividend with China under relevant tax agreement, the Company should withhold and pay individual income tax on behalf of the relevant shareholders at a rate of 10%. Should the individual holders of the H shares are residents of the countries which had an agreed tax rate of less than 10% with China under relevant tax agreement, the Company shall withhold and pay individual income tax on behalf of the relevant shareholders at a rate of 10%. In that case, if the relevant individual holders of the H shares wish to reclaim the extra amount withheld due to the application of 10% tax rate, the Company can apply for the relevant agreed preferential tax treatment pursuant to the Notice of the State Administration of Taxation in relation to the Administrative Measures on Preferential Treatment Entitled by Non-residents under Tax Treaties (Tentative) (Guo Shui Fa [2009] No.124) (《國家稅務總局關於印發〈非居民享受稅收協議待遇管理辦法(試行)〉的通知》(國稅法[2009]124號)). The Company will assist with the tax refund after the approval of the competent tax authority. Should the individual holders of the H shares are residents of the countries which had an agreed tax rate of over 10% but less than 20% with China under the tax agreement, the Company shall withhold and pay the individual income tax at the agreed actual rate in accordance with relevant tax agreement. In the case that the individual holders of the H shares are residents of the countries which had an agreed tax rate of 20% with China under the tax agreement, or which has not entered into any tax agreement with China, or otherwise, the Company shall withhold and pay the individual income tax at a rate of 20%.

PROPERTY, PLANT AND EQUIPMENT

Please refer to Note 13 to the Financial Statements for details of properties, plants and equipments of the Group during the year.

BONDS

During the year, the Company successfully issued super short-term debentures with an aggregate amount of RMB5 billion to meet its operational needs. For other relevant details, please refer to Note 23 to the Financial Statements.

BANK LOANS AND OTHER BORROWINGS

Details of bank loans and other borrowings of the Company as of 31 December 2018 are set out in Note 23 to the Financial Statements.

PURCHASE, SALE OR REDEMPTION OF THE COMPANY'S LISTED SECURITIES

During the period from 1 January 2018 to 31 December 2018, neither the Company nor any of its subsidiaries purchased, sold or redeemed any listed securities of the Company.

PRE-EMPTIVE RIGHTS

According to the Articles of Association and PRC laws, there are no provisions for pre-emptive rights requiring the Company to offer new shares to its existing shareholders in proportion to their shareholdings.

DIRECTORS, SUPERVISORS AND SENIOR MANAGEMENT

The following table sets forth certain information concerning the Directors, supervisors and senior management of the Company during the Reporting Period.

Name	Position in the Company	Date of Appointment
LIN Gang	Chairman of the Board, Executive Director	28 March 2017
CAO Shiguang	President, Executive Director	28 March 2017
YANG Qing (1)	Vice President, Executive Director	4 August 2010
WEN Minggang (1)	Executive Director	23 March 2018
WANG Kui	Non-executive Director	12 August 2014
DAI Xinmin	Non-executive Director	28 March 2017
LU Fei (2)	Non-executive Director	28 March 2017
SUN Deqiang (2)	Non-executive Director	28 March 2017
ZHANG Qi (2)	Non-executive Director	21 August 2018
ZHAI Ji (2)	Non-executive Director	21 August 2018
QIN Haiyan	Independent Non-executive Director	6 August 2010
DAI Huizhu	Independent Non-executive Director	6 August 2010
ZHOU Shaopeng	Independent Non-executive Director	6 August 2010
WAN Kam To	Independent Non-executive Director	6 August 2010
HUANG Jian	Chairman of the Supervisory Committee	1 November 2011
WANG Huanliang	Supervisor	4 August 2010
ZHONG Suzhi	Supervisor	30 November 2017
YAN Shusen	Vice President	August 2011
HE Ji(3)	Vice President	December 2012
DING Kun	Vice President	April 2011
SHI Yan	Vice President	August 2014
AO Hai	Vice President	August 2014
ZHANG Jun	Secretary of the Disciplinary Committee	November 2017
ZHANG Xiaozhao(4)	Vice President	April 2018
SONG Yuhong (5)	Company Secretary	4 August 2010
ZHU Tao (5)	Company Secretary	22 October 2018

Notes:

(1) On 23 March 2018, Ms. YANG Qing resigned as an executive director of the Company due to work adjustment. On the same day, the Board appointed Mr. WEN Minggang as an executive director and chief accountant of the Company.

(2) On 21 August 2018, Mr. LU Fei and Mr. SUN Deqiang resigned as non-executive directors of the Company due to work adjustment. On the same day, the Board appointed Mr. ZHANG Qi and Mr. ZHAI Ji as non-executive directors of the Company. On 12 March 2019, Mr ZHANG Qi resigned as the non-executive director of the Company due to retirement.

(3) In February 2019, Mr. HE Ji resigned as vice president of the Company due to retirement.

(4) In March 2019, Mr. ZHANG Xiaozhao resigned as vice president of the Company due to work adjustment.

(5) On 22 October 2018, Ms. SONG Yuhong resigned as the company secretary due to work adjustment. On the same day, the Board appointed Ms. ZHU Tao as the company secretary.

BIOGRAPHIES OF DIRECTORS, SUPERVISORS AND SENIOR MANAGEMENT

Biographical details of Directors, supervisors and senior management are set out on page 83 to page 92 of this annual report.

SERVICE CONTRACTS OF DIRECTORS AND SUPERVISORS

Each of the Directors and supervisors has entered into service contracts with the Company. None of the Directors or supervisors has entered into a service contract with the Company which is not determinable by the Company within one year without payment of compensation, other than statutory compensation.

REMUNERATION OF DIRECTORS AND SUPERVISORS

Details of the remuneration of the Directors and supervisors of the Company are set out in Note 9 to the Financial Statements.

INTERESTS OF DIRECTORS AND SUPERVISORS IN TRANSACTION, ARRANGEMENT OR CONTRACT OF SIGNIFICANCE

During the financial year ended 31 December 2018, there was no transaction, arrangement or contract of significance in relation to the Company's business in which the Company or its subsidiaries was a party or in which a Director and supervisor or their connected entities had a material interest, either directly or indirectly, subsisting during the financial year ended 31 December 2018.

INTERESTS OF DIRECTORS IN COMPETING BUSINESS

During the year of 2018, save as disclosed below, none of the Directors and their associates had any competing interests in any business which competed or was likely to compete, either directly or indirectly, with the business of the Company:

Name	Position in the Company	Other Interests
WANG Kui	Non-executive Director	Manager of Planning Department of China Huaneng Group Co. Ltd.
DAI Xinmin	Non-executive Director	Manager of Capital Operation & Equity Management Department of China Huaneng Group Co. Ltd.
LU Fei	Non-executive Director	Manager of Budgeting & Comprehensive Planning Department of China Huaneng Group Co. Ltd.
SUN Deqiang	Non-executive Director	Manager of Marketing Department of China Huaneng Group Co. Ltd.
ZHANG Qi	Non-executive Director	Full-time Director or Supervisor of China Huaneng Group Co. Ltd.
ZHAI Ji	Non-executive Director	Full-time Director or Supervisor of China Huaneng Group Co. Ltd.

Note:

(1) On 21 August 2018, Mr. LU Fei, Mr. SUN Deqiang resigned as non-executive Directors of the Company due to work adjustment. On the same day, the Board appointed Mr. ZHANG Qi, Mr. ZHAI Ji as non-executive Directors of the Company. On 12 March 2019, Mr ZHANG Qi resigned as the non-executive director of the Company due to retirement.

INTERESTS AND SHORT POSITIONS OF THE DIRECTORS, SUPERVISORS AND CHIEF EXECUTIVE IN THE SHARES, UNDERLYING SHARES AND DEBENTURES

As at 31 December 2018, none of the Directors, supervisors or chief executive of the Company had any interests or short positions in the shares, underlying shares or debentures of the Company or any of its associated corporations (as defined in Part XV of the Securities and Futures Ordinance of Hong Kong (the "**SFO**")) which would have to be notified to the Company and the Hong Kong Stock Exchange pursuant to Divisions 7 and 8 of the SFO (including interests or short positions which they were taken or deemed to have under such provisions of the SFO), or which have to be recorded under section 352 of the SFO in the register referred to therein, or which were required to be notified to the Company and the Hong Kong Stock Exchange pursuant to the Model Code.

INTEREST AND SHORT POSITIONS OF SUBSTANTIAL SHAREHOLDERS AND OTHER PERSONS IN THE SHARES AND UNDERLYING SHARES

As at 31 December 2018, to the best knowledge of the Directors, the following persons (other than the Directors, chief executives or supervisors of the Company) had interests or short positions in the shares or underlying shares of the Company which would fall to be disclosed by the Company pursuant to Divisions 2 and 3 of Part XV of the SFO as recorded in the register required to be kept by the Company pursuant to section 336 of the SFO:

Name of shareholder	Class of shares	Capacity/Nature of interests	Number of shares held (Shares)	Approximate percentage in the relevant class of shares (%)[2]	Approximate percentage in the total share capital (%)[3]
Controlling shareholder					
China Huaneng Group Co. Ltd. [1]	Domestic shares	Beneficial owner/Interest of controlled corporation	5,535,311,200 (Long position)	100%	52.39%
Other substantial shareholders					
JPMorgan Chase & Co.	H shares	Interest of controlled corporation/Investment manager/Person having a security interest in share/ Approved lending agent	504,686,272 (Long position)	10.03%	4.78%
			3,540,893 (Short position)	0.07%	0.03%
			478,914,701 (Lending pool)	9.51%	4.53%
Citigroup Inc.	H shares	Interest of controlled corporation/Approved lending agent/Person having a security interest in share	455,387,214 (Long position)	9.05%	4.31%
			1,880,000 (Short position)	0.03%	0.02%
			413,268,713 (Lending pool)	8.21%	3.91%
BlackRock, Inc.	H shares	Interest of controlled corporation	306,479,225 (Long position)	6.09%	2.90%
			966,000 (Short position)	0.02%	0.01%
Wellington Management Group LLP	H shares	Investment manager	304,656,717 (Long position)	6.06%	2.88%
T. Rowe Price Associates, Inc. and its Affiliates	H shares	Beneficial owner	251,986,000 (Long position)	5.01%	2.38%

Notes:

(1) China Huaneng Group Co. Ltd. is beneficially interested in 5,258,545,640 domestic shares, representing approximately 49.77% of the total share capital of the Company. Huaneng Capital Services Corporation Ltd. ("**Huaneng Capital**") is interested in 276,765,560 domestic shares, representing approximately 2.62% of the total share capital of the Company. Since Huaneng Capital is owned as to 61.22% by China Huaneng Group Co. Ltd., China Huaneng Group Co. Ltd. is therefore taken to be interested in the domestic shares held by Huaneng Capital, with a total interest of 52.39%. Percentages may not add up to the total due to rounding.

(2) It is calculated on the basis that the Company has issued 5,535,311,200 domestic shares or 5,031,220,992 H shares as at 31 December 2018.

(3) It is calculated on the basis that the Company has issued 10,566,532,192 shares as at 31 December 2018.

DIRECTORS' AND SUPERVISORS' RIGHTS TO ACQUIRE SHARES OR DEBENTURES

Save as otherwise disclosed in this annual report, at no time during the Reporting Period was the Company or any of its subsidiaries a party to any arrangement that would enable the Directors and supervisors to acquire benefits by means of acquisition of shares in, or debentures of, the Company or any other body corporate, and none of the Directors, supervisors or any of their spouses or children under the age of 18 were granted any right to subscribe for the equity or debt securities of the Company or any other body corporate or had exercised any such rights.

SIGNIFICANT EVENTS AFTER THE REPORTING PERIOD

The Company does not have significant event after 31 December 2018.

CONNECTED TRANSACTIONS

1. Non-exempt Continuing Connected Transactions of the Company for the year ended 31 December 2018

The Company has entered into certain non-exempt continuing connected transactions during 2018. The table below sets out the annual caps for 2018 and the actual transaction amounts of such connected transactions:

Connected Transaction	Connected Person	Actual Cap for 2018 *(RMB'000)*	Actual Transaction Amount for 2018 *(RMB'000)*
1. Provision of production services to the Company	Huaneng Group	85,500	40,333
2. Provision of insurance services to the Company	Huaneng Group	110,000	84,527
3. Provision of office buildings leasing and related property services to the Company	Huaneng Group	72,000	59,199
4. Provision of production services to Huaneng Group	Huaneng Group	15,000	1,266
5. Purchase of product and equipment such as power cable and optical cable from Huaneng Group	Huaneng Group	272,000	15,561
6. Provision of deposit services to the Company	China Huaneng Finance Corporation Limited ("**Huaneng Finance**")	2,500,000	2,499,894(1)
7. Provision of financial leasing services to the Company	Huaneng Tiancheng Financial Leasing Corporation Limited ("**Tiancheng Leasing Company**")	850,000 and lease interest of 50,000	187,931(2) and lease interest of 14,494
8. Sale of electricity to Huaneng Group	Huaneng Group	100,000	6,096
9. Transfer accounts receivables to Huaneng Group	Huaneng Group	500,000 and arrangement fee of 98,000	490,052 and arrangement fee of 46,110

Notes:

(1) The actual transaction amount disclosed represents the highest daily deposit balance.

(2) The actual transaction amount disclosed represents the balance as of 31 December 2018.

2. Non-exempt Continuing Connected Transactions of the Company for the years from 2017 to 2019

(1) On 12 August 2016, the Company entered into the Connected Transactions Framework Agreement related to a number of continuing connected transactions with Huaneng Group for a term of three years commencing on 1 January 2017. Pursuant to the Framework Agreement, (i) the Company will procure production services from Huaneng Group and its subsidiaries and associates (the annual caps for the three years ending 31 December 2017, 31 December 2018 and 31 December 2019 are RMB75.00 million, RMB78.50 million and RMB82.00 million, respectively); (ii) the Company will procure insurance services from Huaneng Group and its subsidiaries and associates (the annual caps for the three years ending 31 December 2017, 31 December 2018 and 31 December 2019 are RMB105.00 million, RMB110.00 million and RMB115.00 million, respectively); (iii) the Company will lease office buildings and procure related property services from Huaneng Group and its subsidiaries and associates (the annual caps for the three years ending 31 December 2017, 31 December 2018 and 31 December 2019 are RMB62.00 million, RMB72.00 million and RMB77.00 million, respectively); and (iv) the Company will offer production services to Huaneng Group and its subsidiaries and associates (the annual caps for the three years ending 31 December 2017, 31 December 2018 and 31 December 2019 are RMB1.80 million, RMB2.00 million and RMB2.20 million, respectively).

On 28 March 2017, the Company and Huaneng Group agreed to amend the Connected Transactions Framework Agreement, and entered into the amended Connected Transactions Framework Agreement. The Company and Huaneng Group agreed to add one more category of continuing connected transaction under the Connected Transactions Framework Agreement, i.e. purchase of product and equipment such as power cable and optical cable by the Group from Huaneng Group and its subsidiaries and associates. Pursuant to the amended Framework Agreement, the annual caps for the purchase of product and equipment such as power cable and optical cable by the Company from Huaneng Group and its subsidiaries and associates for the three years ending 31 December 2017, 31 December 2018 and 31 December 2019 are RMB45.00 million, RMB55.00 million and RMB65.00 million, respectively. On 22 August 2017, the Company proposed to revise them to RMB262.00 million, RMB272.00 million and RMB282.00 million respectively. On 23 March 2018, the Company proposed to revise the annual caps for the purchase of production services by the Group from Huaneng Group and its subsidiaries and associates for the two years ending 31 December 2018 and 31 December 2019 to RMB85.50 million and RMB89.00 million respectively, and revise the annual caps for the sale of production services by the Group to Huaneng Group and its subsidiaries and associates for the two years ending 31 December 2018 and 31 December 2019 to RMB15.00 million and RMB18.00 million respectively.

Pursuant to the Connected Transactions Framework Agreement, the pricing terms with respect to the purchase of production services by the Company from Huaneng Group and its subsidiaries and associates will be agreed following arm’s length negotiations between the relevant parties with reference to the prevailing market rates, but in any event at terms and prices no less favourable than those offered to the Company by an independent third party for the same or similar type of services in the PRC.

The pricing terms with respect to the purchase of insurance by the Company from Huaneng Group and its subsidiaries and associates will be agreed following arm’s length negotiations between the relevant parties with reference to the guidelines from time to time promulgated by the China Insurance Regulatory Commission, but in any event at terms and prices no less favourable than those offered to the Company by an independent third party for the same or similar type of insurance services in the PRC.

The pricing terms with respect to the leasing of office buildings and purchase of related property services by the Company from Huaneng Group and its subsidiaries and associates will be agreed following arm's length negotiations between the relevant parties with reference to the prevailing market rates, but in any event at terms and prices no less favourable than those offered to the Company by an independent third party for the same or similar leases of office buildings and related property services in the PRC.

The pricing terms with respect to the sale of production services by the Company to Huaneng Group and its subsidiaries and associates will be agreed following arm's length negotiations between the relevant parties with reference to the prevailing market rates, but in any event at terms and prices no less favourable than those offered to the Company by an independent third party for the same or similar type of services in the PRC.

The pricing terms with respect to the purchase of product and equipment such as power cable and optical cable by the Company from Huaneng Group and its subsidiaries and associates will be agreed following arm's length negotiations between the relevant parties with reference to the prevailing market rates, but in any event at terms and prices no less favourable than those offered to the Group by an independent third party for the same or similar type of products and equipments in the PRC.

As at the date the Company entered into the Connected Transactions Framework Agreement, being 12 August 2016, Huaneng Group held a 56.90% equity interest in the Company, including a 54.06% equity interest directly held by Huaneng Group and a 2.85% equity interest held through Huaneng Capital, a wholly-owned subsidiary of Huaneng Group. As such, Huaneng Group is a connected person of the Company and the transactions between the Company and Huaneng Group constitute continuing connected transactions pursuant to the Listing Rules. For more information on these continuing connected transactions, please refer to the Company's announcements dated 12 August 2016, 28 March 2017, 22 August 2017 and 23 March 2018.

(2) On 12 August 2016, the Company entered into the Deposit and Loan Services Framework Agreement with Huaneng Finance for a term commencing on 1 January 2017 and expiring on 31 December 2019. Pursuant to the new Deposit and Loan Services Framework Agreement, the following transactions will be entered into: (i) placing deposits by the Company with Huaneng Finance; and (ii) provision of loan advancement by Huaneng Finance to the Company.

Pursuant to the Deposit and Loan Services Framework Agreement, the terms and pricing arrangements with respect to the deposit transactions are negotiated on arm's length, and will be fixed within the margin of official deposit interest rates published by the People's Bank of China from time to time. Huaneng Finance shall provide deposit interest on commercial terms that are based on arm's length negotiations and no less favourable than those offered by independent third parties for similar services to the Company in the PRC.

As at the date the Company entered into the Deposit and Loan Services Framework Agreement, being 12 August 2016, Huaneng Group held a 56.90% equity interest in the Company, including a 54.06% equity interest directly held by Huaneng Group and a 2.85% equity interest held through Huaneng Capital, a wholly-owned subsidiary of Huaneng Group. Huaneng Group currently holds a 52.00% equity interest in Huaneng Finance. As such, Huaneng Finance is an associate of Huaneng Group and a connected person of the Company, and the new Deposit and Loan Services Framework Agreement and the transactions contemplated thereunder constitute continuing connected transactions of the Company.

Under the Deposit and Loan Services Framework Agreement, the annual caps for the three years ending 31 December 2017, 31 December 2018 and 31 December 2019 are RMB2.5 billion respectively. For details of the transactions, please refer to the Company's announcement dated 12 August 2016 and the Company's circular dated 14 September 2016.

(3) On 12 August 2016, the Company entered into the Strategic Cooperation Agreement with Tiancheng Leasing Company. The Strategic Cooperation Agreement is effective for a term commencing from 1 January 2017 to 31 December 2019. Pursuant to the Strategic Cooperation Agreement, Tiancheng Leasing Company will provide financial leasing services to the Company and its subsidiaries by way of direct lease, sale-and-leaseback and entrusted lease.

Pursuant to the Strategic Cooperation Agreement, the lease interest will be determined by the parties on a just and fair basis, taking into account the market conditions and referring to the benchmark lending rates for term loans promulgated by the People's Bank of China from time to time, and will be no less favourable than those offered to the Company by domestic independent third parties for provision of similar service. Handling fee, if any, will be charged on terms no less favourable than those offered by independent third parties to the Company and its subsidiaries, by Tiancheng Leasing Company and payable by the Company and its subsidiaries when financial leasing agreement under the Strategic Cooperation Agreement is entered into and at a rate determined by reference to, among others, the rate charged by the other domestic major financial institutions in the PRC in relation to finance leasing of the same or similar types of assets, or if available, the applicable rates published by the People's Bank of China for this kind of services from time to time, and will be set out in the relevant written finance lease(s). The rate of the lease interest will be determined at the inception of each financial leasing agreement under the Strategic Cooperation Agreement. In the event that the People's Bank of China adjusts the annual RMB benchmark lending rate for term loan during the subsistence of the relevant financial leasing agreement, there will be corresponding adjustment(s) to the interest rate. The transaction amount shall be payable in arrears on a quarterly or yearly basis or such other intervals as the parties may agree.

Under the Strategic Cooperation Agreement and the Company's announcement dated 12 August 2016, each of the proposed annual caps of transaction amount (being the balance of daily lease principal) for 2017, 2018 and 2019 is RMB850 million respectively, and the annual cap of lease interest is RMB50 million respectively.

As at the date the Company entered into the Strategic Cooperation Agreement, being 12 August 2016, Huaneng Group held a 56.90% entity interest in the Company, including a 54.06% equity interest held directly by Huaneng Group and a 2.85% equity interest held through Huaneng Capital, a wholly-owned subsidiary of Huaneng Group. Tiancheng Leasing Company has six existing shareholders, all of which are units under Huaneng Group (with the Company holding 5.56%, Huaneng Renewables (Hong Kong) Limited ("**Huaneng Renewables HK**") holding 4.44%, Huaneng Capital holding 39%, China Huaneng Group Hong Kong Limited ("**Hua Neng HK**") holding 21%, Huaneng Power International, Inc. holding 20% and Huaneng Lancang River Hydropower Inc. ("**Huaneng Lancang River**") holding 10%). As such, Tiancheng Leasing Company is a connected person of the Company and the transaction contemplated under the Strategic Cooperation Agreement constitutes a continuing connected transaction of the Company under the Listing Rules.

For details of the transactions, please refer to the Company's announcement dated 12 August 2016.

(4) On 22 October 2018, the Company entered into the 2018 Power Market Sales Connected Transactions Framework Agreement with Huaneng Group, which was effective for a term commencing on 22 October 2018 and expiring on 31 December 2018. Pursuant to the 2018 Power Market Sales Connected Transactions Framework Agreement, the Company shall sell electricity to Huaneng Group and its subsidiaries and associates with an annual cap of RMB100 million for the year ending 31 December 2018.

Pursuant to the 2018 Power Market Sales Connected Transactions Framework Agreement, the pricing terms with respect to the sales of electricity by the Group to Huaneng Group and its subsidiaries and associates were determined by the relevant parties after arm's length negotiations, taking into account the benchmark on-grid tariff of thermal power formulated by local development and reform commissions and the prevailing market rates, but at terms and prices no less favourable than those offered to the Group by an independent third party for the same or similar type of electricity in the PRC.

On the date the Company entered into the 2018 Power Market Sales Connected Transactions Framework Agreement, being 22 October 2018, Huaneng Group and its subsidiary held a 52.39% equity interest of the Company, including a 49.77% equity interest directly held by Huaneng Group and a 2.62% equity interest held through Huaneng Capital, which is owned as to 61.22% by Huaneng Group.

In accordance with the Hong Kong Listing Rules, Huaneng Group (including its subsidiaries and associates) is a connected person of the Company, and the transactions between the Group and Huaneng Group (including its subsidiaries and associates) constitute connected transactions, which shall be subject to disclosure and/or independent shareholders' approval requirements under Chapter 14A of the Hong Kong Listing Rules.

For particulars of the transaction, please refer to the announcement of the Company dated 22 October 2018.

(5) On 10 December 2018, the Company entered into the Accounts Receivable Transfer Agreement with Huaneng Group, for a term commencing on 10 December 2018 and expiring on 31 December 2020.

Pursuant to the Accounts Receivable Transfer Agreement, the Group agreed to transfer accounts receivable to Huaneng Group and Huaneng Group agreed to purchase accounts receivable from the Group.

Pursuant to the Accounts Receivable Transfer Agreement, the consideration of the accounts receivable payable by Huaneng Group to the Group shall be equivalent to the carrying amount of the accounts receivable, and the Group agreed to pay the arrangement fee to Huaneng Group for the initial accounts receivable to be transferred in 2018 annually during the expected term of the trust subject to separate agreements between the parties for the specific payment date and method of payment. The Group will not pay the arrangement fee to Huaneng Group for the accounts receivable to be transferred in 2019 and 2020.

Arrangement fee = fixed arrangement fee + issuance cost, of which:

(1) Fixed arrangement fee = total amount of trust principal × coupon rate of trust × expected duration of trust

(2) Issuance cost comprises of the balance between the preliminary remaining amount of accounts receivable and the issuance amount of ABNs (RMB1.0 million as one subscription unit of investors' subscription amount) and the professional services fee in relation to the issuance

All payments made relating to the transfer of accounts receivable by Huaneng Group will be in cash and in accordance with the payment terms as follows:

(1) The payment of the transfer of first tranche of accounts receivable shall be made by Huaneng Group to the Group at the earlier of:

   (a) 10 working days after the issuance and receiving proceeds of ABNs issued by Huaneng Group; and

   (b) Within 60 days from the effective date of the Accounts Receivable Transfer Agreement.

(2) The payment of the transfer of subsequent accounts receivable shall be made by Huaneng Group to the Group within 10 working days from the date Huaneng Group agrees to purchase the subsequent accounts receivable.

The pricing terms with respect to the sales of accounts receivable by the Group to Huaneng Group and its subsidiaries and associates will be agreed following arm's length negotiations between the relevant parties with reference to the prevailing market conditions, but at terms and prices no less favorable than those offered to the Group by an independent third party for the same or similar type of accounts receivable in the PRC.

On the date the Company entered into the Accounts Receivable Transfer Agreement, being 10 December 2018, Huaneng Group and its subsidiary held a 52.39% equity interest of the Company, including a 49.77% equity interest directly held by Huaneng Group and a 2.62% equity interest held through Huaneng Capital.

In accordance with the Hong Kong Listing Rules, Huaneng Group (including its subsidiaries and associates) is a connected person of the Company, and the transactions between the Group and Huaneng Group (including its subsidiaries and associates) constitute connected transactions, which shall be subject to disclosure and/or independent shareholders' approval requirements under Chapter 14A of the Hong Kong Listing Rules.

For particulars of the transaction, please refer to the announcement of the Company dated 10 December 2018.

3. Non-exempt Connected Transactions of the Company in 2018

On 12 February 2018, the Company and Huaneng Renewables HK entered into the Capital Increase Agreement with the existing shareholders of Tiancheng Leasing, pursuant to which the existing shareholders of Tiancheng Leasing agreed to subscribe by way of cash for the new registered capital of Tiancheng Leasing in accordance with their respective proportion of shareholding in Tiancheng Leasing. Pursuant to the Capital Increase Agreement, the Company shall pay to Tiancheng Leasing an amount of not more than RMB75 million as the consideration of the Capital Increase, which sum will be funded by the Company's internal cash resources. Huaneng Renewables HK shall pay to Tiancheng Leasing an amount of not more than in the equivalent of RMB60 million by US dollars as the consideration of the Capital Increase, which sum will be funded by Huaneng Renewables HK's internal cash resources. Following completion of the Capital Increase, the Company and Huaneng Renewables HK's proportion of shareholding in Tiancheng Leasing shall remain unchanged at 5.56% and 4.44% respectively.

On the date of Capital Increase Agreement (i.e. 12 February 2018), Huaneng Group and its subsidiary holds an approximately 52.39% equity interest of the Company, including an approximately 49.77% direct equity interest held by Huaneng Group and an approximately 2.62% equity interest held through Huaneng Capital. Huaneng Capital is owned as to 61.22% by Huaneng Group and Hua Neng HK is a wholly-owned subsidiary of Huaneng Group; Huaneng Lancang River is owned as to 56% by Huaneng Group, and HPI is directly and indirectly owned as to 43.56% by Huaneng Group. Huaneng Lancang River and HPI are controlled subsidiaries of Huaneng Group. Pursuant to the Hong Kong Listing Rules, Huaneng Group is a connected person of the Company. Huaneng Capital, Hua Neng HK, Huaneng Lancang River, HPI and Tiancheng Leasing involved in the Capital Increase are all associates of the Huaneng Group. Accordingly, the Capital Increase constitutes a connected transaction of the Company.

Please refer to the Company's announcement dated 12 February 2018 for details of aforesaid transaction.

REVIEW OF INDEPENDENT NON–EXECUTIVE DIRECTORS

The independent non-executive Directors of the Company have reviewed each of the abovementioned continuing connected transactions and confirmed that such transactions were:

(1) made in the ordinary and usual course of business of the Group;

(2) on normal commercial terms or better, or, if there are no comparable transactions to determine whether they are on normal commercial terms or better, from the perspective of the Group, on terms of such transactions no less favorable than the terms available to or from an independent third party; and

(3) in accordance with relevant agreements governing the relevant transactions on terms that are fair and reasonable and in the interests of the Shareholders as a whole.

LETTER FROM AUDITORS

Pursuant to rule 14A.56 of the Listing Rules, the Company's auditor was engaged by the Board of the Directors of the Company to report on the Group's continuing connected transactions in accordance with Hong Kong Standard on Assurance Engagements 3000 (Revised) "Assurance Engagements Other Than Audits or Reviews of Historical Financial Information" and with reference to Practice Note 740 "Auditor's Letter on Continuing Connected Transactions under the Listing Rules" issued by the Hong Kong Institute of Certified Public Accountants. Based on the work performed, the auditor of the Company confirmed to the Board of Directors of the Company that the aforesaid continuing connected transactions:

(1) have been approved by the Board of Directors of the Company;

(2) involving the provision of goods and services by the Group were entered into in accordance with the pricing policies of the Group stipulated under the relevant agreements governing such transactions;

(3) have been entered into in accordance with the relevant agreements governing such transactions; and

(4) have not exceeded the relevant annual caps as disclosed in the relevant announcements of the Company.

COMPLIANCE WITH NON-COMPETITION AGREEMENT

The Company entered into the Non-Competition Agreement with Huaneng Group on 6 August 2010, as amended by a supplemental agreement dated 23 November 2010, under which Huaneng Group agreed not to compete with us in our core businesses and granted the Company the option for new business opportunities, the option for acquisitions and the pre-emptive rights. Pursuant to the agreement, the Independent Non-executive Directors are responsible for reviewing and considering whether or not to take up a new business opportunity referred to by Huaneng Group or exercise pre-emptive rights, and such decision will be made by the Independent Non-executive Directors. Also, the Independent Non-executive Directors will perform a periodic review on the retained business (as defined in the Company's prospectus dated 30 May 2011) by Huaneng Group's unlisted subsidiaries and make recommendations to the Board as to whether to exercise the option to acquire any of the retained business by Huaneng Group's unlisted subsidiaries.

During the year, the Independent Non-executive Directors have reviewed the implementation of the Non-Competition Agreement and have confirmed that Huaneng Group had been in full compliance with the agreement and there was no breach by Huaneng Group.

MAJOR CUSTOMERS AND SUPPLIERS

For the year ended 31 December 2018, purchase from the Group's five largest suppliers as defined under the Listing Rules in aggregate accounted for no more than 59.2% of the Group's total purchase of goods and services for the year.

For the year ended 31 December 2018, sales to the Group's five largest customers in aggregate contributed 53.2% of the Group's total sales for the year, among which, sales to the largest customer contributed 12.9% of the Group's total sales for the year.

During the year, so far as the Directors are aware, none of the Directors, associates of the Directors or any shareholders of the Company (who to the knowledge of the Directors owns more than 5% equity interests of the Company's issued share capital) had any interest in the Company's five largest suppliers or five largest customers during the year.

REMUNERATION POLICIES

As at 31 December 2018, the Company had 2,614 full-time employees. Remuneration of employees of the Company will be determined based on the complexity involved with the positions and the responsibilities to be performed by the employees, as well as with reference to work performance. The remuneration of the Directors, supervisors and senior management of the Company includes the following components:

(1) Basic salary and allowance (excluding the allowance of independent Directors)

Basic salary will be determined based on evaluation and factor analysis of a particular position with reference to relevant salaries in the market. The Company and its subsidiaries contribute housing fund and other social insurance for its employees in accordance with relevant regulations. All these account for approximately 35% of the total remuneration.

(2) Bonus

Bonus will be determined based on the performance of the Directors, supervisors and senior management, which accounts for approximately 50% of the total remuneration.

(3) Pension contribution

All Directors, supervisors and senior management are entitled to the pension plan maintained by the Company, including basic pension insurance and enterprise annuity. Pension contribution accounts for approximately 10% of the total remuneration.

The Company will pay an annual service fee of RMB140 thousand (before tax) to each independent Director, and will reimburse reasonable expenses (including travel and office expenses) incurred by independent Directors in connection with their attendance of Board meetings, shareholders' meetings and performance of their responsibilities in accordance with the Company Law and Articles of Association. Save and except for the above, the Company provides no other benefit to the independent Directors.

During the Reporting Period, the Company's senior management positions included President, Vice-President, Chief Accountant and Secretary to the Board, and their remunerations ranged from approximately RMB119,000 to RMB1,074,000 (before tax).

RETIREMENT AND EMPLOYEES BENEFIT SCHEME

Details of the Company's retirement and employees benefit scheme are set out in Note 7(a) to the Financial statements.

DIRECTORS' INTERESTS IN CONTRACT

No Director had a material interest, either directly or indirectly, in any contract of significance to the business of the Company to which the Company, or any of its holding companies, subsidiaries or fellow subsidiaries was a party during the Reporting Period.

MANAGEMENT CONTRACTS

No contract concerning management or administration of the whole or any substantial part of the business of the Group was entered into or subsisted during the Reporting Period.

RELATIONSHIPS WITH KEY STAKEHOLDERS

The Group maintains good relationship with customers, suppliers and other business partners to achieve its long-term goals. Our management have kept good communication, promptly exchanged ideas and shared business up date with them. In 2018, there was no material and significant dispute between our Group and its customers, suppliers and other business partners.

COMPLIANCE WITH THE RELEVANT LAWS AND REGULATIONS

As far as the Board and management are aware, the Group has complied in all material respects with the relevant laws and regulations that have a significant impact on the business and operation of the Group. In 2018, there was no material breach of or non-compliance with the applicable laws and regulations by the Group.

EQUITY-LINKED AGREEMENTS

As at 31 December 2018, the Group has not entered into any equity-linked agreement.

OTHER DISCLOSURES

An analysis of the Company's performance using key financial performance indicators, a discussion on the principal risks and uncertainties faced by the Company and an indication of likely future development in the Company's business are set out in the section headed "Management Discussion and Analysis" in this annual report; discussions on the Company's environmental policies and performance and permitted indemnity provisions provided by the Company to its Directors are included in the sections headed "Social Responsibility Report" and "Corporate Governance Report" respectively in this annual report. These discussions form part of this Directors' Report.

COMPLIANCE WITH THE CORPORATE GOVERNANCE CODE

The Company has always placed an emphasis on corporate governance and promotion of innovative management of its corporate governance system. The Company is committed to maintaining and promoting stringent corporate governance, and considers it as an indispensable part in creating values for shareholders. The principle of the Company's corporate governance is to promote effective risk management and internal control measures and to increase the transparency and accountability of the Board to all shareholders. The Company has complied with the Code in Appendix 14 of the Listing Rules. The Company periodically reviews its corporate governance practices to ensure continuous compliance with the Code. During the Reporting Period, the Company strictly complied with the principles and code provisions and some of the recommended best practices as set out in the Code.

PUBLIC FLOAT

Based on information publicly available to the Company and so far as the Directors are aware, not less than 25% of the issued share capital of the Company was held by the public as at the date of this annual report, which was in compliance with the requirements under the Listing Rules.

MATERIAL LITIGATION

As far as the Directors are aware, no material litigation or claims are pending or threatened against the Company.

AUDIT COMMITTEE

The 2018 annual results and the financial statements for the year ended 31 December 2018 of the Group prepared in accordance with the International Financial Reporting Standards ("**IFRSs**") have been reviewed by the audit committee of the Company.

AUDITOR

KPMG and KPMG Huazhen LLP were engaged as the international and domestic auditors of the Company respectively for the year ended 31 December 2018. KPMG has audited the accompanying financial statements, which were prepared in accordance with the IFRSs. The Company has retained KPMG and KPMG Huazhen LLP (previously "KPMG Huazhen") since the date of its listing. Resolutions to appoint Deloitte Touche Tohmatsu as the Company's international auditor for 2019 and appoint Deloitte Touche Tohmatsu Certified Public Accountants LLP as the Company's domestic auditor for 2019 will be proposed by the Board at the Company's forthcoming 2018 annual general meeting for consideration.

ANNUAL GENERAL MEETING AND CLOSURE OF REGISTER OF MEMBERS

The 2018 annual general meeting of the Company is proposed to be held by the end of June 2019. Details of the resolutions to be considered and approved and the date of the annual general meeting will be set out in the notice of 2018 annual general meeting to be issued by the Company in due course.

By order of the Board
Huaneng Renewables Corporation Limited
LIN Gang
Chairman of the Board

Beijing, the PRC, 18 March 2019

Report of the Supervisory Committee

The Supervisory Committee of the Company currently consists of three members, and at least one member must be employee representative supervisor elected by employees. Except for the employee representative supervisor, other supervisors are elected by shareholders at the general meeting. All supervisors shall have a term of three years, which is renewable upon re-election and re-appointment. The major duties of the Supervisory Committee include, but are not limited to monitoring the financial activities of the Company; supervising the conduct of Directors and senior management officers in carrying out their duties and proposing to remove Director or senior management officer who has violated applicable laws, regulations, Articles of Association or shareholders resolutions; demanding Directors, President and other senior management officers to rectify any action that is prejudicial to the interest of the Company; reviewing and verifying financial reports, operation reports and profit distribution proposals prepared by the Board, and in case of doubt, appointing certified public accountants and practicing auditors to re-examine the financial information of the Company; bringing actions on behalf of the Company against Directors or senior management officers; and exercising other powers and performing other functions and duties conferred by the Articles of Association.

In 2018, all members of the Supervisory Committee of the Company strictly complied with relevant laws and regulations and the Articles of Association and earnestly performed their duties to protect the interest of the shareholders and the benefit of the Company. The relevant implementation procedures were in compliance with relevant laws and regulations and the Articles of Association. Set out below is a summary of the major tasks performed by the Supervisory Committee in the Reporting Period:

MEETINGS CONVENED BY THE SUPERVISORY COMMITTEE

In accordance with applicable laws and regulations, the Articles of Association and the practical needs of the Company's development, the Supervisory Committee convened two meetings and completed the following tasks in 2018:

1. At the fifth meeting of the third session of the Supervisory Committee held on 23 March 2018, the proposals on the work report of the Supervisory Committee for 2017, annual result announcement and annual report of the Company for 2017, annual final financial report for 2017, financial budget report for 2018 and profit distribution plan for 2017 were considered and approved.

2. At the sixth meeting of the third session of the Supervisory Committee held on 21 August 2018, the proposals on the interim results announcement and interim report of the Company for 2018 and the interim financial report of the Company for 2018 were considered and approved.

WORK OF THE SUPERVISORY COMMITTEE

In 2018, the Supervisory Committee mainly carried out the following tasks:

Monitoring Company's Operation

During the Reporting Period, members of the Supervisory Committee participated in discussions of major operating decisions, reviewed proposals submitted to the Board for consideration and examined and monitored the operation of the Company through attending Board meetings and general meetings of shareholders held by the Company. The Supervisory Committee is of the opinion that the business activities of the Company complied with relevant laws and regulations and the Articles of Association. Meanwhile, the Directors and senior management officers of the Company have diligently performed their duties and earnestly implemented the resolutions of the general meetings of the shareholders to safeguard the interests of the shareholders and the benefit of the Company. In the course of examining the operation of the Company and supervising the performance of duties of the Directors and senior management officers, the Supervisory Committee has not found any of their behaviors that contravened any applicable laws and regulations or the Articles of Association or any issues that has caused damage to the interests of the shareholders and the Company.

Examining the Company's Financial Condition

During the Reporting Period, the Supervisory Committee carefully examined and reviewed the relevant financial information and the auditors' reports of the Company. The Supervisory Committee is of the opinion that the preparation of the Company's financial statements complies with the IFRSs and is not aware of any irregularities. Having duly reviewed the 2018 annual financial report and relevant information to be submitted by the Board to the general meeting of shareholders, and as audited by the independent auditors with an unqualified opinion, the Supervisory Committee is of the opinion that such report reflects the financial condition and operating results of the Company on a consistent basis and in an accurate, true and fair manner.

Monitoring the Company's Information Disclosure

During the Reporting Period, the Supervisory Committee reviewed the information disclosure system and all relevant documents that the Company has publicly published and is of the opinion that the Company has disclosed the relevant information in a timely, true, accurate and complete manner in accordance with the requirements of the Hong Kong Stock Exchange and no false information was found.

HUANG Jian
Chairman of the Supervisory Committee

Beijing, the PRC, 18 March 2019

Biographies of Directors, Supervisors & Senior Management

EXECUTIVE DIRECTORS

LIN GANG

LIN Gang, aged 54, is an Executive Director of the Company and Chairman of the Board. Mr. Lin joined the Company in February 2012 and was appointed as an Executive Director of the Company. He was re-elected as an Executive Director of the Company in June 2016. Mr. Lin has served successively as Deputy Chief of Engineering Division of Engineering Department of Huaneng Power International, Inc. ("**HPI**"), Assistant to General Manager and Deputy General Manager of Huaneng Beijing Branch Company (Beijing Thermal Power Plant), Deputy Manager of Comprehensive Planning Department, Deputy Manager (in charge of work) of Marketing and Sales Department of HPI, President of Huaneng Northeast Branch Company (concurrently Director of Heilongjiang Office), Manager of Marketing and Sales Department of HPI, Assistant to President of HPI, Vice President of HPI, and President of Huaneng Renewables Corporation Limited. Mr. Lin graduated from North China Electric Power University, specializing in thermal power, and holds a master degree in science. He also graduated from Guanghua School of Management, Peking University with an EMBA degree. Mr. Lin is a professor-level senior engineer.

CAO SHIGUANG

CAO Shiguang, aged 50, is an Executive Director and the President of the Company. Mr. Cao joined the Company in January 2017 and was appointed as an Executive Director of the Company on 28 March 2017. He has successively served as a Deputy Chief of Comprehensive Division of Comprehensive Planning & Financing Department of State Power Corporation, Chief of Comprehensive Planning Division of Planning & Development Department and Manager of Planning & Development Department of China Huadian Corporation, Vice President of Green Coal Power Company, Deputy Manager and Manager of Budgeting & Comprehensive Planning Department of China Huaneng Group, Deputy Dean and Dean of Huaneng Technical Economics Research Institute. Mr. Cao graduated from Beijing Graduate Faculty of North China Electric Power University, majoring in power system and automation with a master degree in engineering. He also graduated from Harbin Institute of Technology with a doctor degree, majoring in power system and automation. Mr. Cao is a senior engineer.

WEN MINGGANG

WEN Minggang, aged 49, is an Executive Director and Chief Accountant of the Company. Mr. Wen joined the Company in October 2017 and was appointed as an Executive Director of the Company on 23 March 2018. He has served as a senior staff member of the Finance Department of Huaneng International Power Development Corporation, deputy chief of Comprehensive Division of Finance Department of China Huaneng Group, deputy manager of Finance Department of China Huaneng Group Hong Kong Limited, deputy manager of Finance Department of Hua Neng (Hong Kong) International Development Limited, deputy chief (in charge of work) of Accounting Division II of Finance Department, deputy chief (in charge of work) of Comprehensive Division, chief of Financial Division and chief of Accounting Division of China Huaneng Group, chief accountant of Huaneng Coal Business Sector Co., Ltd., deputy manager of Coal Business Department and Coal Chemistry Management Office of China Huaneng Group. Mr. Wen graduated from the Nankai University, majoring in accountancy with a master degree in economics. Mr. Wen is a senior accountant.

NON-EXECUTIVE DIRECTORS

WANG KUI

WANG Kui, aged 52, is a Non-executive Director of the Company and Chief of Planning and Development Department of Huaneng Group. He was appointed as a Non-executive Director of the Company on 12 August 2014. Mr. Wang has served successively as Deputy Chief of Planning Division of Comprehensive Planning Department, Deputy Chief (in charge of department) and Chief of Planning Division of Planning and Development Department of China Huaneng Group, Deputy Head of Preparation Team of the Founding of Xinjiang Energy Development Co., Ltd., Vice President of Huaneng Xinjiang Energy Development Co., Ltd., member of the Standing Committee of the CPC Committee and Vice Governor (assigned to aid Xinjiang) of Kizilsu Kirghiz Autonomous Prefecture, Vice President and President of Huaneng Shanxi Branch. He graduated from Beijing Institute of Economics with a bachelor's degree in quantitative economics. Mr. Wang subsequently received a MBA degree from Guanghua School of Management, Peking University. Mr. Wang is a senior engineer.

DAI XINMIN

DAI Xinmin, aged 57, is a Non-executive Director of the Company and Manager of Capital Operation & Equity Management Department of China Huaneng Group. Mr. Dai joined China Huaneng Group in October 1998. He has successively served as the Deputy Chief of Industry Division of Industry & Transportation Department, Chief of Industry Division of Property Rights Registration & Assets Statistics Department, and Deputy Director General of Property Rights Department of the State owned Assets Supervision and Administration Commission, Deputy Chief Accountant and Deputy Manager of Financial Department of China Huaneng Group, Chief Accountant of Financial Department of Huaneng Comprehensive Industry Corporation (concurrently Manager of Financial Department), Deputy Manager of Assets Operation and Management Department of China Huaneng Group, and Manager of Supervision and Audit Department of Huaneng Power International, Inc.. Mr. Dai graduated from the Industrial Economy Department of Shanghai College of Finance and Economics, majoring in industrial economy with a bachelor's degree in economics. He also obtained the EMBA degree majoring in executive business administration from Peking University. He is a senior economist.

ZHANG QI

ZHANG Qi, aged 60, is a Non-executive Director of the Company and full-time director or supervisor of China Huaneng Group Co., Ltd. Mr. ZHANG joined China Huaneng Group in June 2001. He has served as a general manager of Huaneng Power International, Inc. Nanjing Branch (Power Plant), general manager of Huaneng Dezhou Power Plant, president of China Huaneng Group Shandong Branch, executive director and president of Huaneng Shandong Power Generation Co., Ltd., deputy chief engineer of China Huaneng Group Co., Ltd. Mr. ZHANG graduated from Harbin Institute of Technology, majoring in mechanics with a master degree in engineering. Mr. ZHANG is a professor level senior engineer. On 12 March 2019, Mr ZHANG Qi resigned as the non-executive director of the Company due to retirement.

ZHAI JI

ZHAI Ji, aged 59, a Non-executive Director of the Company and full-time director or supervisor of China Huaneng Group Co., Ltd. Mr. ZHAI joined China Huaneng Group in March 1997. He has served as a vice president of Shanxi Huaneng Yushe Electric Power Co., Ltd., president of Shanxi Huaneng Yushe Electric Power Co., Ltd., vice president of China Huaneng Group Henan Branch, executive director and president of Huaneng Jilin Power Generation Co., Ltd., manager of the Technical Department of Huaneng Power International, Inc. Mr. ZHAI graduated from the School of Continuing Education of Tianjin University with a bachelor degree, majoring in power system and automation. Mr. ZHAI is a professor-level senior engineer.

INDEPENDENT NON-EXECUTIVE DIRECTORS

QIN HAIYAN

QIN Haiyan, aged 49, is an Independent Non-executive Director of the board of directors of the Company, the director of China General Certification Center (北京鑒衡認證中心), the secretary general of the Wind Power Committee of China Renewable Energy Society, the vice-chairman of the IEC System For Certification to Standards Relating to Equipment for Use in Renewable Energy Applications (IECRE), and standing director of China Renewable Energy Society. He is also the deputy head of the Climatic Resources Application Research Committee of China Meteorological Society, Vice-Chairman of the Renewable Energy Committee of China Association of Circular Economy, the member and deputy secretary of the Technical Committee of National Wind Power Machinery Standardization, vice-chairman of the World Wind Energy Association and member of Executive Committee of PV GAP. Mr. Qin was appointed as an Independent Non-executive Director of the Company in August 2010 and was re-appointed as an Independent Non-executive Director of the Company in June 2016. He graduated from Shanghai Jiao Tong University with a bachelor's degree in engineering. He also obtained an MBA degree from Renmin University of China.

DAI HUIZHU

DAI Huizhu, aged 80, is an Independent Non-executive Director of the board of directors of the Company, and the senior consultant, professor and Supervisor of Doctorate Students of Renewable Energy Department of China Electric Power Research Institute. Ms. Dai was appointed as an Independent Nonexecutive Director of the Company in August 2010 and was re-appointed as an Independent Non-executive Director of the Company in June 2016. Ms. Dai held various positions at Northeast Institute of Electric Power Engineering (東北電力學院), including assistant lecturer, lecturer, associate professor, professor, head of Research Section of Electrical Engineering Fundamentals and deputy head of Electric Power Research Institute. She also held various positions at China Electric Power Research Institute, including, among others, head of New Energy Power Generation Laboratory, head of Graduate Department and chief engineer of Rural Electrification Research Department. Ms. Dai has conducted in-depth studies in the renewable energy and directed many research projects. She was the person-in-charge and participated in the drafting of "Research Report on Electric Power System" as part of the Evaluation of Renewable Energies, a project sponsored by the PRC government, World Bank and Global Environment Facility. Ms. Dai has led many award-winning research projects in wind power area. Ms. Dai has also published a number of research papers within and outside China. Ms. Dai graduated from Tsinghua University majored in electrical engineering.

ZHOU SHAOPENG

ZHOU Shaopeng, aged 72, is an Independent Non-executive Director of the board of director of the Company, professor at Chinese Academy of Governance (國家行政學院). Mr. Zhou was appointed as an Independent Non-executive Director of the Company in August 2010 and was re-appointed as an Independent Non-executive Director of the Company in June 2016. Mr. Zhou has served as an assistant researcher, associate researcher, researcher and Supervisor of Doctorate Students of Industrial Economics Institute of Chinese Academy of Social Sciences. Mr. Zhou was the author or coauthor of over 30 academic books and research reports. He has also published over 300 research papers and a book called "Zhou Shaopeng Economic Anthology". Mr. Zhou graduated from Beijing Mechanical Institute majored in Industrial Economics and graduated from Chinese Academy of Social Sciences with a master's degree and a doctor's degree in economics.

WAN KAM TO

WAN Kam To, aged 66, is an Independent Non-executive Director of the board of director of the Company. In addition, he serves as an independent non-executive director at China Resources Land Limited (Hong Kong Stock Exchange: 1109), Fairwood Holdings Limited (Hong Kong Stock Exchange: 0052), KFM Kingdom Holdings Limited (Hong Kong Stock Exchange: 3816), Shanghai Pharmaceuticals Holding Co., Ltd. (Hong Kong Stock Exchange: 2607, Shanghai Stock Exchange: 601607), Kerry Logistics Network Limited (Hong Kong Stock Exchange: 0636), Harbin Bank Co., Ltd. (Hong Kong Stock Exchange: 6138), Target Insurance (Holdings) Limited (Hong Kong Stock Exchange: 6161), A-Living Services Co., Ltd. (Hong Kong Stock Exchange: 3319) and China World Trade Center Company Limited (Shanghai Stock Exchange: 600007) and a fellow of the Hong Kong Institute of Certified Public Accountants and the Association of Chartered Certified Accountants. Mr. Wan was appointed as an Independent Non-executive Director of the Company in August 2010 and was re-appointed as an Independent Non-executive Director of the Company in June 2016. Mr. Wan had served as a partner of PricewaterhouseCoopers, an independent director of Mindray Medical International Limited (New York Stock Exchange: MR) and RDA Microelectronics, Inc. (NASDAQ: RDA) and an independent non-executive director of Real Gold Mining Limited (Hong Kong Stock Exchange: 0246), Greater China Professional Services Limited (Hong Kong Stock Exchange: 8193), Dalian Port (PDA) Company Limited (Hong Kong Stock Exchange: 2880, Shanghai Stock Exchange: 601880) and S. Culture International Holdings Limited (Hong Kong Stock Exchange: 1255). He graduated from Hong Kong Polytechnic University (previously known as Hong Kong Polytechnic) with a Higher Diploma in accountancy.

SUPERVISORS

HUANG JIAN

HUANG Jian, aged 56, is a supervisor of the Company, and a full-time Director of Huaneng Shandong Power Generation Co., Ltd. and HIPDC. Mr. Huang was appointed as a supervisor of the Company in November 2011 and was re-appointed as a supervisor of the Company in June 2016. Mr. Huang held various positions in HIPDC including the deputy chief of the Cost and Pricing Office of the Finance Department, chief of the Pricing General Office of the Finance Department, chief accountant of the Beijing Branch and deputy manager of the Finance Department. He also served as the deputy chief accountant, chief accountant, vice president and secretary to the board of directors of HPI, and deputy chief economist and director of the Budgeting and Comprehensive Planning Department of Huaneng Group, a Non-executive Director of HPI and the Chairman of the Board of Huaneng Hainan Power Ltd., an executive vice Chairman of the board of directors and secretary to the Leading Party Member's Group of Huaneng Capital Services Co., Ltd., chairman of the board of directors of Huaneng Carbon Asset Management Co., Ltd., chairman of the board of directors and secretary to the Leading Party Member's Group of Huaneng Capital Services Co., Ltd., chairman of the board of directors and secretary to the Leading Party Member's Group of Huaneng Carbon Asset Management Co., Ltd. Mr. Huang graduated from the accounting department of the Institute of Fiscal Science of the Ministry of Finance, with a master's degree in economics. He is a senior accountant.

WANG HUANLIANG

WANG Huanliang, aged 60, is a supervisor of the Company. Mr.Wang was appointed as a supervisor of the Company in August 2010 and was re-appointed as a supervisor of the Company in June 2016. Mr. Wang held various positions at the Power Planning and Design Institute of the Ministry of Water Resources and Electrical Power, including, among others, accountant, section chief and deputy chief of the Finance Section, deputy chief and chief of the Operating Finance Section of the Finance Department. He also served as the deputy manager of the Finance Department of Huaneng Group, the Vice Chairman and President of Beihai Xinli Industrial Co., Ltd., head of Beihai Port Management Bureau, Vice President and chief accountant of Huaneng Energy & Communications Holding Co., Ltd., head and deputy chief auditor of the Audit Department of Huaneng Group. Mr. Wang graduated from the Correspondence School of Renmin University of China. He also graduated from the Chinese Academy of Social Sciences with a master's degree in currency and banking. He is a senior accountant.

ZHONG SUZHI

ZHONG Suzhi, aged 53, is the vice chief economist and the manager of the audit department of the Company. Ms. Zhong joined the Company in February 2003. She served successively as a chief officer, a deputy manager, the assistant to the manager of the Finance Department and a deputy manager of the supervision and audit department of China Huaneng International Economic & Trade Company. She also served as a deputy manager of the Finance Department of Huaneng Renewables Environmental Protection Industrial Holding Co., Ltd, a deputy manager (in charge of work) and manager of the Finance Department of Huaneng Renewables Industrial Holding Co., Ltd, and the manager of Finance Department of the Company. Ms. Zhong graduated from Beijing Finance & Trade College majoring in public finance. She obtained a bachelor's degree in economics. She is a senior accountant.

SENIOR MANAGEMENT

CAO Shiguang – Please refer to his biography under the subsection headed "Executive Directors".

WEN Minggang – Please refer to his biography under the subsection headed "Executive Directors".

YAN SHUSEN

YAN Shusen, aged 52, is a Vice President of the Company. Mr. Yan joined the Company in May 2011. Mr. Yan had served successively as deputy director of the Policy Research Office of Peking University, deputy head of the Development and Planning Department and concurrently the director of the Undertakings Development and Planning Office of Peking University, a confirmed chief rank investigation and research fellow and concurrently the vice chief of the Youth Cadre Services Division of Cadre Services Bureau I, chief of the Youth Cadre Services Division of Cadre Services Bureau I, chief of the Personnel Services Division of Cadre Services Bureau I and chief of the Personnel General Division of the Personnel Services Bureau under the Central Committee of Communist Party of China ("**CCCPC**") Organization Department, director of the Office and chief of Division I of the Personnel Services Bureau under the CCCPC Organization Department. Mr. Yan graduated from the politics and administrative management department of Peking University with a doctorate degree, and also held a juris doctor degree. He is an associate research fellow.

HE JI

HE Ji, aged 58, is a Vice President of the Company. Mr. He joined the Company in December 2012. Mr. He had served successively as deputy chief and chief of the Safety Supervision Division of Huaneng Group, chief of the Safety Supervision Division of Safety Supervision and Technology Environmental Protection Department of Huaneng Group, head of Discipline Inspection Commission, Chairman of Labor Union of Huaneng Hebei Corporation, Vice President of Huaneng Hebei Corporation. Mr. He obtained a bachelor's degree in power engineering from Tsinghua University. He is a senior engineer. In February 2019, Mr. HE Ji resigned as vice president of the Company due to retirement.

DING KUN

DING Kun, aged 47, is a Vice President of the Company. Mr. Ding joined the Company in October 1998. Mr. Ding had served successively as deputy general manager and chief engineer of Huaneng Dali Hydropower Co., Ltd., general manager of Jilin Tongyu Wind Power Branch of HIPDC, the person-in-charge of HNEIC Inner Mongolia Branch, the preparatory bureau of Wuchuan Wind Power Project and Wulate Middle Banner Wind Power Project, assistant to president and concurrently manager of Construction and Engineering Department of HNEIC, assistant to president and concurrently manager of Construction and Engineering Department of the Company. Mr. Ding obtained a bachelor's degree in power system automation from Beijing University of Agricultural Engineering and a master's degree in control engineering from Kunming University of Science and Technology. He is a senior engineer.

SHI YAN

SHI Yan, aged 51, is a Vice President and general counsel of the Company. Mr. Shi joined the Company in June 2014 and was appointed as a supervisor of the Company in March 2016. He had served successively as deputy chief of the legal division under the department of general management of Huaneng Group (in charge of work), deputy director of the legal affairs office and the chief of contract and dispute office in the enterprise management and legal affairs department. Mr. Shi graduated from Renmin University of China in commercial law. He also obtained a master degree in law from Peking University. He is a senior economist.

AO HAI

AO Hai, aged 46, is a Vice President of the Company. Mr. Ao joined the Company in October 2006. He had served successively as deputy manager, manager and production safety department manager of Electrical Branch Company of Fuxin Power Plant, engineering manager, assistant to general manager, deputy manager, deputy manager(in charge of work), general manager, manager of science and technology department, manager of safety production department, manager of construction department and assistant to president of Huaneng Fuxin Wind Power Co., Ltd. Mr. Ao obtained a bachelor degree from Harbin Institute of Technology in power system and its automation. He is an Engineer.

ZHANG JUN

ZHANG Jun, aged 51, is the secretary of the disciplinary committee of the Company. Mr. Zhang joined the Company in November 2017. He had served successively as the ad hoc sub captain of the 3rd Maintenance Squadron of the 12th Flight Academy of Air Force* (空軍第十二飛行學院), the ad hoc sub captain of the 2nd Squadron of the 4th Maintenance Group of the 6th Flight Academy of Air Force* (空軍第六飛行學院), acting director and political instructor of the 1st Squadron, director of the cadres unit of the Political Department of the 3rd Training Regiment of the Liberation Army Aviation Bureau under the General Staff Department * (總參陸航局), battalion-level secretary and vice regiment-level secretary in the Organization Division of the Political Department of Army Aviation Academy* (陸軍航空兵學院), deputy chief and chief of the Supervision Division II of the Supervision Department of China Huaneng Group, and secretary of the disciplinary committee and member of the CPC Committee of Huaneng Energy & Communications Holding Co., Ltd. Mr. ZHANG Jun graduated from the People's Liberation Army Forces Airforce Engineering College with a bachelor's degree in Instrument Electricity. He is a senior political engineer.

ZHANG XIAOZHAO

ZHANG Xiaozhao, aged 54, is the Vice President of the Company. Mr. Zhang joined the Company in November 2011. He has served as a Chief of the Designing Department, Assistant to General Manager, and General Manager of Lanzhou Electricity Manufacture Factory of Gansu Electric Power Company, Vice President of Gansu Power Burning Engineering Company, Director of the preparatory bureau of Huaneng Gansu Wind Power Project, President of Huaneng Dingbian New Energy Power Generation Company Limited and Huaneng Jiuquan Wind Power Company Limited, Deputy Director of R&D Center and Manager of Commerce Department of the Company and President of Huaneng Dingbian New Energy Power Generation Company Limited, Manager of Commerce Department and Construction Engineering Department, Assistant to President and Manager of Project Development Department and Deputy Director of R&D Center. Mr. Zhang graduated from North China Electric Power University, specializing in Mechanical Design and Manufacturing, and holds a bachelor degree of Engineering. He also graduated from Lanzhou University, specializing in Business Management, and holds a master degree of Management. He is a senior engineer. In March 2019, Mr. ZHANG Xiaozhao resigned as vice president of the Company due to work adjustment.

ZHU TAO

ZHU Tao, aged 41, is the company secretary, the Assistant to President and the Manager of Capital Markets Department. Ms. Zhu joined the Company in April 2012. She has served successively as the Head of Investor Relations in Capital Markets Department of Huaneng Power International, Inc, Deputy Manager and Manager of Capital Markets Department (the Office of Board of Directors) of Huaneng Renewables Corporation Limited. Ms. Zhu graduated from Changsha University of Science and Technology. She also obtained a master degree in economics from University of International Business and Economics. She is a senior economist.

COMPANY SECRETARY

ZHU Tao – Please refer to her biography under the sub-section headed "Senior Management".

Independent auditor's report to the shareholders of Huaneng Renewables Corporation Limited
(Established in the People's Republic of China with limited liability)

OPINION

We have audited the consolidated financial statements of Huaneng Renewables Corporation Limited (the "**Company**") and its subsidiaries (the "**Group**") set out on pages 98 to 201, which comprise the consolidated statement of financial position as at 31 December 2018, the consolidated statement of comprehensive income, the consolidated statement of changes in equity and the consolidated cash flow statement for the year then ended and notes to the consolidated financial statements, including a summary of significant accounting policies.

In our opinion, the consolidated financial statements give a true and fair view of the consolidated financial position of the Group as at 31 December 2018 and of its consolidated financial performance and its consolidated cash flows for the year then ended in accordance with International Financial Reporting Standards ("**IFRSs**") issued by the International Accounting Standards Board ("**IASB**") and have been properly prepared in compliance with the disclosure requirements of the Hong Kong Companies Ordinance.

BASIS FOR OPINION

We conducted our audit in accordance with Hong Kong Standards on Auditing ("**HKSAs**") issued by the Hong Kong Institute of Certified Public Accountants ("**HKICPA**"). Our responsibilities under those standards are further described in the Auditor's responsibilities for the audit of the consolidated financial statements section of our report. We are independent of the Group in accordance with the HKICPA's Code of Ethics for Professional Accountants (the "**Code**") together with any ethical requirements that are relevant to our audit of the consolidated financial statements in the People's Republic of China, and we have fulfilled our other ethical responsibilities in accordance with these requirements and the Code. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our opinion.

KEY AUDIT MATTERS

Key audit matters are those matters that, in our professional judgement, were of most significance in our audit of the consolidated financial statements of the current period. These matters were addressed in the context of our audit of the consolidated financial statements as a whole, and in forming our opinion thereon, and we do not provide a separate opinion on these matters.

Assessing potential impairment of certain property, plant and equipment

Refer to Note 13 to the consolidated financial statements and the accounting policies in Notes 2 (i) and (l)(iii).

The Key Audit Matter	How the matter was addressed in our audit
Certain of the Group's wind power plants located in areas with a decrease or slow-down in the growth rate of power consumption and curtailment in the purchase of wind power by grid companies recorded operating losses for the year ended 31 December 2018 and certain projects under construction in these areas have been delayed, both of which are considered by management to represent indicators of potential impairment of the related property, plant and equipment. Where indicators of potential impairment of property, plant and equipment were identified management performed impairment assessments of these assets as at 31 December 2018 using value-in-use calculations for each smallest identifiable group of assets that generate independent cash flows ("**cash-generating unit**") by preparing discounted cash flow forecasts for each cash-generating unit. Preparing discounted cash flow forecasts requires management to exercise significant judgement, particularly in relation to estimating future sales volumes, future on-grid tariffs, future capital expenditure, future operating costs and the discount rates applied in estimating the recoverable amounts of each cash-generating unit. We identified assessing potential impairment of certain property, plant and equipment as a key audit matter because the carrying value of property, plant and equipment is material to the consolidated financial statements and because of the significant management judgement and estimation required in assessing potential impairment which could be subject to error or potential management bias.	Our audit procedures to assess the potential impairment of certain property, plant and equipment included the following: • assessing management's identification of cash-generating units ("**CGUs**") and the allocation of assets to each CGU and assessing the methodology adopted by management in its preparation of the discounted cash flow forecasts with reference to our understanding of the Group's business and the requirements of the prevailing accounting standards; • evaluating management's discounted cash flow forecasts for each CGU by comparing the assumptions adopted by management with our understanding of the business and the industry in which the Group operates, in particular, for the assumptions relating to future sales volumes, future on-grid tariffs, future capital expenditure and future operating costs, where we compared the assumptions with the historical information of nearby power plants or feasibility study reports issued by third party professionals and considered the future development plans of the local grid connections; • challenging management's rationale for adopting cash flow projections over a period greater than five years; • engaging our internal valuation specialists to assist us in assessing whether the discount rates applied in the discounted cash flow forecasts were within the ranges adopted by other companies in the same industry; • comparing the actual results for the current year to management's estimates in their discounted cash flow forecasts for the previous year in order to assess the historical accuracy of the management's forecasting process; • performing sensitivity analyses of the discount rates applied and the assumptions for revenue adopted by management in the discounted cash flow forecasts to assess what changes thereto, either individually or collectively, would result in a different conclusion being reached and assessing whether there were any indicators of management bias in the selection of key assumptions.

INFORMATION OTHER THAN THE CONSOLIDATED FINANCIAL STATEMENTS AND AUDITOR'S REPORT THEREON

The directors are responsible for the other information. The other information comprises all the information included in the annual report, other than the consolidated financial statements and our auditor's report thereon.

Our opinion on the consolidated financial statements does not cover the other information and we do not express any form of assurance conclusion thereon.

In connection with our audit of the consolidated financial statements, our responsibility is to read the other information and, in doing so, consider whether the other information is materially inconsistent with the consolidated financial statements or our knowledge obtained in the audit or otherwise appears to be materially misstated.

If, based on the work we have performed, we conclude that there is a material misstatement of this other information, we are required to report that fact. We have nothing to report in this regard.

RESPONSIBILITIES OF THE DIRECTORS FOR THE CONSOLIDATED FINANCIAL STATEMENTS

The directors are responsible for the preparation of the consolidated financial statements that give a true and fair view in accordance with IFRSs issued by the IASB and the disclosure requirements of the Hong Kong Companies Ordinance and for such internal control as the directors determine is necessary to enable the preparation of consolidated financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the consolidated financial statements, the directors are responsible for assessing the Group's ability to continue as a going concern, disclosing, as applicable, matters related to going concern and using the going concern basis of accounting unless the directors either intend to liquidate the Group or to cease operations, or have no realistic alternative but to do so.

The directors are assisted by the Audit Committee in discharging their responsibilities for overseeing the Group's financial reporting process.

AUDITOR'S RESPONSIBILITIES FOR THE AUDIT OF THE CONSOLIDATED FINANCIAL STATEMENTS

Our objectives are to obtain reasonable assurance about whether the consolidated financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes our opinion. This report is made solely to you, as a body, and for no other purpose. We do not assume responsibility towards or accept liability to any other person for the contents of this report.

Reasonable assurance is a high level of assurance, but is not a guarantee that an audit conducted in accordance with HKSAs will always detect a material misstatement when it exists. Misstatements can arise from fraud or error and are considered material if, individually or in the aggregate, they could reasonably be expected to influence the economic decisions of users taken on the basis of these consolidated financial statements.

As part of an audit in accordance with HKSAs, we exercise professional judgement and maintain professional scepticism throughout the audit. We also:

- Identify and assess the risks of material misstatement of the consolidated financial statements, whether due to fraud or error, design and perform audit procedures responsive to those risks, and obtain audit evidence that is sufficient and appropriate to provide a basis for our opinion. The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations or the override of internal control.

- Obtain an understanding of internal control relevant to the audit in order to design audit procedures that are appropriate in the circumstances but not for the purpose of expressing an opinion on the effectiveness of the Group's internal control.

- Evaluate the appropriateness of accounting policies used and the reasonableness of accounting estimates and related disclosures made by the directors.

- Conclude on the appropriateness of the directors' use of the going concern basis of accounting and, based on the audit evidence obtained, whether a material uncertainty exists related to events or conditions that may cast significant doubt on the Group's ability to continue as a going concern. If we conclude that a material uncertainty exists, we are required to draw attention in our auditor's report to the related disclosures in the consolidated financial statements or, if such disclosures are inadequate, to modify our opinion. Our conclusions are based on the audit evidence obtained up to the date of our auditor's report. However, future events or conditions may cause the Group to cease to continue as a going concern.

- Evaluate the overall presentation, structure and content of the consolidated financial statements, including the disclosures, and whether the consolidated financial statements represent the underlying transactions and events in a manner that achieves fair presentation.

- Obtain sufficient appropriate audit evidence regarding the financial information of the entities or business activities within the Group to express an opinion on the consolidated financial statements. We are responsible for the direction, supervision and performance of the group audit. We remain solely responsible for our audit opinion.

We communicate with the Audit Committee regarding, among other matters, the planned scope and timing of the audit and significant audit findings, including any significant deficiencies in internal control that we identify during our audit.

We also provide the Audit Committee with a statement that we have complied with relevant ethical requirements regarding independence and communicate with them all relationships and other matters that may reasonably be thought to bear on our independence and, where applicable, related safeguards.

From the matters communicated with the Audit Committee, we determine those matters that were of most significance in the audit of the consolidated financial statements of the current period and are therefore the key audit matters. We describe these matters in our auditor's report unless law or regulation precludes public disclosure about the matter or when, in extremely rare circumstances, we determine that a matter should not be communicated in our report because the adverse consequences of doing so would reasonably be expected to outweigh the public interest benefits of such communication.

The engagement partner on the audit resulting in this independent auditor's report is Ho Ying Man, Simon.

KPMG
Certified Public Accountants
8th Floor, Prince's Building
10 Chater Road
Central, Hong Kong

18 March 2019

Consolidated Statement of Comprehensive Income

For the year ended 31 December 2018
(Expressed in RMB unless otherwise stated)

	Note	2018 RMB'000	2017 (Note (i)) RMB'000
Revenue	4	**11,650,291**	10,554,355
Other net income	5	**387,748**	468,859
Operating expenses			
Depreciation and amortisation	7(b)	**(3,972,942)**	(3,798,454)
Personnel costs	7(a)	**(651,800)**	(514,005)
Repairs and maintenance		**(265,082)**	(191,260)
Administration expenses		**(272,882)**	(247,567)
Other operating expenses		**(979,676)**	(620,985)
		(6,142,382)	(5,372,271)
Operating profit		**5,895,657**	5,650,943
Finance income		**66,440**	57,283
Finance expenses		**(2,255,704)**	(2,295,563)
Net finance expenses	6	**(2,189,264)**	(2,238,280)
Share of loss of associates and a joint venture		**(11,209)**	(4,998)
Profit before taxation	7	**3,695,184**	3,407,665
Income tax	8	**(566,724)**	(346,343)
Net profit		**3,128,460**	3,061,322

The notes on pages 107 to 201 form part of these financial statements.

Consolidated Statement of Comprehensive Income

For the year ended 31 December 2018
(Expressed in RMB unless otherwise stated)

	Note	2018 RMB'000	2017 (Note (i)) RMB'000
Other comprehensive income for the year, net of tax	*11*		
Items that will not be reclassified to profit or loss:			
Equity investments at fair value through other comprehensive income – net movement in the fair value reserve (non-recycling)		**145,860**	–
Items that may be reclassified subsequently to profit or loss:			
Available-for-sale financial asset: net movement in the fair value reserve (recycling) (Note (ii))		**–**	(15,635)
Exchange difference on translation of financial statements of a subsidiary outside mainland China		**135**	(7,218)
		145,995	(22,853)
Total comprehensive income for the year		**3,274,455**	3,038,469
Net profit attributable to:			
Equity shareholders of the Company		**3,086,394**	3,011,736
Non-controlling interests		**42,066**	49,586
Net profit		**3,128,460**	3,061,322
Total comprehensive income attributable to:			
Equity shareholders of the Company		**3,232,389**	2,988,883
Non-controlling interests		**42,066**	49,586
Total comprehensive income for the year		**3,274,455**	3,038,469
Basic and diluted earnings per share (RMB cents)	*12*	**29.21**	29.38

Notes:

(i) The Group has initially applied IFRS 15 and IFRS 9 at 1 January 2018. Under the transition methods chosen, comparative information is not restated. See note 2 (c).

(ii) This amount arose under the accounting policies applicable prior to 1 January 2018. As part of the opening balance adjustments as at 1 January 2018 the balance of this reserve has been reclassified to fair value reserve (non-recycling) and will not be reclassified to profit or loss in any future periods. See note 2 (c)(i).

The notes on pages 107 to 201 form part of these financial statements.

Consolidated Statement of Financial Position

At 31 December 2018

(Expressed in RMB unless otherwise stated)

	Note	2018 RMB'000	2017 (Note) RMB'000
Non-current assets			
Property, plant and equipment	*13*	**70,811,642**	71,406,134
Lease prepayments	*14*	**269,022**	357,171
Intangible assets	*15*	**588,958**	621,017
Interest in associates	*17*	**135,194**	178,956
Interest in a joint venture	*18*	**66,109**	74,940
Other non-current assets	*19*	**2,216,668**	2,466,692
Deferred tax assets	*26(b)*	**1,647**	1,906
Total non-current assets		**74,089,240**	75,106,816
Current assets			
Inventories		**44,070**	55,324
Trade debtors and bills receivable	*20*	**9,968,186**	7,214,032
Prepayments and other current assets	*21*	**1,069,311**	1,395,520
Tax recoverable	*26(a)*	**18,425**	22,052
Restricted deposits		**67,571**	52,162
Cash at bank and on hand	*22(a)*	**3,414,672**	2,502,663
Total current assets		**14,582,235**	11,241,753
Current liabilities			
Borrowings	*23*	**21,614,339**	20,352,761
Obligations under finance leases	*24*	**471,916**	352,441
Other payables	*25*	**6,816,881**	6,253,042
Tax payable	*26(a)*	**127,829**	127,821
Total current liabilities		**29,030,965**	27,086,065
Net current liabilities		**(14,448,730)**	(15,844,312)
Total assets less current liabilities		**59,640,510**	59,262,504

The notes on pages 107 to 201 form part of these financial statements.

	Note	2018 RMB'000	2017 *(Note)* RMB'000
Non-current liabilities			
Borrowings	*23*	**28,610,898**	29,451,325
Obligations under finance leases	*24*	**730,306**	1,230,898
Deferred income	*27*	**180,900**	198,069
Other non-current liabilities	*28*	**1,886,705**	2,922,039
Deferred tax liabilities	*26(b)*	**18,158**	18,271
Total non-current liabilities		**31,426,967**	33,820,602
NET ASSETS		**28,213,543**	25,441,902
CAPITAL AND RESERVES	*29*		
Share capital		**10,566,532**	10,566,532
Reserves		**16,841,846**	14,035,081
Total equity attributable to equity shareholders of the Company		**27,408,378**	24,601,613
Non-controlling interests		**805,165**	840,289
TOTAL EQUITY		**28,213,543**	25,441,902

Note: The Group has initially applied IFRS 15 and IFRS 9 at 1 January 2018. Under the transition methods chosen, comparative information is not restated. See note 2 (c).

Approved and authorised for issue by the board of directors on 18 March 2019.

Name: Lin Gang
Position: *Chairman*

Name: Wen Minggang
Position: *Director*

The notes on pages 107 to 201 form part of these financial statements.

Consolidated Statement of Changes in Equity

For the year ended 31 December 2018
(Expressed in RMB unless otherwise stated)

		Attributable to equity shareholders of the Company								
	Note	Share capital RMB'000 (Note 29(c))	Capital reserve RMB'000 (Note29(d)(i))	Statutory surplus reserve RMB'000 (Note 29(d)(ii))	Exchange reserve RMB'000 (Note 29(d)(iii))	Fair value reserve (recycling) RMB'000 (Note 29(d)(iv))	Retained earnings RMB'000	Subtotal RMB'000	Non-controlling interests RMB'000	Total equity RMB'000
Balance at 1 January 2017		**9,727,996**	**2,601,478**	**232,438**	**13,870**	**(23,563)**	**7,584,931**	**20,137,150**	**856,813**	**20,993,963**
Changes in equity for 2017:										
Net profit		–	–	–	–	–	3,011,736	3,011,736	49,586	3,061,322
Other comprehensive income		–	–	–	(7,218)	(15,635)	–	(22,853)	–	(22,853)
Total comprehensive income		–	–	–	(7,218)	(15,635)	3,011,736	2,988,883	49,586	3,038,469
Issuance of new shares, netting of issuance expenses	29(c)	838,536	1,070,272	–	–	–	–	1,908,808	–	1,908,808
Transfer to reserve fund		–	–	404,347	–	–	(404,347)	–	–	–
Dividends of subsidiaries to non-controlling interests		–	–	–	–	–	–	–	(66,110)	(66,110)
Dividends to equity shareholders of the Company	29(b)	–	–	–	–	–	(433,228)	(433,228)	–	(433,228)
Balance at 31 December 2017 *(Note)*		**10,566,532**	**3,671,750**	**636,785**	**6,652**	**(39,198)**	**9,759,092**	**24,601,613**	**840,289**	**25,441,902**

The notes on pages 107 to 201 form part of these financial statements.

		Attributable to equity shareholders of the Company									
		Share capital	Capital reserve	Statutory surplus reserve	Exchange reserve	Fair value reserve (recycling)	Fair value reserve (non-recycling)	Retained earnings	Subtotal	Non-controlling interests	Total equity
		RMB'000	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*
	Note	*(Note 29(c))*	*(Note 29(d)(i))*	*(Note 29(d)(ii))*	*(Note 29(d)(iii))*	*(Note 29(d)(iv))*	*(Note 29(d)(v))*				
Balance at 31 December 2017 *(Note)*		10,566,532	3,671,750	636,785	6,652	(39,198)	–	9,759,092	24,601,613	840,289	25,441,902
Impact on initial application of IFRS 9	*2(c)(i)*	–	–	–	–	39,198	(10,461)	–	28,737	–	28,737
Adjusted balance at 1 January 2018		10,566,532	3,671,750	636,785	6,652	–	(10,461)	9,759,092	24,630,350	840,289	25,470,639
Changes in equity for 2018:											
Net profit		–	–	–	–	–	–	3,086,394	3,086,394	42,066	3,128,460
Other comprehensive income		–	–	–	135	–	145,860	–	145,995	–	145,995
Total comprehensive income		–	–	–	135	–	145,860	3,086,394	3,232,389	42,066	3,274,455
Transfer to reserve fund		–	–	305,121	–	–	–	(305,121)	–	–	–
Dividends of subsidiaries to non-controlling interests		–	–	–	–	–	–	–	–	(77,190)	(77,190)
Dividends to equity shareholders of the Company	*29(b)*	–	–	–	–	–	–	(454,361)	(454,361)	–	(454,361)
Balance at 31 December 2018		10,566,532	3,671,750	941,906	6,787	–	135,399	12,086,004	27,408,378	805,165	28,213,543

Note: The Group has initially applied IFRS 15 and IFRS 9 at 1 January 2018. Under the transition methods chosen, comparative information is not restated. See note 2 (c).

The notes on pages 107 to 201 form part of these financial statements.

Consolidated Cash Flow Statement

For the year ended 31 December 2018
(Expressed in RMB unless otherwise stated)

	Note	2018 RMB'000	2017 (Note) RMB'000
Cash flows from operating activities			
Net profit		**3,128,460**	3,061,322
Adjustments for:			
Depreciation	7(b)	**3,921,759**	3,750,694
Amortisation	7(b)	**51,183**	47,760
Amortisation of deferred income		**(15,628)**	(15,627)
Provision for impairment losses on property, plant and equipment	7(b)	**421,516**	62,908
Provision for impairment losses on other non-current assets	7(b)	**–**	141,321
Interest expenses on financial liabilities	6	**2,194,405**	2,175,411
Foreign exchange differences, net	6	**14,346**	118,380
Interest income on financial assets	6	**(38,038)**	(31,822)
Dividend income	6	**(28,402)**	(24,716)
Share of loss of associates and a joint venture		**11,209**	4,998
Net loss/(gain) on disposal of property, plant and equipment and lease prepayments		**579**	(4,324)
Income tax	8	**566,724**	346,343
Others		**2,281**	2,951
Changes in working capital:			
Decrease/(increase) in inventories		**11,254**	(22,609)
Increase in trade debtors and bills receivable		**(3,081,769)**	(2,825,038)
Decrease in prepayments and other current assets		**34,506**	12,278
Increase in other payables		**1,299,492**	1,192,769
Cash generated from operations		**8,493,877**	7,992,999
PRC Corporate Income Tax paid	26(a)	**(577,668)**	(319,345)
PRC Corporate Income Tax refunded	26(a)	**14,725**	7,055
Net cash generated from operating activities		**7,930,934**	7,680,709

The notes on pages 107 to 201 form part of these financial statements.

	2018	2017
		(Note)
	RMB'000	*RMB'000*
Cash flows from investing activities		
Payments for acquisition of property, plant and equipment, lease prepayments and intangible assets	**(4,224,818)**	(5,117,434)
Payment for investment in an associate	**–**	(60,818)
Payments for acquisition of equity investment in a non-listed company	**(135,000)**	–
Proceeds from disposal of property, plant and equipment	**20,841**	–
Proceeds from disposal of lease prepayments	**27,200**	–
Dividends received	**32,080**	24,716
Interest received	**29,390**	33,853
Time deposits	**(34,050)**	904,669
Restricted deposits	**(14,579)**	(17,670)
Others	**82,340**	41,806
Net cash used in investing activities	**(4,216,596)**	(4,190,878)

The notes on pages 107 to 201 form part of these financial statements.

Consolidated Cash Flow Statement

For the year ended 31 December 2018
(Expressed in RMB unless otherwise stated)

	Note	2018 RMB'000	2017 (Note) RMB'000
Cash flows from financing activities			
Net proceeds from issuance of shares	29(c)	–	1,908,808
Proceeds from borrowings	22(b)	**36,383,654**	38,788,524
Repayment of borrowings	22(b)	**(35,960,729)**	(39,945,065)
Dividends of subsidiaries paid to non–controlling interests	22(b)	**(46,674)**	(50,129)
Dividends paid to equity shareholders of the Company	22(b)	**(454,361)**	(433,228)
Interest paid	22(b)	**(2,257,228)**	(2,240,932)
Payment of finance lease obligations	22(b)	**(481,646)**	(561,179)
Others		**(5,184)**	6,243
Net cash used in financing activities		**(2,822,168)**	(2,526,958)
Net increase in cash and cash equivalents		**892,170**	962,873
Cash and cash equivalents at 1 January		**2,502,663**	1,665,389
Effect of foreign exchange rate changes		**(14,211)**	(125,599)
Cash and cash equivalents at 31 December	22(a)	**3,380,622**	2,502,663

Note: The Group has initially applied IFRS 15 and IFRS 9 at 1 January 2018. Under the transition methods chosen, comparative information is not restated. See note 2 (c).

The notes on pages 107 to 201 form part of these financial statements.

1 PRINCIPAL ACTIVITIES AND ORGANISATION

Huaneng Renewables Corporation Limited (the "**Company**") was established in the People's Republic of China (the "**PRC**") on 5 August 2010 as a joint stock company with limited liability. The Company and its subsidiaries (the "**Group**") are mainly engaged in wind power and solar power generation and sale in the PRC.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

(a) Statement of compliance

These financial statements have been prepared in accordance with all applicable International Financial Reporting Standards ("**IFRSs**"), which collective term includes all applicable individual IFRSs, International Accounting Standards ("**IASs**") and interpretations issued by the International Accounting Standards Board ("**IASB**") and the disclosure requirements of the Hong Kong Companies Ordinance. These financial statements also comply with the applicable disclosure provisions of the Rules Governing the Listing of Securities on the Stock Exchange of Hong Kong Limited ("**HKSE**"). Significant accounting policies adopted by the Group are set out below.

The IASB has issued certain new and revised IFRSs that are first effective or available for early adoption for the current accounting period of the Group. Note 2 (c) provides information on any changes in accounting policies resulting from initial application of these developments to the extent that they are relevant to the Group for the current and prior accounting periods reflected in these financial statements.

(b) Basis of preparation of the financial statements

The consolidated financial statements for the year ended 31 December 2018 comprise the Group and the Group's interest in associates and a joint venture.

As at and for the year ended 31 December 2018, a portion of the Group's funding requirements for capital expenditures were partially satisfied by short-term financing. Consequently, as at 31 December 2018, the Group has net current liabilities of approximately RMB14.4 billion. Taking into consideration of the expected operating cash flows of the Group and the undrawn available banking facilities, the Group are expected to refinance certain short-term borrowings and also consider alternative sources of financing, where applicable and when needed. Therefore, the directors of the Company are of the opinion that the Group will be able to meet its liabilities as and when they fall due within the next twelve months and have prepared the consolidated financial statements on a going concern basis.

The measurement basis used in the preparation of the financial statements is the historical cost basis, except that certain equity investments (see note 2 (g)) are stated at their fair value.

The preparation of the financial statements in conformity with IFRSs requires management to make judgements, estimates and assumptions that affect the application of policies and reported amounts of assets, liabilities, income and expenses. The estimates and associated assumptions are based on historical experience and various other factors that are believed to be reasonable under the circumstances, the results of which form the basis of making the judgements about carrying values of assets and liabilities that are not readily apparent from other sources. Actual results may differ from these estimates.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(b) Basis of preparation of the financial statements (continued)

The estimates and underlying assumptions are reviewed on an ongoing basis. Revisions to accounting estimates are recognised in the period in which the estimate is revised if the revision affects only that period, or in the period of the revision and future periods if the revision affects both current and future periods.

Judgements made by management in the application of IFRSs that have significant effect on the financial statements and major sources of estimation uncertainty are discussed in note 3.

(c) Changes in accounting policies

The IASB has issued a number of new IFRSs and amendments to IFRSs that are first effective for the current accounting period of the Group. Of these, the following developments are relevant to the Group's financial statements:

- IFRS 9, *Financial instruments*
- IFRS 15, *Revenue from contracts with customers*
- IFRIC 22, *Foreign currency transactions and advance consideration*

The Group has not applied any new standard or interpretation that is not yet effective for the current accounting period.

(i) IFRS 9, *Financial instruments*

IFRS 9 replaces IAS 39, *Financial instruments: recognition and measurement.* It sets out the requirements for recognising and measuring financial assets, financial liabilities and some contracts to buy or sell non-financial items.

The Group has applied IFRS 9 retrospectively to items that existed at 1 January 2018 in accordance with the transition requirements. The Group has recognised the cumulative effect of initial application as an adjustment to the opening equity at 1 January 2018. Therefore, comparative information continues to be reported under IAS 39.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(c) Changes in accounting policies (continued)

(i) IFRS 9, *Financial instruments* (continued)

The following table summarises the impact of transition to IFRS 9 on reserves at 1 January 2018.

	RMB'000
Fair value reserve (recycling)	
Transferred to fair value reserve (non-recycling) relating to equity investments now measured at fair value through other comprehensive income	39,198
Fair value reserve (non-recycling)	
Transferred from fair value reserve (recycling) relating to equity investments now measured at fair value through other comprehensive income and increase in fair value reserve (non-recycling) at 1 January 2018	(10,461)

Further details of the nature and effect of the changes to previous accounting policies and the transition approach are set out below:

a. Classification of financial assets and financial liabilities

IFRS 9 categories financial assets into three principal classification categories: measured at amortised cost, at fair value through other comprehensive income (FVOCI) and at fair value through profit or loss (FVPL). These supersede IAS 39's categories of held-to-maturity investments, loans and receivables, available-for-sale financial assets and financial assets measured at FVPL. The classification of financial assets under IFRS 9 is based on the business model under which the financial asset is managed and its contractual cash flow characteristics.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(c) Changes in accounting policies (continued)

(i) IFRS 9, *Financial instruments* (continued)

a. *Classification of financial assets and financial liabilities (continued)*

The following table shows the original measurement categories for each class of the Group's financial assets under IAS 39 and reconciles the carrying amounts of those financial assets determined in accordance with IAS 39 to those determined in accordance with IFRS 9.

	IAS 39 carrying amount at 31 December 2017	Reclassification	Remeasurement	IFRS 9 carrying amount at 1 January 2018
	RMB'000	*RMB'000*	*RMB'000*	*RMB'000*
Financial assets measured at FVOCI (non-recycling)				
Equity investments in non-listed companies	–	449,617	28,737	478,354
Investment in equity securities listed in Hong Kong	–	285,221	–	285,221
	–	734,838	28,737	763,575
Financial assets classified as available-for-sale, under IAS 39				
Equity investments in non-listed companies	449,617	(449,617)	–	–
Investment in equity securities listed in Hong Kong	285,221	(285,221)	–	–
	734,838	(734,838)	–	–

With respect to the financial assets classified as "available-for-sale" under IAS 39 including equity investments in non-listed companies and investment in equity securities listed in Hong Kong (see note 19), the Group elected to designate these investments as FVOCI (non-recycling) on 1 January 2018 and has recognised fair value changes in respect of these investments in the fair value reserve (non-recycling) as an adjustment to the opening balance of the Group's equity.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(c) Changes in accounting policies (continued)

(i) IFRS 9, *Financial instruments* (continued)

a. *Classification of financial assets and financial liabilities (continued)*

With respect to the financial assets classified as "loans and receivables" which were measured at amortised cost under IAS 39, the Group has assessed the business model under which the financial assets are managed and its contractual cash flow characteristics, and these financial assets will continue with their respective classification and measurements upon the adoption of IFRS 9, and the carrying amounts of these financial assets as at 1 January 2018 have not been impacted by the initial application of IFRS 9.

For an explanation of how the Group classifies and measures financial assets and recognises related gains and losses under IFRS 9, see respective accounting policy notes in notes 2 (g), (l)(i), (n) and (q).

The measurement categories for all financial liabilities remain the same, except for financial guarantee contracts (see note 2 (l)(ii)). The carrying amounts for all financial liabilities of the Group at 1 January 2018 have not been impacted by the initial application of IFRS 9.

The Group did not designate or de-designate any financial asset or financial liability at FVPL at 1 January 2018.

b. *Credit losses*

IFRS 9 replaces the "incurred loss" model in IAS 39 with the "expected credit loss" ("**ECL**") model. The ECL model requires an ongoing measurement of credit risk associated with a financial asset and therefore recognises ECLs earlier than under the "incurred loss" accounting model in IAS 39.

The Group applies the new ECL model to the following items:

– financial assets measured at amortised cost (including cash and cash equivalents and trade and other receivables); and

– financial guarantee contracts issued (see note 2 (l)(ii)).

For further details on the Group's accounting policy for accounting for credit losses, see notes 2 (l)(i) and (ii).

The Group assessed the ECLs of financial assets measured at amortised cost as at 1 January 2018. There was no significant change to the loss allowance for these financial assets of the Group as at 1 January 2018.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(c) Changes in accounting policies (continued)

(i) IFRS 9, *Financial instruments* (continued)

c. Transition

Changes in accounting policies resulting from the adoption of IFRS 9 have been applied retrospectively, except as described below:

– Information relating to comparative periods has not been restated. Differences in the carrying amounts of financial assets resulting from the adoption of IFRS 9 are recognised in reserves as at 1 January 2018. Accordingly, the information presented for 2017 continues to be reported under IAS 39 and thus may not be comparable with the current period.

– The following assessments have been made on the basis of the facts and circumstances that existed at 1 January 2018 (the date of initial application of IFRS 9 by the Group):

  – the determination of the business model within which a financial asset is held; and

  – the designation of certain investments in equity instruments not held for trading to be classified as at FVOCI (non-recycling).

– If, at the date of initial application, the assessment of whether there has been a significant increase in credit risk since initial recognition would have involved undue cost or effort, a lifetime ECL has been recognised for that financial instrument.

(ii) IFRS 15, Revenue from contracts with customers

IFRS 15 establishes a comprehensive framework for recognising revenue and some costs from contracts with customers. IFRS 15 replaces IAS 18, Revenue, which covered revenue arising from sale of goods and rendering of services, and IAS 11, Construction contracts, which specified the accounting for construction contracts.

IFRS 15 also introduces additional qualitative and quantitative disclosure requirements which aim to enable users of the financial statements to understand the nature, amount, timing and uncertainty of revenue and cash flows arising from contracts with customers.

The Group has elected to use the cumulative effect transition method and there is no material impact of transition to IFRS 15 to the opening balance of the equity at 1 January 2018 in this regard. Therefore, comparative information has not been restated and continues to be reported under IAS 11 and IAS 18. As allowed by IFRS 15, the Group has applied the new requirements only to contracts that were not completed before 1 January 2018.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(c) Changes in accounting policies (continued)

(ii) IFRS 15, Revenue from contracts with customers (continued)

Since more than 99% of the Group's revenue comprised of contracts with customers from sales of electricity, where revenue continues to be recognised upon transmission to the customers. The adoption of IFRS 15 did not have a material impact on the consolidated financial statements.

Further details of the nature and effect of the changes on previous accounting policies are set out below:

a. *Timing of revenue recognition*

Previously, revenue from sale of goods was generally recognised at a point in time when the risks and rewards of ownership of the goods had passed to the customers, whereas, revenue arising from construction contracts and provision of services was recognised over time.

Under IFRS 15, revenue is recognised when the customer obtains control of the promised good or service in the contract. This may be at a single point in time or over time. IFRS 15 identifies the following three situations in which control of the promised good or service is regarded as being transferred over time:

A. When the customer simultaneously receives and consumes the benefits provided by the entity's performance, as the entity performs;

B. When the entity's performance creates or enhances an asset (for example work in progress) that the customer controls as the asset is created or enhanced;

C. When the entity's performance does not create an asset with an alternative use to the entity and the entity has an enforceable right to payment for performance completed to date.

If the contract terms and the entity's activities do not fall into any of these 3 situations, then under IFRS 15 the entity recognises revenue for the sale of that good or service at a single point in time, being when control has passed. Transfer of risks and rewards of ownership is only one of the indicators that is considered in determining when the transfer of control occurs.

Since more than 99% of the Group's revenue comprised of contracts with customers from sales of electricity, where revenue continues to be recognised upon transmission to the customers (see note 2 (u)), the adoption of IFRS 15 did not have a significant impact on timing of revenue recognition.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(c) Changes in accounting policies (continued)

(ii) IFRS 15, Revenue from contracts with customers (continued)

b. Presentation of contract assets and liabilities

Under IFRS 15, a receivable is recognised only if the Group has an unconditional right to consideration. If the Group recognises the related revenue before being unconditionally entitled to the consideration for the promised goods and services in the contract, then the entitlement to consideration is classified as a contract asset. Similarly, a contract liability, rather than a payable, is recognised when a customer pays consideration, or is contractually required to pay consideration and the amount is already due, before the Group recognises the related revenue. For a single contract with the customer, either a net contract asset or a net contract liability is presented. For multiple contracts, contract assets and contract liabilities of unrelated contracts are not presented on a net basis.

The adoption of IFRS 15 does not have a significant impact on the presentation of the consolidated financial statements.

(iii) IFRIC 22, Foreign currency transactions and advance consideration

This interpretation provides guidance on determining "the date of the transaction" for the purpose of determining the exchange rate to use on initial recognition of the related asset, expense or income (or part of it) arising from a transaction in which an entity receives or pays advance consideration in a foreign currency.

The Interpretation clarifies that "the date of the transaction" is the date on initial recognition of the non-monetary asset or liability arising from the payment or receipt of advance consideration. If there are multiple payments or receipts in advance of recognising the related item, the date of the transaction for each payment or receipt should be determined in this way. The adoption of IFRIC 22 does not have any material impact on the financial position and the financial result of the Group.

(d) Functional and presentation currency

The financial statements are presented in Renminbi ("**RMB**") which is the Group's presentation currency and the functional currency of the Company and its PRC subsidiaries. All amounts have been rounded to the nearest thousand, unless otherwise indicated.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(e) Subsidiaries and non-controlling interests

Subsidiaries are entities controlled by the Group. The Group controls an entity when it is exposed, or has rights, to variable returns from its involvement with the entity and has the ability to affect those returns through its power over the entity. When assessing whether the Group has power, only substantive rights (held by the Group and other parties) are considered.

An investment in a subsidiary is consolidated into the consolidated financial statements from the date that control commences until the date that control ceases. Intra-group balances, transactions and cash flows and any unrealised profits arising from intra-group transactions are eliminated in full in preparing the consolidated financial statements. Unrealised losses resulting from intra-group transactions are eliminated in the same way as unrealised gains but only to the extent that there is no evidence of impairment.

Non-controlling interests represent the equity in a subsidiary not attributable directly or indirectly to the Company, and in respect of which the Group has not agreed any additional terms with the holders of those interests which would result in the Group as a whole having a contractual obligation in respect of those interests that meets the definition of a financial liability. For each business combination, the Group can elect to measure any non-controlling interests either at fair value or at the non-controlling interests' proportionate share of the subsidiary's net identifiable assets.

Non-controlling interests are presented in the consolidated statement of financial position within equity, separately from equity attributable to the equity shareholders of the Company. Non-controlling interests in the results of the Group are presented on the face of the consolidated statement of comprehensive income as an allocation of the total profit or loss and total comprehensive income for the year between non-controlling interests and the equity shareholders of the Company. Loans from holders of non-controlling interests and other contractual obligations towards these holders are presented as financial liabilities in the consolidated statement of finance position in accordance with notes 2 (o) or (p) depending on the nature of the liability.

Changes in the Group's interests in a subsidiary that do not result in a loss of control are accounted for as equity transactions, whereby adjustments are made to the amounts of controlling and non-controlling interests within consolidated equity to reflect the change in relative interests, but no adjustments are made to goodwill and no gain or loss is recognised.

When the Group loses control of a subsidiary, it is accounted for as a disposal of the entire interest in that subsidiary, with a resulting gain or loss being recognised in profit or loss. Any interest retained in that former subsidiary at the date when control is lost is recognised at fair value and this amount is regarded as the fair value on initial recognition of a financial asset (see note 2 (g)) or, when appropriate, the cost on initial recognition of an investment in an associate or joint venture (see note 2 (f)).

In the Company's statement of financial position, an investment in a subsidiary is stated at cost less impairment losses (see note 2 (l)(iii)), unless the investment is classified as held for sale (or included in a disposal group that is classified as held for sale).

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(f) Associates and joint ventures

An associate is an entity in which the Group or the Company has significant influence, but not control or joint control, over its management, including participation in the financial and operating policy decisions.

A joint venture is an arrangement whereby the Group or the Company and other parties contractually agree to share control of the arrangement, and have rights to the net assets of the arrangement.

An investment in an associate or a joint venture is accounted for in the consolidated financial statements under the equity method, unless it is classified as held for sale (or included in a disposal group that is classified as held for sale). Under the equity method, the investment is initially recorded at cost, adjusted for any excess of the Group's share of the acquisition-date fair values of the investee's identifiable net assets over the cost of the investment (if any). Thereafter, the investment is adjusted for the post acquisition change in the Group's share of the investee's net assets and any impairment loss relating to the investment (see note 2 (l)(iii)). Any acquisition-date excess over cost, the Group's share of the post-acquisition, post-tax results of the investees and any impairment losses for the year are recognised in profit or loss whereas the Group's share of the post-acquisition post-tax items of the investees' other comprehensive income is recognised in other comprehensive income.

When the Group's share of losses exceeds its interest in the associate or the joint venture, the Group's interest is reduced to nil and recognition of further losses is discontinued except to the extent that the Group has incurred legal or constructive obligations or made payments on behalf of the investee. For this purpose, the Group's interest is the carrying amount of the investment under the equity method together with the Group's long-term interests that in substance form part of the Group's net investment in the associate or the joint venture.

Unrealised profits and losses resulting from transactions between the Group and its associates and joint ventures are eliminated to the extent of the Group's interest in the investee, except where unrealised losses provide evidence of an impairment of the asset transferred, in which case they are recognised immediately in profit or loss.

If an investment in an associate becomes an investment in a joint venture or vice versa, retained interest is not remeasured. Instead, the investment continues to be accounted for under the equity method.

In all other cases, when the Group ceases to have significant influence over an associate or joint control over a joint venture, it is accounted for as a disposal of the entire interest in that investee, with a resulting gain or loss being recognised in profit or loss. Any interest retained in that former investee at the date when significant influence or joint control is lost is recognised at fair value and this amount is regarded as the fair value on initial recognition of a financial asset (see note 2 (g)).

In the Company's statement of financial position, investments in associates and joint ventures are stated at cost less impairment losses (see note 2 (l)(iii)), unless classified as held for sale (or included in a disposal group that is classified as held for sale).

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(g) Other investments in debt and equity securities

The Group's policies for investments in debt and equity securities, other than investments in subsidiaries, associates and joint ventures, are as follows:

Investments in debt and equity securities are recognised/derecognised on the date the Group commits to purchase/sell the investment. The investments are initially stated at fair value plus directly attributable transaction costs, except for those investments measured at fair value through profit or loss (FVPL) for which transaction costs are recognised directly in profit or loss. For an explanation of how the group determines fair value of financial instruments, see note 30 (e). These investments are subsequently accounted for as follows, depending on their classification.

(A) Policy applicable from 1 January 2018

Investments other than equity investments

Non-equity investments held by the Group are classified into one of the following measurement categories:

– amortised cost, if the investment is held for the collection of contractual cash flows which represent solely payments of principal and interest. Interest income from the investment is calculated using the effective interest method (see note 2 (u)(iv)).

– fair value through other comprehensive income (FVOCI) – recycling, if the contractual cash flows of the investment comprise solely payments of principal and interest and the investment is held within a business model whose objective is achieved by both the collection of contractual cash flows and sale. Changes in fair value are recognised in other comprehensive income, except for the recognition in profit or loss of expected credit losses, interest income (calculated using the effective interest method) and foreign exchange gains and losses. When the investment is derecognised, the amount accumulated in other comprehensive income is recycled from equity to profit or loss.

– fair value at profit or loss (FVPL), if the investment does not meet the criteria for being measured at amortised cost or FVOCI (recycling). Changes in the fair value of the investment (including interest) are recognised in profit or loss.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(g) Other investments in debt and equity securities (continued)

(A) Policy applicable from 1 January 2018 (continued)

Equity investments

An investment in equity securities is classified as FVPL unless the equity investment is not held for trading purposes and on initial recognition of the investment the Group makes an irrevocable election to designate the investment at FVOCI (non-recycling) such that subsequent changes in fair value are recognised in other comprehensive income. Such elections are made on an instrument-by-instrument basis, but may only be made if the investment meets the definition of equity from the issuer's perspective. Where such an election is made, the amount accumulated in other comprehensive income remains in the fair value reserve (non-recycling) until the investment is disposed of. At the time of disposal, the amount accumulated in the fair value reserve (non-recycling) is transferred to retained earnings. It is not recycled through profit or loss. Dividends from an investment in equity securities, irrespective of whether classified as at FVPL or FVOCI, are recognised in profit or loss as finance income in accordance with the policy set out in note 2 (u)(iii).

(B) Policy applicable prior to 1 January 2018

Investments in securities held for trading were classified as financial assets measured at FVPL. Any attributable transaction costs were recognised in profit or loss as incurred. At the end of each reporting period the fair value was remeasured, with any resultant gain or loss being recognised in profit or loss.

Dated debt securities that the Group had the positive ability and intention to hold to maturity were classified as held-to-maturity securities. Held-to-maturity securities were stated at amortised cost (for impairment see note 2 (l)(i) – policy applicable prior to 1 January 2018).

Investments which did not fall into any of the above categories were classified as available-for-sale financial assets. At the end of each reporting period the fair value was remeasured, with any resultant gain or loss being recognised in other comprehensive income and accumulated separately in equity in the fair value reserve (recycling). Dividend income from equity investments and interest income from debt securities calculated using the effective interest method were recognised in profit or loss in accordance with the policies set out in notes 2 (u)(iii) and 2 (u)(iv), respectively. Foreign exchange gains and losses arising from debt securities were also recognised in profit or loss. When the investments were derecognised or impaired (see note 2 (l)(i) – policy applicable prior to 1 January 2018), the cumulative gain or loss recognised in equity was reclassified to profit or loss.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(h) Business combinations under common control

Business combinations arising from transfer of interests in entities that are under the control of the equity shareholders that controls the Group are accounted for as if the acquisition had occurred at the beginning of the years or, if later, at the date that common control was established. The assets and liabilities acquired are recognised at the carrying amounts recognised previously in the Group's equity shareholders' consolidated financial statements.

Upon transfer of interest in an entity to another entity that are under the control of the equity owner that controls the Group, any difference between the Group's interest in the carrying value of the assets and liabilities and the cost of transfer of interest in the entity is recognised directly in equity.

(i) Property, plant and equipment

Property, plant and equipment are stated at cost less accumulated depreciation and impairment losses (see note 2 (l)(iii)).

The cost of self-constructed items of property, plant and equipment includes the cost of materials, direct labour, the initial estimate, where relevant, of the costs of dismantling and removing the items and restoring the site on which they are located, and an appropriate proportion of production overheads and borrowing costs (see note 2 (w)).

The cost of an item of property, plant and equipment is the cash price equivalent at the recognition date. If payment is deferred beyond normal credit terms, the difference between the cash price equivalent and the total payment is recognised as interest over the period of credit unless such interest is capitalised.

Gains or losses arising from the retirement or disposal of an item of property, plant and equipment are determined as the difference between the net disposal proceeds and the carrying amount of the item and are recognised in profit or loss on the date of retirement or disposal.

Depreciation is calculated to write off the cost of items of property, plant and equipment, less their estimated residual value, if any, using the straight line method over their estimated useful lives as follows:

– Buildings and structures	8–30 years
– Generators and related equipment	5–30 years
– Motor vehicles	8–9 years
– Furniture, fixtures and others	5–8 years

Where parts of an item of property, plant and equipment have different useful lives, the cost of the item is allocated on a reasonable basis between the parts and each part is depreciated separately. Both the useful life of an asset and its residual value, if any, are reviewed annually.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(j) Intangible assets (other than goodwill)

The Group recognises an intangible asset arising from a service concession arrangement when it has a right to charge for usage of the concession infrastructure. Intangible assets received as consideration for providing construction services in a service concession arrangement are measured at fair value upon initial recognition. Subsequent to initial recognition the intangible asset is measured at cost less accumulated amortisation and impairment losses (see note 2 (l)(iii)).

Other intangible assets that are acquired by the Group are stated in the statement of financial position at cost less accumulated amortisation (where the estimated useful life is finite) and impairment losses (see note 2 (l)(iii)). Expenditure on internally generated goodwill and brands is recognised as an expense in the period in which it is incurred.

Amortisation of intangible assets with finite useful lives is charged to profit or loss on a straight-line basis over the assets' estimated useful lives. The following intangible assets with finite useful lives are amortised from the date they are available for use and their estimated useful lives are as follows:

–	Concession assets	25 years
–	Software and others	3–5 years

Both the period and method of amortisation are reviewed annually.

(k) Leased assets

An arrangement, comprising a transaction or a series of transactions, is or contains a lease if the Group determines that the arrangement conveys a right to use a specific asset or assets for an agreed period of time in return for a payment or a series of payments. Such a determination is made based on an evaluation of the substance of the arrangement and is regardless of whether the arrangement takes the legal form of a lease.

(i) Classification of assets leased to the Group

Assets that are held by Group under leases which transfer to the Group substantially all the risks and rewards of ownership are classified as being held under finance leases. Leases which do not transfer substantially all the risks and rewards of ownership to the Group are classified as operating leases.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(k) Leased assets (continued)

(ii) Assets acquired under finance leases

Where the Group acquires the use of assets under finance leases, the amounts representing the fair value of the leased asset, or, if lower, the present value of the minimum lease payments, of such assets are recognised as property, plant and equipment and the corresponding liabilities, net of finance charges, are recorded as obligations under finance leases. Depreciation is provided at rates which write off the cost or valuation of the assets over the term of the relevant lease or, where it is likely the Group will obtain ownership of the asset, the life of the asset, as set out in note 2 (i). Impairment losses are accounted for in accordance with the accounting policy as set out in note 2 (l)(iii). Finance charges implicit in the lease payments are charged to profit or loss over the period of the leases so as to produce an approximately constant periodic rate of charge on the remaining balance of the obligations for each accounting period. Contingent rentals are charged to profit or loss in the accounting period in which they are incurred.

(iii) Operating lease charges

Where the Group has the use of assets held under operating leases, payments made under the leases are charged to profit or loss in equal instalments over the accounting periods covered by the lease term, except where an alternative basis is more representative of the pattern of benefits to be derived from the leased asset. Lease incentives received are recognised in profit or loss as an integral part of the aggregate net lease payments made. Contingent rentals are charged to profit or loss in the accounting period in which they are incurred.

The cost of acquiring land held under an operating lease is amortised on a straight-line basis over the period of the lease term.

(l) Credit loss and impairment of assets

(i) Credit losses from financial instruments

(A) Policy applicable from 1 January 2018

The Group recognises a loss allowance for expected credit losses (ECLs) on the following items:

– financial assets measured at amortised cost (including cash and cash equivalents and trade and other receivables); and

– financial guarantee contracts issued, which are not measured at FVPL.

Financial assets measured at fair value, including equity securities measured at FVPL, equity securities designated at FVOCI (non-recycling) and derivative financial assets, are not subject to the ECL assessment.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(l) Credit loss and impairment of assets (continued)

(i) Credit losses from financial instruments (continued)

(A) Policy applicable from 1 January 2018 (continued)

Measurement of ECLs

ECLs are a probability-weighted estimate of credit losses. Credit losses are measured as the present value of all expected cash shortfalls (i.e. the difference between the cash flows due to the Group in accordance with the contract and the cash flows that the Group expects to receive).

The maximum period considered when estimating ECLs is the maximum contractual period over which the Group is exposed to credit risk.

In measuring ECLs, the Group takes into account reasonable and supportable information that is available without undue cost or effort. This includes information about past events, current conditions and forecasts of future economic conditions.

ECLs are measured on either of the following bases:

– 12-month ECLs: these are losses that are expected to result from possible default events within the 12 months after the reporting date; and

– lifetime ECLs: these are losses that are expected to result from all possible default events over the expected lives of the items to which the ECL model applies.

Loss allowances for trade receivables are always measured at an amount equal to lifetime ECLs. ECLs on these financial assets are estimated using a provision matrix based on the Group's historical credit loss experience, adjusted for factors that are specific to the debtors and an assessment of both the current and forecast general economic conditions at the reporting date.

For all other financial instruments, the Group recognises a loss allowance equal to 12-month ECLs unless there has been a significant increase in credit risk of the financial instrument since initial recognition, in which case the loss allowance is measured at an amount equal to lifetime ECLs.

Low credit risk

If the financial instrument has a low risk of default, the borrower has a strong capacity to meet its contractual cash flow obligations in the near term and adverse changes in economic and business conditions in the longer term may, but will not necessarily, reduce the ability of the borrower to fulfil its contractual cash flow obligations, the credit risk on a financial instrument is considered low.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(l) Credit loss and impairment of assets (continued)

(i) Credit losses from financial instruments (continued)

(A) Policy applicable from 1 January 2018 (continued)

Significant increases in credit risk

In assessing whether the credit risk of a financial instrument has increased significantly since initial recognition, the Group compares the risk of default occurring on the financial instrument assessed at the reporting date with that assessed at the date of initial recognition. The Group considers both quantitative and qualitative information that is reasonable and supportable, including historical experience and forward-looking information that is available without undue cost or effort.

In particular, the following information is taken into account when assessing whether credit risk has increased significantly since initial recognition:

– failure to make payments of principal or interest on their contractually due dates;

– an actual or expected significant deterioration in a financial instrument's external or internal credit rating (if available);

– an actual or expected significant deterioration in the operating results of the debtor; and

– existing or forecast changes in the technological, market, economic or legal environment that have a significant adverse effect on the debtor's ability to meet its obligation to the Group.

Depending on the nature of the financial instruments, the assessment of a significant increase in credit risk is performed on either an individual basis or a collective basis. When the assessment is performed on a collective basis, the financial instruments are grouped based on shared credit risk characteristics, such as past due status and credit risk ratings.

The Group assumes that the credit risk on a financial asset has increased significantly if it is more than 30 days past due, unless the Group has reasonable and supportable information that is available without undue cost or effort, that demonstrates that the credit risk has not increased significantly since initial recognition even though the contractual payments are more 30 days past due.

The Group considers a financial asset to be in default when the borrower is unlikely to pay its credit obligations to the Group in full, without recourse by the Group to actions such as realising security (if any is held).

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(l) Credit loss and impairment of assets (continued)

(i) Credit losses from financial instruments (continued)

(A) Policy applicable from 1 January 2018 (continued)

Significant increases in credit risk (continued)

ECLs are remeasured at each reporting date to reflect changes in the financial instrument's credit risk since initial recognition. Any change in the ECL amount is recognised as an impairment gain or loss in profit or loss. The Group recognises an impairment gain or loss for all financial instruments with a corresponding adjustment to their carrying amount through a loss allowance account, except for investments in debt securities that are measured at FVOCI (recycling), for which the loss allowance is recognised in other comprehensive income and accumulated in the fair value reserve (recycling).

Basis of calculation of interest income

Interest income recognised in accordance with note 2 (u)(iv) is calculated based on the gross carrying amount of the financial asset unless the financial asset is credit-impaired, in which case interest income is calculated based on the amortised cost (i.e. the gross carrying amount less loss allowance) of the financial asset.

At each reporting date, the Group assesses whether a financial asset is credit-impaired. A financial asset is credit-impaired when one or more events that have a detrimental impact on the estimated future cash flows of the financial asset have occurred.

Evidence that a financial asset is credit-impaired includes the following observable events:

– significant financial difficulties of the debtor;

– a breach of contract, such as a default or delinquency in interest or principal payments;

– it becoming probable that the borrower will enter into bankruptcy or other financial reorganisation;

– significant changes in the technological, market, economic or legal environment that have an adverse effect on the debtor; or

– the disappearance of an active market for a security because of financial difficulties of the issuer.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(l) Credit loss and impairment of assets (continued)

(i) Credit losses from financial instruments (continued)

(A) Policy applicable from 1 January 2018 (continued)

Write-off policy

The gross carrying amount of a financial asset is written off (either partially or in full) to the extent that there is no realistic prospect of recovery. This is generally the case when the Group determines that the debtor does not have assets or sources of income that could generate sufficient cash flows to repay the amounts subject to the write-off.

Subsequent recoveries of an asset that was previously written off are recognised as a reversal of impairment in profit or loss in the period in which the recovery occurs.

(B) Policy applicable prior to 1 January 2018

Prior to 1 January 2018, an "incurred loss" model was used to measure impairment losses on financial assets not classified as at FVPL (e.g. trade and other receivables, available-for-sale investments and held-to-maturity debt securities). Under the "incurred loss" model, an impairment loss was recognised only when there was objective evidence of impairment. Objective evidence of impairment included:

– significant financial difficulties of the debtor;

– a breach of contract, such as a default or delinquency in interest or principal payments;

– it becoming probable that the debtor will enter bankruptcy or other financial reorganisation;

– significant changes in the technological, market, economic or legal environment that have an adverse effect on the debtor; and

– a significant or prolonged decline in the fair value of an investment in an equity instrument below its cost.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(l) Credit loss and impairment of assets (continued)

(i) Credit losses from financial instruments (continued)

(B) Policy applicable prior to 1 January 2018 (continued)

If any such evidence existed, an impairment loss was determined and recognised as follows:

– For trade and other receivables and other financial assets carried at amortised cost, impairment loss was measured as the difference between the asset's carrying amount and the present value of estimated future cash flows, discounted at the financial asset's original effective interest rate, where the effect of discounting was material. This assessment was made collectively where these financial assets shared similar risk characteristics, such as similar past due status, and had not been individually assessed as impaired. Future cash flows for financial assets which were assessed for impairment collectively were based on historical loss experience for assets with credit risk characteristics similar to the collective group.

  If in a subsequent period the amount of an impairment loss decreased and the decrease could be linked objectively to an event occurring after the impairment loss was recognised, the impairment loss was reversed through profit or loss. A reversal of an impairment loss was only recognised to the extent that it did not result in the asset's carrying amount exceeding that which would have been determined had no impairment loss been recognised in prior years.

  When the recovery of a trade debtor or other financial assets carried at amortised cost was considered doubtful but not remote, associated impairment losses were recorded using an allowance account. When the Group was satisfied that recovery was remote, the amount considered irrecoverable was written off against the gross carrying amount of those assets directly. Subsequent recoveries of amounts previously charged to the allowance account were reversed against the allowance account. Other changes in the allowance account and subsequent recoveries of amounts previously written off directly were recognised in profit or loss.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(l) Credit loss and impairment of assets (continued)

(i) Credit losses from financial instruments (continued)

(B) Policy applicable prior to 1 January 2018 (continued)

– For available-for-sale investments, the cumulative loss that had been recognised in the fair value reserve (recycling) was reclassified to profit or loss. The amount of the cumulative loss that was recognised in profit or loss was the difference between the acquisition cost (net of any principal repayment and amortisation) and current fair value, less any impairment loss on that asset previously recognised in profit or loss.

Impairment losses recognised in profit or loss in respect of available-for-sale equity securities were not reversed through profit or loss. Any subsequent increase in the fair value of such assets was recognised in other comprehensive income.

Impairment losses recognised in profit or loss in respect of available-for-sale debt securities were reversed if the subsequent increase in fair value could be objectively related to an event occurring after the impairment loss was recognised. Reversals of impairment losses in such circumstances were recognised in profit or loss.

(ii) Credit losses from financial guarantees issued

Financial guarantees are contracts that require the issuer (i.e. the guarantor) to make specified payments to reimburse the beneficiary of the guarantee (the "**holder**") for a loss the holder incurs because a specified debtor fails to make payment when due in accordance with the terms of a debt instrument.

Financial guarantees issued are initially recognised within "trade and other payables" at fair value, which is determined by reference to fees charged in an arm's length transaction for similar services, when such information is obtainable, or to interest rate differentials, by comparing the actual rates charged by lenders when the guarantee is made available with the estimated rates that lenders would have charged, had the guarantees not been available, where reliable estimates of such information can be made. Where consideration is received or receivable for the issuance of the guarantee, the consideration is recognised in accordance with the Group's policies applicable to that category of asset. Where no such consideration is received or receivable, an immediate expense is recognised in profit or loss.

Subsequent to initial recognition, the amount initially recognised as deferred income is amortised in profit or loss over the term of the guarantee as income from financial guarantees issued.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(l) Credit loss and impairment of assets (continued)

(ii) Credit losses from financial guarantees issued (continued)

(A) Policy applicable from 1 January 2018

The Group monitors the risk that the specified debtor will default on the contract and recognises a provision when ECLs on the financial guarantees are determined to be higher than the amount carried in “trade and other payables” in respect of the guarantees (i.e. the amount initially recognised, less accumulated amortisation).

To determine ECLs, the Group considers changes in the risk of default of the specified debtor since the issuance of the guarantee. A 12-month ECL is measured unless the risk that the specified debtor will default has increased significantly since the guarantee is issued, in which case a lifetime ECL is measured. The same definition of default and the same assessment of significant increase in credit risk as described in note 2 (l)(i) apply.

As the Group is required to make payments only in the event of a default by the specified debtor in accordance with the terms of the instrument that is guaranteed, an ECL is estimated based on the expected payments to reimburse the holder for a credit loss that it incurs less any amount that the Group expects to receive from the holder of the guarantee, the specified debtor or any other party. The amount is then discounted using the current risk-free rate adjusted for risks specific to the cash flows.

(B) Policy applicable prior to 1 January 2018

Prior to 1 January 2018, a provision would be recognised if and when it became probable that (i) the holder of the guarantee would call upon the Group under the guarantee and (ii) the amount of the claim on the Group was expected to exceed the amount carried in “trade and other payables” in respect of the guarantee.

(iii) Impairment of other non-current assets

Internal and external sources of information are reviewed at the end of each reporting period to identify indications that the following assets may be impaired or, except in the case of goodwill, an impairment loss previously recognised no longer exists or may have decreased:

– property, plant and equipment;

– pre-paid interests in leasehold land classified as being held under an operating lease;

– intangible assets; and

– investments in subsidiaries, associates and joint ventures in the Company’s statement of financial position.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(l) Credit loss and impairment of assets (continued)

(iii) Impairment of other non-current assets (continued)

If any such indication exists, the asset's recoverable amount is estimated.

– Calculation of recoverable amount

The recoverable amount of an asset is the greater of its fair value less costs of disposal and value in use. In assessing value in use, the estimated future cash flows are discounted to their present value using a pre-tax discount rate that reflects current market assessments of the time value of money and the risks specific to the asset. Where an asset does not generate cash inflows largely independent of those from other assets, the recoverable amount is determined for the smallest group of assets that generates cash inflows independently (i.e. a cash-generating unit).

– Recognition of impairment losses

An impairment loss is recognised in profit or loss if the carrying amount of an asset, or the cash-generating unit to which it belongs, exceeds its recoverable amount. Impairment losses recognised in respect of cash-generating units are allocated to reduce the carrying amount of the assets in the unit (or group of units) on a pro rata basis, except that the carrying value of an asset will not be reduced below its individual fair value less costs of disposal (if measurable) or value in use (if determinable).

– Reversals of impairment losses

An impairment loss is reversed if there has been a favourable change in the estimates used to determine the recoverable amount.

A reversal of an impairment loss is limited to the asset's carrying amount that would have been determined had no impairment loss been recognised in prior years. Reversals of impairment losses are credited to profit or loss in the year in which the reversals are recognised.

(m) Inventories

Inventories include materials for repairs and maintenance and spare parts, and are stated at the lower of cost and net realisable value.

Inventories are initially recorded at cost and are charged to operating expenses when used, or capitalised to property, plant and equipment when installed, as appropriate, using weighted average cost basis. Cost of inventories includes costs of purchase and transportation costs. Provision for inventory obsolescence is determined by the excess of cost over net realisable value.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(n) Trade and other receivables

A receivable is recognised when the Group has an unconditional right to receive consideration. A right to receive consideration is unconditional if only the passage of time is required before payment of that consideration is due. If revenue has been recognised before the Group has an unconditional right to receive consideration, the amount is presented as a contract asset.

Receivables are stated at amortised cost using the effective interest method less allowance for credit losses (see note 2 (l)(i)).

(o) Interest-bearing borrowings

Interest-bearing borrowings are recognised initially at fair value less attributable transaction costs. Subsequent to initial recognition, interest-bearing borrowings are stated at amortised cost with any difference between the amount initially recognised and redemption value being recognised in profit or loss over the period of the borrowings, together with any interest and fees payable, using the effective interest method.

(p) Trade and other payables

Trade and other payables are initially recognised at fair value. Except for financial guarantee liabilities measured in accordance with note 2 (l)(ii), trade and other payables are subsequently stated at amortised cost unless the effect of discounting would be immaterial, in which case they are stated at cost.

(q) Cash and cash equivalents

Cash and cash equivalents comprise cash at bank and on hand, demand deposits with banks and other financial institutions, and short-term, highly liquid investments that are readily convertible into known amounts of cash and which are subject to an insignificant risk of changes in value, having been within three months of maturity at acquisition. Cash and cash equivalents are assessed for expected credit losses (ECLs) in accordance with the policy set out in note 2 (l)(i).

(r) Short term employee benefits and contributions to defined contribution retirement plans

Salaries, annual bonuses, contributions to defined contribution retirement plans and the cost of non-monetary benefits are accrued in the year in which the associated services are rendered by employees. Where payment or settlement is deferred and the effect would be material, these amounts are stated at their present values.

A defined contribution plan is a post-employment benefit plan under which an entity pay fixed contributions into a separate entity and will have no legal or constructive obligation to pay further amounts. Obligation for the statutory defined contribution pension plans are recognised as an expense in profit or loss when they are due.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(s) Income tax

Income tax for the year comprises current tax and movements in deferred tax assets and liabilities. Current tax and movements in deferred tax assets and liabilities are recognised in profit or loss except to the extent that they relate to items recognised in other comprehensive income or directly in equity, in which case the relevant amounts of tax are recognised in other comprehensive income or directly in equity, respectively.

Current tax is the expected tax payable on the taxable income for the year, using tax rates enacted or substantively enacted at the end of the reporting period, and any adjustment to tax payable in respect of previous years.

Deferred tax assets and liabilities arise from deductible and taxable temporary differences respectively, being the differences between the carrying amounts of assets and liabilities for financial reporting purposes and their tax bases. Deferred tax assets also arise from unused tax losses and unused tax credits.

Apart from certain limited exceptions, all deferred tax liabilities, and all deferred tax assets to the extent that it is probable that future taxable profits will be available against which the asset can be utilised, are recognised. Future taxable profits that may support the recognition of deferred tax assets arising from deductible temporary differences include those that will arise from the reversal of existing taxable temporary differences, provided those differences relate to the same taxation authority and the same taxable entity, and are expected to reverse either in the same period as the expected reversal of the deductible temporary difference or in periods into which a tax loss arising from the deferred tax asset can be carried back or forward. The same criteria are adopted when determining whether existing taxable temporary differences support the recognition of deferred tax assets arising from unused tax losses and credits, that is, those differences are taken into account if they relate to the same taxation authority and the same taxable entity, and are expected to reverse in a period, or periods, in which the tax loss or credit can be utilised.

The limited exceptions to recognition of deferred tax assets and liabilities are those temporary differences arising from goodwill not deductible for tax purposes, the initial recognition of assets or liabilities that affect neither accounting nor taxable profit (provided they are not part of a business combination), and temporary differences relating to investments in subsidiaries to the extent that, in the case of taxable differences, the Group controls the timing of the reversal and it is probable that the differences will not reverse in the foreseeable future, or in the case of deductible differences, unless it is probable that they will reverse in the future.

The amount of deferred tax recognised is measured based on the expected manner of realisation or settlement of the carrying amount of the assets and liabilities, using tax rates enacted or substantively enacted at the end of the reporting period. Deferred tax assets and liabilities are not discounted.

The carrying amount of a deferred tax asset is reviewed at the end of each reporting period and is reduced to the extent that it is no longer probable that sufficient taxable profits will be available to allow the related tax benefit to be utilised. Any such reduction is reversed to the extent that it becomes probable that sufficient taxable profits will be available.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(s) Income tax (continued)

Current tax balances and deferred tax balances, and movements therein, are presented separately from each other and are not offset. Current tax assets are offset against current tax liabilities, and deferred tax assets against deferred tax liabilities, if the Company or the Group has the legally enforceable right to set off current tax assets against current tax liabilities and the following additional conditions are met:

- in the case of current tax assets and liabilities, the Company or the Group intends either to settle on a net basis, or to realise the asset and settle the liability simultaneously; or
- in the case of deferred tax assets and liabilities, if they relate to income tax levied by the same taxation authority on either:
  - the same taxable entity; or
  - different taxable entities, which, in each future period in which significant amounts of deferred tax liabilities or assets are expected to be settled or recovered, intend to realise the current tax assets and settle the current tax liabilities on a net basis or realise and settle simultaneously.

(t) Provisions and contingent liabilities

Provisions are recognised for other liabilities of uncertain timing or amount when the Group or the Company has a legal or constructive obligation arising as a result of a past event, it is probable that an outflow of economic benefits will be required to settle the obligation and a reliable estimate can be made. Where the time value of money is material, provisions are stated at the present value of the expenditure expected to settle the obligation.

Where it is not probable that an outflow of economic benefits will be required, or the amount cannot be estimated reliably, the obligation is disclosed as a contingent liability, unless the probability of outflow of economic benefits is remote. Possible obligations, whose existence will only be confirmed by the occurrence or non-occurrence of one or more future events are also disclosed as contingent liabilities unless the probability of outflow of economic benefits is remote.

(u) Revenue and other income

Income is classified by the Group as revenue when it arises from the sale of goods or the provision of services in the ordinary course of the Group's business.

Revenue is recognised when control over a product or service is transferred to the customer at the amount of promised consideration to which the Group is expected to be entitled, excluding those amounts collected on behalf of third parties. Revenue excludes value added tax or other sales taxes and is after deduction of any trade discounts.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(u) Revenue and other income (continued)

Further details of the Group's revenue and other income recognition policies are as follows:

(i) Sales of electricity

Revenue is recognised upon transmission of electricity to the power grid companies where the control of the electricity is transferred at the same time.

(ii) Rendering of services

Revenue from the rendering of services is recognised when the related services are rendered.

(iii) Dividends

– Dividend income from unlisted investments is recognised when the equity shareholder's right to receive payment is established.

– Dividend income from listed investments is recognised when the share price of the investment goes ex-dividend.

(iv) Interest income

Interest income is recognised as it accrues using the effective interest method. For financial assets measured at amortised cost that are not credit-impaired, the effective interest rate is applied to the gross carrying amount of the asset. For credit-impaired financial assets, the effective interest rate is applied to the amortised cost (i.e. gross carrying amount net of loss allowance) of the asset (see note 2 (l)(i)).

(v) Government grants

Government grants are recognised in the statement of financial position initially when there is reasonable assurance that they will be received and that the Group will comply with the conditions attaching to them. Grants that compensate the Group for expenses incurred are recognised as income in profit or loss on a systematic basis in the same periods in which the expenses are incurred. Grants that compensate the Group for the cost of an asset are recognised initially as deferred income and consequently are recognised in profit or loss on a systematic basis over the useful life of the asset by way of reduced depreciation expense.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(v) Translation of foreign currencies

Foreign currency transactions during the year are translated at the foreign exchange rates ruling at the transaction dates. Monetary assets and liabilities denominated in foreign currencies are translated at the foreign exchange rates ruling at the end of the reporting period. Exchange gains and losses are recognised in profit or loss.

Non-monetary assets and liabilities that are measured in terms of historical cost in a foreign currency are translated using the foreign exchange rates ruling at the transaction dates. The transaction date is the date on which the entity initially recognises such non-monetary assets or liabilities. Non-monetary assets and liabilities denominated in foreign currencies that are stated at fair value are translated using the foreign exchange rates ruling at the dates the fair value was measured.

The results of foreign operations are translated into RMB at the exchange rates approximating the foreign exchange rates ruling at the dates of the transactions. Statement of financial position items are translated into RMB at the closing foreign exchange rates at the end of the reporting period. The resulting exchange differences are recognised in other comprehensive income and accumulated separately in equity in the exchange reserve.

On disposal of a foreign operation, the cumulative amount of the exchange differences relating to that foreign operation is reclassified from equity to profit or loss when the profit or loss on disposal is recognised.

(w) Borrowing costs

Borrowing costs that are directly attributable to the acquisition, construction or production of an asset which necessarily takes a substantial period of time to get ready for its intended use or sale are capitalised as part of the cost of that asset. Other borrowing costs are expensed in the period in which they are incurred.

The capitalisation of borrowing costs as part of the cost of a qualifying asset commences when expenditure for the asset is being incurred, borrowing costs are being incurred and activities that are necessary to prepare the asset for its intended use or sale are in progress. Capitalisation of borrowing costs is suspended or ceases when substantially all the activities necessary to prepare the qualifying asset for its intended use or sale are interrupted or complete.

2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

(x) Related parties

(a) A person, or a close member of that person's family, is related to the Group if that person:

(i) has control or joint control over the Group;

(ii) has significant influence over the Group; or

(iii) is a member of the key management personnel of the Group or the Group's parent.

(b) An entity is related to the Group if any of the following conditions applies:

(i) The entity and the Group are members of the same group (which means that each parent, subsidiary and fellow subsidiary is related to the others).

(ii) One entity is an associate or joint venture of the other entity (or an associate or joint venture of a member of a group of which the other entity is a member).

(iii) Both entities are joint ventures of the same third party.

(iv) One entity is a joint venture of a third entity and the other entity is an associate of the third entity.

(v) The entity is a post-employment benefit plan for the benefit of employees of either the Group or an entity related to the Group.

(vi) The entity is controlled or jointly controlled by a person identified in (a).

(vii) A person identified in (a)(i) has significant influence over the entity or is a member of the key management personnel of the entity (or of a parent of the entity).

(viii) The entity, or any member of a group of which it is a part, provides key management personnel services to the Group or to the Group's parent.

Close members of the family of a person are those family members who may be expected to influence, or be influenced by, that person in their dealings with the entity.

3 CRITICAL ACCOUNTING JUDGEMENTS AND ESTIMATES IN APPLYING THE GROUP'S ACCOUNTING POLICIES

The Group's financial condition and results of operations are sensitive to accounting methods, assumptions and estimates that underlie the preparation of the financial statements. The Group bases the assumptions and estimates on historical experience and on various other assumptions that the Group believes to be reasonable and which form the basis for making judgments about matters that are not readily apparent from other sources. On an on-going basis, management evaluates its estimates. Actual results may differ from those estimates as facts, circumstances and conditions change.

The selection of critical accounting policies, the judgments and other uncertainties affecting application of those polices and the sensitivity of reported results to changes in conditions and assumptions are factors to be considered when reviewing the financial statements. The principal accounting policies are set forth in note 2. The Group believes the following critical accounting policies involve the most significant judgments and estimates used in the preparation of the financial statements.

(a) Impairment losses of non-current assets

In considering the impairment losses that may be required for certain of the Group's assets which include property, plant and equipment, lease prepayments, intangible assets and investment in joint ventures and associates, recoverable amount of the asset needs to be determined. The recoverable amount is the greater of the fair value less costs to sell and the value in use. It is difficult to precisely estimate selling price because quoted market prices for these assets may not be readily available. In determining the value in use, expected cash flow generated by the asset are discounted to their present value, which requires significant judgment relating to items such as level of sale volume, selling price and amount of operating costs. The Group uses all readily available information in determining an amount that is reasonable approximation of recoverable amount, including estimates based on reasonable and supportable assumptions and projections of items such as sale volume, selling price and amount of operating costs.

3 CRITICAL ACCOUNTING JUDGEMENTS AND ESTIMATES IN APPLYING THE GROUP'S ACCOUNTING POLICIES (CONTINUED)

(b) Recognition of deferred tax assets

Deferred tax assets in respect of unused tax losses and tax credit carried forward and deductible temporary differences are recognised and measured based on the expected manner of realisation or settlement of the carrying amount of the assets, using tax rates enacted or substantively enacted at the end of the reporting period. In determining the carrying amounts of deferred assets, expected taxable profits are estimated which involves a number of assumptions relating to the operating environment of the Group and require a significant level of judgment exercised by the directors. Any change in such assumptions and judgment would affect the carrying amounts of deferred tax assets to be recognised and hence the net profit in future years.

(c) Depreciation

Property, plant and equipment are depreciated on a straight-line basis over the estimated useful lives of the assets, after taking into account the estimated residual value. The Group reviews the estimated useful lives of the assets regularly. The useful lives are based on the Group's historical experience with similar assets and taking into account anticipated technological changes. The depreciation expense for future periods is adjusted if there are significant changes from previous estimates.

(d) Income tax

The Group files income taxes with a number of tax authorities. Judgment is required in determining the provision for taxation. There are many transactions and calculations for which the ultimate tax determinations are uncertain during the ordinary course of business. Where the final tax outcomes of these matters are different from the amounts originally recorded, the differences may impact the current income tax and deferred income tax provisions in the periods in which the final tax outcomes became available.

4 REVENUE

The amount of each significant category of revenue recognised during the year is as follows:

	2018 *RMB'000*	2017 *(Note)* *RMB'000*
Sales of electricity	**11,645,347**	10,548,123
Others	**4,944**	6,232
	11,650,291	10,554,355

Note: The Group has initially applied IFRS 15 using the cumulative effect method. Under this method, the comparative information is not restated and was prepared in accordance with IAS 18 and IAS 11 (see note 2 (c)(ii)).

Sales of electricity were mainly generated by the wind power plants of the Group. The Group has a single reportable operating segment. As the Group does not have material operations outside the PRC, no geographic segment information is presented.

5 OTHER NET INCOME

	2018 *RMB'000*	2017 *RMB'000*
Government grants	**312,883**	325,624
Penalty income from suppliers and constructors *(note)*	**25,644**	126,349
Net gain on disposal of property, plant and equipment	**831**	4,324
Others	**48,390**	12,562
	387,748	468,859

Note:

Penalty income from suppliers and constructors mainly represented compensations from third party wind turbine suppliers or constructors for revenue losses incurred due to certain spare parts of wind turbines not running stably and certain warranty maintenance work not being conducted timely during the warranty period for certain wind power plants.

6 FINANCE INCOME AND EXPENSES

	2018 *RMB'000*	2017 *RMB'000*
Interest income on financial assets	**38,038**	31,822
Foreign exchange gains	**–**	745
Dividend income	**28,402**	24,716
Finance income	**66,440**	57,283
Interest on bank loans and other borrowings and finance charges on obligations under finance leases	**2,319,843**	2,300,900
Less: interest expenses capitalised into property, plant and equipment *(note (i))*	**125,438**	125,489
	2,194,405	2,175,411
Foreign exchange losses	**14,346**	119,125
Arrangement fee for trade receivables transferred *(note (ii))*	**46,110**	–
Bank charges and others	**843**	1,027
Finance expenses	**2,255,704**	2,295,563
Net finance expenses recognised in profit or loss	**(2,189,264)**	(2,238,280)

Notes:

(i) The borrowing costs have been capitalised at rates of 4.22% to 4.90% for the year ended 31 December 2018 (2017: 3.47% to 4.35%).

(ii) On 10 December 2018, the Company entered into an Accounts Receivable Transfer Agreement (the "**Transfer Agreement**") with China Huaneng Group Co., Ltd. ("**Huaneng Group**"), the controlling shareholder of the Company, for a term commencing on 10 December 2018 and expiring on 31 December 2020. Pursuant to the Transfer Agreement, the Group agreed to transfer certain accounts receivables to Huaneng Group, which represent the relevant tariff premium receivables of certain subsidiaries of the Group, and Huaneng Group agreed to purchase these accounts receivables in a consideration of amount equivalent to the carrying amounts of these accounts receivables. In addition, the Group agreed to pay an arrangement fee to Huaneng Group for the initial accounts receivables transferred in 2018.

Accordingly the Group transferred certain accounts receivables with carrying amounts of RMB490,052,000 to Huaneng Group and received the relevant consideration of RMB490,052,000 in December 2018. The arrangement fee to be paid to Huaneng Group is RMB46,110,000 which was recognised by the Group as finance expenses.

7 PROFIT BEFORE TAXATION

Profit before taxation is arrived at after charging:

(a) Personnel costs

	2018 *RMB'000*	2017 *RMB'000*
Salaries, wages and other benefits	**563,038**	441,759
Contributions to defined contribution retirement plan	**88,762**	72,246
	651,800	514,005

Pursuant to the relevant labour rules and regulations in the PRC, the Group participated in defined contribution retirement schemes (the "**Schemes**") organised by the relevant local government authorities for its employees. The Group is required to make contributions to the Schemes at 14% to 20% of the salaries of the employees. The local government authorities are responsible for the pension obligations to retired employees. In addition, the Group and its staff participate in a retirement plan managed by Huaneng Group to supplement the above-mentioned Schemes and the Group makes contributions to the retirement plan at 5% to 8% of the salaries of the employees. The Group has no other material obligation to make payments in respect of pension benefits other than the annual contributions described above.

(b) Other items

	2018 *RMB'000*	2017 *RMB'000*
Amortisation		
– lease prepayments	**10,901**	8,634
– intangible assets	**40,282**	39,126
Depreciation		
– property, plant and equipment	**3,921,759**	3,750,694
Impairment losses recognised in other operating expenses		
– property, plant and equipment *(note 13(v))*	**421,516**	62,908
– other non-current assets	**–**	141,321
Auditors' remuneration		
– audit services	**12,500**	12,500
– other services	**3,500**	3,500
Operating lease charges		
– hire of properties	**58,534**	50,548
Cost of inventories	**171,326**	114,757

8 INCOME TAX IN THE CONSOLIDATED STATEMENT OF COMPREHENSIVE INCOME

(a) Taxation in the consolidated statement of comprehensive income represents:

	2018	2017
	RMB'000	*RMB'000*
Current tax		
Provision for the year		
– PRC Corporate Income Tax *(note (i) and note 26(a))*	**551,277**	348,357
– Hong Kong Profits Tax *(note (ii))*	**–**	–
Under/(over)-provision for prior years *(note 26(a))*	**15,301**	(2,068)
	566,578	346,289
Deferred tax		
Reversal of temporary differences *(note 26(b))*	**146**	54
	566,724	346,343

Notes:

(i) The provision for income tax of the Group is calculated based on a statutory rate of 25% of the assessable profit of the Group, except for certain subsidiaries of the Group which are tax exempted or taxed at preferential rates, as determined in accordance with the relevant PRC Corporate Income Tax rules and regulations for the years ended 31 December 2018 and 2017.

(ii) Huaneng Renewables (Hong Kong) Limited ("**Huaneng Renewables HK**"), a subsidiary of the Group incorporated in Hong Kong in 2011, is subject to Hong Kong Profits Tax which is calculated at 16.5% of its estimated assessable profit for the year. The subsidiary had no assessable profit for the years ended 31 December 2018 and 2017.

8 INCOME TAX IN THE CONSOLIDATED STATEMENT OF COMPREHENSIVE INCOME (CONTINUED)

(b) Reconciliation between tax expense and accounting profit at applicable tax rates:

	2018	2017
	RMB'000	*RMB'000*
Profit before taxation	**3,695,184**	3,407,665
Applicable tax rate	**25%**	25%
Notional tax on profit before taxation	**923,796**	851,916
Tax effect of non-deductible expenses	**13,791**	9,197
Tax effect of non-taxable income	**(7,100)**	(5,185)
Tax effect of differential tax rate and tax concessions of certain subsidiaries of the Group *(note (i))*	**(482,946)**	(585,157)
Tax effect of temporary differences not recognised	**105,379**	51,057
Tax effect of unused tax losses not recognised	**26,968**	113,720
Tax effect of tax losses utilised while not recognised in prior years	**(2,056)**	(53,056)
Tax credits in relation to purchase of certain environmental protection equipment *(note (ii))*	**(30,030)**	(35,828)
Under/(over)-provision for prior years *(note 26(a))*	**15,301**	(2,068)
Others	**3,621**	1,747
Income tax	**566,724**	346,343

8 INCOME TAX IN THE CONSOLIDATED STATEMENT OF COMPREHENSIVE INCOME (CONTINUED)

(b) Reconciliation between tax expense and accounting profit at applicable tax rates: (continued)

Notes:

(i) Pursuant to CaiShui [2008] No.46 Notice on the Execution of the Catalogue of Public Infrastructure Projects Entitled for Preferential Tax Treatment (關於執行公共基礎設施項目企業所得稅優惠目錄有關問題的通知), certain wind power projects and solar power projects of the Group, which are approved after 1 January 2008, are entitled to a tax holiday of a 3-year full exemption followed by a 3-year 50% exemption commencing from their respective years in which their first operating income is derived (the "**3+3 tax holiday**").

In addition, pursuant to Caishui [2012] No.10 Notice on the Implementation of Public Infrastructure Projects and Projects of Environmental Protection, Energy Saving and Water Conservation Entitled for Preferential Tax Treatment (關於公共基礎設施項目和環境保護節能節水項目企業所得稅優惠政策問題的通知), certain wind power projects of the Group, which are approved before 31 December 2007, are also entitled to the 3+3 tax holiday commencing from the year in which the first operating income is derived but could only enjoy those tax benefit subsequent to 1 January 2008.

Pursuant to Caishui [2011] No. 58 Notice on Issues Concerning Relevant Tax Policies to In-depth Implementation of the Western Development Strategy (關於深入實施西部大開發戰略有關稅收政策問題的通知) and Announcement [2012] No. 12 Public Announcement on Corporate Income Tax Issues Relating to In-depth Implementation of the Western Development Strategy (關於深入實施西部大開發戰略有關企業所得稅問題的公告), certain subsidiaries of the Group, being enterprises engaged in state encouraged industries established in the specified western regions, are taxed at a preferential income tax rate of 15% and can enjoy the preferential tax rate till 31 December 2020.

(ii) Pursuant to Caishui [2008] No. 48 Notice on Issues Concerning Implementation of Catalogue of Corporate Income Tax Incentives for Special Equipment for Environmental Protection, the Catalogue of Corporate Income Tax Incentives for Special Equipment for Energy and Water Conservation, and the Catalogue of Corporate Income Tax Incentives for Special Equipment for Work Safety (關於執行環境保護專用設備企業所得稅優惠目錄、節能節水專用設備企業所得稅優惠目錄和安全生產專用設備企業所得稅優惠目錄有關問題的通知), certain subsidiaries of the Group, being enterprises that have purchased special equipment for use in environmental protection, energy and water conservation and work safety purposes stipulated in above mentioned catalogues, 10% of the amount invested in the special equipment can be deducted from the income tax in the current year, and such unused tax credit could be carried forward to the following five years.

9 DIRECTORS' AND SUPERVISORS' EMOLUMENTS

Directors' emoluments disclosed pursuant to section 383 (1) of the Hong Kong Companies Ordinance and Part 2 of the Companies (Disclosure of Information about Benefits of Directors) Regulation are as follows:

	Directors' and Supervisors' fees *RMB'000*	Salaries, allowances and benefits in kind *RMB'000*	Bonuses *RMB'000*	Retirement scheme contributions *RMB'000*	2018 Total *RMB'000*
Directors					
Mr. Wang Kui	–	–	–	–	–
Mr. Dai Xinmin	–	–	–	–	–
Mr. Sun Deqiang (resigned in August 2018)	–	–	–	–	–
Mr. Lu Fei (resigned in August 2018)	–	–	–	–	–
Mr. Zhang Qi (appointed in August 2018)	–	–	–	–	–
Mr. Zhai Ji (appointed in August 2018)	–	–	–	–	–
Mr. Lin Gang (chairman)	–	379	613	104	1,096
Mr. Cao Shiguang	–	379	598	96	1,073
Mr. Wen Minggang (appointed in March 2018)	–	262	294	69	625
Ms. Yang Qing (resigned in March 2018)	–	–	–	–	–
Independent non-executive directors					
Mr. Qin Haiyan	140	–	–	–	140
Ms. Dai Huizhu	140	–	–	–	140
Mr. Zhou Shaopeng	140	–	–	–	140
Mr. Wan Kam To	140	–	–	–	140
Supervisors					
Mr. Huang Jian	–	–	–	–	–
Mr. Wang Huanliang	–	–	–	–	–
Ms. Zhong Suzhi	–	292	350	80	722
	560	1,312	1,855	349	4,076

9 DIRECTORS' AND SUPERVISORS' EMOLUMENTS (CONTINUED)

	Directors' and Supervisors' fees	Salaries, allowances and benefits in kind	Bonuses	Retirement scheme contributions	2017 Total
	RMB'000	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*
Directors					
Mr. Cao Peixi					
(resigned in March 2017)	–	–	–	–	–
Mr. Zhang Tingke					
(resigned in March 2017)	–	–	–	–	–
Mr. Wang Kui	–	–	–	–	–
Mr. Lu Fei					
(appointed in March 2017)	–	–	–	–	–
Mr. Sun Deqiang					
(appointed in March 2017)	–	–	–	–	–
Mr. Dai Xinmin					
(appointed in March 2017)	–	–	–	–	–
Mr. Lin Gang	–	356	512	95	963
Mr. Xiao Jun					
(resigned in March 2017)	–	57	218	15	290
Mr. Cao Shiguang					
(appointed in March 2017)	–	267	267	63	597
Ms. Yang Qing	–	312	435	88	835
Mr. He Yan					
(resigned in March 2017)	–	75	209	22	306
Independent non-executive directors					
Mr. Qin Haiyan	140	–	–	–	140
Ms. Dai Huizhu	140	–	–	–	140
Mr. Zhou Shaopeng	140	–	–	–	140
Mr. Wan Kam To	140	–	–	–	140
Supervisors					
Mr. Huang Jian	–	–	–	–	–
Mr. Wang Huanliang	–	–	–	–	–
Mr. Shi Yan					
(resigned in November 2017)	–	286	410	81	777
Ms. Zhong Suzhi					
(appointed in November 2017)	–	24	14	7	45
	560	1,377	2,065	371	4,373

10 INDIVIDUALS WITH HIGH EMOLUMENTS

Of the five individuals with the highest emoluments, two (2017: two) are directors whose emoluments are disclosed in note 9. The aggregate of the emoluments in respect of the other three (2017: three) individuals are as follows:

	2018	2017
	RMB'000	*RMB'000*
Salaries, allowances and benefits in kind	**998**	936
Bonuses	**1,564**	1,306
Retirement scheme contributions	**289**	265
	2,851	2,507

The emoluments of the three (2017: three) individuals with the highest emoluments are within the following bands:

	2018	2017
Hong Kong Dollar ("**HK$**") 500,001 to HK$1,000,000	**–**	3
HK$1,000,000 to HK$1,500,000	**3**	–

11 OTHER COMPREHENSIVE INCOME

	2018 **RMB'000**	2017 RMB'000
Items that may be reclassified subsequently to profit or loss:		
Available-for-sale equity securities:		
– Changes in fair value recognised during the year	**–**	(15,635)
– Tax expense	**–**	–
Net movement in the fair value reserve	**–**	(15,635)
Exchange difference on translation of financial statements of a subsidiary outside mainland China		
– Before and net of tax amount	**135**	(7,218)
Items that will not be reclassified subsequently to profit or loss:		
Equity investment measured at FVOCI:		
– net movement in the fair value reserve (non-recycling)	**145,860**	–
Other comprehensive income	**145,995**	(22,853)

12 EARNINGS PER SHARE

The calculation of basic earnings per share is based on the net profit attributable to the equity shareholders of the Company for the year ended 31 December 2018 of RMB3,086,394,000 (2017: RMB3,011,736,000) and the weighted average number of shares in issue during the year ended 31 December 2018 of 10,566,532,000 shares (2017: 10,251,794,000 shares).

The weighted average number of shares in issue is set out below:

	2018 ***Thousands shares***	2017 *Thousands shares*
Issued ordinary shares at 1 January	**10,566,532**	9,727,996
Effect of new shares issued	**–**	523,798
	10,566,532	10,251,794

There was no difference between the basic and diluted earnings per share as there were no dilutive potential shares outstanding for the years presented.

13 PROPERTY, PLANT AND EQUIPMENT

	Buildings and structures RMB'000	Generators and related equipment RMB'000	Motor vehicles RMB'000	Furniture, fixtures and others RMB'000	Construction in progress RMB'000	Total RMB'000
Cost:						
At 1 January 2017	7,104,100	71,801,754	228,985	111,466	7,008,539	86,254,844
Additions	8,097	11,333	4,123	15,813	3,148,290	3,187,656
Transfer from construction in progress	608,459	3,069,726	–	–	(3,678,185)	–
Transfer to construction in progress	(10,065)	(58,694)	–	–	68,759	–
Disposals	(16,911)	(193,116)	(13,986)	(426)	(15,186)	(239,625)
Reclassification	33,376	(34,432)	–	1,056	–	–
Other	29,314	(80,362)	–	(92)	–	(51,140)
At 31 December 2017	7,756,370	74,516,209	219,122	127,817	6,532,217	89,151,735
At 1 January 2018	**7,756,370**	**74,516,209**	**219,122**	**127,817**	**6,532,217**	**89,151,735**
Additions	**311**	**1,130**	**5,594**	**6,583**	**3,755,336**	**3,768,954**
Transfer from construction in progress	**495,793**	**3,195,272**	**–**	**972**	**(3,692,037)**	**–**
Disposals	**–**	**(258)**	**(6,770)**	**(998)**	**–**	**(8,026)**
Reclassification	**38,773**	**(38,773)**	**–**	**–**	**–**	**–**
Other	**6,135**	**(23,227)**	**1,500**	**154**	**–**	**(15,438)**
At 31 December 2018	**8,297,382**	**77,650,353**	**219,446**	**134,528**	**6,595,516**	**92,897,225**
Accumulated depreciation and impairment losses:						
At 1 January 2017	902,195	13,011,565	128,256	65,948	40,344	14,148,308
Depreciation charge for the year	271,076	3,449,907	23,553	11,289	–	3,755,825
Impairment losses recognised	5,375	57,533	–	–	–	62,908
Written back on disposal	(16,911)	(193,116)	(10,987)	(426)	–	(221,440)
Reclassification	(3,460)	2,845	–	615	–	–
At 31 December 2017	1,158,275	16,328,734	140,822	77,426	40,344	17,745,601
At 1 January 2018	**1,158,275**	**16,328,734**	**140,822**	**77,426**	**40,344**	**17,745,601**
Depreciation charge for the year	**295,209**	**3,596,669**	**20,924**	**12,923**	**–**	**3,925,725**
Impairment losses recognised *(note (v))*	**–**	**2,489**	**–**	**–**	**419,027**	**421,516**
Written back on disposal	**–**	**(105)**	**(6,157)**	**(997)**	**–**	**(7,259)**
Reclassification	**5,409**	**(5,409)**	**–**	**–**	**–**	**–**
At 31 December 2018	**1,458,893**	**19,922,378**	**155,589**	**89,352**	**459,371**	**22,085,583**
Net book value:						
At 31 December 2017	6,598,095	58,187,475	78,300	50,391	6,491,873	71,406,134
At 31 December 2018	**6,838,489**	**57,727,975**	**63,857**	**45,176**	**6,136,145**	**70,811,642**

13 PROPERTY, PLANT AND EQUIPMENT (CONTINUED)

Notes:

(i) The Group's property, plants and buildings are all located in the PRC.

(ii) Property, plant and equipment held under finance leases

Certain properties and equipment of the Group with an aggregate net book value of RMB1,919,187,000 as at 31 December 2018 (31 December 2017:RMB2,166,746,000), are accounted for as finance leases, with total lease periods of 60 to 120 months.

Certain properties and equipment held under finance leases with an aggregate net book value of RMB1,142,035,000 as at 31 December 2018 (2017:RMB1,189,299,000), are pledged by the future electricity revenue of relevant wind power projects of the Group.

(iii) As at 31 December 2018, the Group is in the process of applying for or changing registration of the ownership certificates for certain of its properties. The directors are of the opinion that the Group is entitled to lawfully occupy or use these properties.

(iv) As at 31 December 2018, certain property, plant and equipment with net book value of RMB361,343,000 (31 December 2017: RMB381,254,000) have been pledged as securities for the long-term loans granted to a subsidiary of the Company.

(v) Certain of the Group's wind power plants located in areas with a decrease or slow-down in the growth rate of power consumption and curtailment in the purchase of wind power by grid companies recorded operating losses for the year ended 31 December 2018 and certain projects under construction in these areas have been delayed. Impairment assessments of relevant power assets as at 31 December 2018 were performed using value-in-use calculations with no further impairment recognised in 2018.

In addition, considering the local government development scheme in certain regions, the management assessed that the possibility of further development of relevant projects was remote and therefore these projects were fully impaired in 2018 except for certain equipment that are expected to be used in other projects, with the impairment losses amounting to RMB419,027,000 in total recognised in other operating expenses.

14 LEASE PREPAYMENTS

	2018	2017
	RMB'000	*RMB'000*
Cost:		
At 1 January	**396,808**	381,658
Additions	**54,662**	15,150
Disposals *(note)*	**(141,548)**	–
At 31 December	**309,922**	396,808
Accumulated amortisation:		
At 1 January	**39,637**	30,290
Amortisation for the year	**11,584**	9,347
Written back on disposal	**(10,321)**	–
At 31 December	**40,900**	39,637
Net book value:	**269,022**	357,171

Note: In 2018, the Group disposed land use right resulting in a loss on disposal of RMB1,410,000, which was recognised in other operating expenses.

Lease prepayments mainly represent prepayments for acquiring rights to use land, which is all located in the PRC, for own use properties with lease period of 20 to 50 years.

As at 31 December 2018, the Group is in the process of applying for registration of the ownership certificates for certain of its land use right. The directors are of the opinion that the Group is entitled to lawfully occupy or use these land.

15 INTANGIBLE ASSETS

	Concession assets RMB'000	Software and others RMB'000	Total RMB'000
Cost:			
At 1 January 2017	803,178	40,174	843,352
Additions	386	6,841	7,227
At 31 December 2017	803,564	47,015	850,579
At 1 January 2018	**803,564**	**47,015**	**850,579**
Additions	**236**	**8,272**	**8,508**
At 31 December 2018	**803,800**	**55,287**	**859,087**
Accumulated amortisation:			
At 1 January 2017	175,984	13,780	189,764
Charge for the year	32,074	7,724	39,798
At 31 December 2017	208,058	21,504	229,562
At 1 January 2018	**208,058**	**21,504**	**229,562**
Charge for the year	**32,044**	**8,523**	**40,567**
At 31 December 2018	**240,102**	**30,027**	**270,129**
Net book value:			
At 31 December 2017	595,506	25,511	621,017
At 31 December 2018	**563,698**	**25,260**	**588,958**

The Group entered into service concession agreements with local government (the "**Grantor**") in prior periods to construct and operate power plants for a concession period of 25 years. The Group is responsible for construction and maintenance of the power plants during the concession period. At the end of the concession period, the Group needs to dismantle the power plants or negotiate with the Grantor for a renewal of the service concession agreement. The Group has recognised intangible assets related to the service concession arrangements, representing the rights the Group receives to charge a fee for sales of electricity. The Group has not recognised service concession receivables as the Grantor will not provide the Group any guaranteed minimum payment for the operating period of the power plants.

The Group recognises the intangible assets at the fair value of the concession construction service as all the contracts related to the power plants construction are entered into at fair market value through public tender in open market. The concession assets are amortised over the operating period of the service concession projects.

(Expressed in RMB unless otherwise stated)

16 INVESTMENTS IN SUBSIDIARIES

As at 31 December 2018, the subsidiaries of the Company, all of which are unlisted limited liability companies, were listed as follows:

	Name of the company	Place of establishment	Registered capital	Percentage of attributable equity interest held by the Company	Principal activities
1	Huaneng Shantou Nan'ao Wind Power Company Limited 華能汕頭南澳風力發電有限公司 *(note (ii))*	the PRC	RMB23,000,000	60%	Wind power generation
2	Huaneng Shantou Wind Power Company Limited 華能汕頭風力發電有限公司 *(note (ii))*	the PRC	RMB194,190,000	50%	Wind power generation
3	HNEEP-CLP Changdao Wind Power Co., Ltd 華能中電長島風力發電有限公司 *(note (ii))*	the PRC	RMB99,072,000	55%	Wind power generation
4	HNNE-CLP Weihai Wind Power Company Limited 華能中電威海風力發電有限公司 *(note (ii))*	the PRC	RMB253,240,000	55%	Wind power generation
5	Huaneng Rongcheng Wind Power Company Limited 華能榮成風力發電有限公司	the PRC	RMB116,390,000	100%	Wind power generation
6	Huaneng Shouguang Wind Power Company Limited 華能壽光風力發電有限公司	the PRC	RMB186,730,000	55%	Wind power generation
7	Huaneng Changyi Wind Power Company Limited 華能昌邑風力發電有限公司	the PRC	RMB235,300,000	100%	Wind power generation
8	Huaneng Weifang Binhai Wind Power Company Limited 華能濰坊濱海風力發電有限公司	the PRC	RMB129,000,000	100%	Wind power generation
9	Huaneng Lijin Wind Power Company Limited 華能利津風力發電有限公司	the PRC	RMB90,400,000	100%	Wind power generation
10	Huaneng Dongying Hekou Wind Power Company Limited 華能東營河口風力發電有限公司	the PRC	RMB530,972,880	100%	Wind power generation
11	Huaneng Laoting Wind Power Company Limited 華能樂亭風力發電有限公司 *(note (ii))*	the PRC	RMB185,280,000	55%	Wind power generation

(Expressed in RMB unless otherwise stated)

16 INVESTMENTS IN SUBSIDIARIES (CONTINUED)

	Name of the company	Place of establishment	Registered capital	Percentage of attributable equity interest held by the Company	Principal activities
12	Huaneng Chengde Wind Power Company Limited 華能承德風力發電有限公司	the PRC	RMB318,000,000	100%	Wind power and solar power generation
13	Huaneng Hong Kong Electric Dali Wind Power Company Limited 華能港燈大理風力發電有限公司 *(note (ii))*	the PRC	RMB150,690,000	55%	Wind power generation
14	Huaneng Fuxin Wind Power Company Limited 華能阜新風力發電有限責任公司	the PRC	RMB1,684,420,000	100%	Wind power and solar power generation
15	Huaneng Panjin Wind Power Company Limited 華能盤錦風力發電有限公司	the PRC	RMB172,336,120	53%	Wind power generation
16	Huaneng Tongliao Wind Power Company Limited 華能通遼風力發電有限公司	the PRC	RMB17,225,540,000	100%	Wind power generation and relevant services
17	Huaneng Hulunbuir Wind Power Company Limited 華能呼倫貝爾風力發電有限公司 *(note (ii))*	the PRC	RMB100,000,000	51%	Wind power generation
18	Huaneng Baotou Wind Power Company Limited 華能包頭風力發電有限公司	the PRC	RMB582,627,500	100%	Wind power and solar power generation
19	Huaneng Huhhot Wind Power Company Limited 華能呼和浩特風力發電有限公司	the PRC	RMB484,441,300	100%	Wind power and solar power generation
20	Huaneng Yangjiang Wind Power Company Limited 華能陽江風力發電有限公司	the PRC	RMB260,548,600	100%	Wind power generation
21	Huaneng Jimo Wind Power Company Limited 華能即墨風力發電有限公司	the PRC	RMB80,520,000	100%	Wind power generation
22	Huaneng Xinjiang Santanghu Wind Power Company Limited 華能新疆三塘湖風力發電有限責任公司	the PRC	RMB447,704,500	100%	Wind power generation
23	Huaneng Weining Wind Power Company Limited 華能威寧風力發電有限公司	the PRC	RMB594,000,000	100%	Wind power generation

(Expressed in RMB unless otherwise stated)

16 INVESTMENTS IN SUBSIDIARIES (CONTINUED)

	Name of the company	Place of establishment	Registered capital	Percentage of attributable equity interest held by the Company	Principal activities
24	Huaneng New Energy Shanghai Power Company Limited 華能新能源上海發電有限公司	the PRC	RMB189,000,000	100%	Wind power generation
25	Huaneng Tieling Wind Power Company Limited 華能鐵嶺風力發電有限公司	the PRC	RMB155,500,000	75%	Wind power generation
26	Huaneng Tianzhen Wind Power Company Limited 華能天鎮風力發電有限公司	the PRC	RMB192,355,400	100%	Wind power and solar power generation
27	Huaneng Hezhang Wind Power Company Limited 華能赫章風力發電有限公司	the PRC	RMB292,500,000	100%	Wind power generation
28	Huaneng Tieling Daxing Wind Power Company Limited 華能鐵嶺大興風力發電有限公司	the PRC	RMB492,180,240	75%	Wind power generation
29	Huaneng Baicheng Wind Power Company Limited 華能白城風力發電有限公司 *(note (iv))*	the PRC	RMB579,870,000	100%	Wind power and solar power generation
30	Huaneng Yantai Wind Power Company Limited 華能煙台風力發電有限公司	the PRC	RMB120,000,000	100%	Wind power generation
31	Huaneng Dali Wind Power Company Limited 華能大理風力發電有限公司 *(note (iv))*	the PRC	RMB251,466,600	100%	Wind power and solar power generation
32	Huaneng Weifang Wind Power Company Limited 華能濰坊風力發電有限公司	the PRC	RMB303,190,300	100%	Wind power generation
33	Huaneng Gaizhou Wind Power Company Limited 華能蓋州風力發電有限公司	the PRC	RMB90,850,000	100%	Wind power generation
34	Huaneng Raoping Wind Power Company Limited 華能饒平風力發電有限公司	the PRC	RMB265,830,000	100%	Wind power generation
35	Huaneng Dingbian New Energy Power Company Limited 華能定邊新能源發電有限公司	the PRC	RMB683,948,600	100%	Wind power and solar power generation

(Expressed in RMB unless otherwise stated)

16 INVESTMENTS IN SUBSIDIARIES (CONTINUED)

	Name of the company	Place of establishment	Registered capital	Percentage of attributable equity interest held by the Company	Principal activities
36	Huaneng Chenbaerhuqi Wind Power Company Limited 華能陳巴爾虎旗風力發電有限公司	the PRC	RMB74,020,000	100%	Wind power generation
37	Huaneng Manzhouli Wind Power Company Limited 華能滿洲裡風力發電有限公司	the PRC	RMB91,480,000	100%	Wind power generation
38	Huaneng Zhanjiang Wind Power Company Limited 華能湛江風力發電有限公司	the PRC	RMB179,818,100	100%	Wind power generation
39	Huaneng Xinjiang Qinghe Wind Power Company Limited 華能新疆青河風力發電有限公司	the PRC	RMB185,260,000	100%	Wind power generation
40	Huaneng Nanhua Wind Power Company Limited 華能南華風力發電有限公司	the PRC	RMB152,440,800	100%	Wind power generation
41	Huaneng Zhaojue Wind Power Company Limited 華能昭覺風力發電有限公司	the PRC	RMB245,000,000	100%	Wind power generation
42	Huaneng Renewables (Hong Kong) Limited 華能新能源(香港)有限公司	Hong Kong	100,000 shares	100%	Investment management
43	Huaneng Tangshan Fengnan Wind Power Company Limited 華能唐山豐南風力發電有限公司	the PRC	RMB45,000,000	100%	Wind power generation
44	Huaneng Changning Wind Power Company Limited 華能昌寧風力發電有限公司	the PRC	RMB77,439,000	100%	Wind power generation
45	Huaneng Yishui Wind Power Company Limited 華能沂水風力發電有限公司	the PRC	RMB78,400,000	100%	Wind power generation
46	Huaneng Mingyang New Energy Investment Company Limited 華能明陽新能源投資有限公司	the PRC	RMB100,000,000	63%	Wind power generation
47	Huaneng Kunming Wind Power Company Limited 華能昆明風力發電有限公司	the PRC	RMB3,000,000	100%	Wind power generation

(Expressed in RMB unless otherwise stated)

16 INVESTMENTS IN SUBSIDIARIES (CONTINUED)

	Name of the company	Place of establishment	Registered capital	Percentage of attributable equity interest held by the Company	Principal activities
48	Huaneng Jinzhou Wind Power Company Limited 華能錦州風力發電有限公司	the PRC	RMB302,750,000	100%	Wind power generation
49	Huaneng Butuo Wind Power Company Limited 華能布拖風力發電有限公司	the PRC	RMB180,000,000	100%	Wind power generation
50	Huaneng Huailai Wind Power Company Limited 華能懷來風力發電有限公司	the PRC	RMB110,000,000	100%	Wind power generation
51	Huaneng Gansu Jinchang New Energy Power Company Limited 華能甘肅金昌新能源發電有限公司 *(note (iv))*	the PRC	RMB120,000,000	100%	Solar power generation
52	Huaneng Ningnan Wind Power Company Limited 華能寧南風力發電有限公司	the PRC	RMB150,000,000	100%	Wind power generation
53	Huaneng Qingtongxia New Energy Power Company Limited 華能青銅峽新能源發電有限公司	the PRC	RMB32,000,000	100%	Solar power generation
54	Huaneng Fuchuan Wind Power Company Limited 華能富川風力發電有限公司	the PRC	RMB296,250,000	100%	Wind power generation
55	Huaneng Gonghe Solar Power Company Limited 華能共和光伏發電有限公司	the PRC	RMB211,190,000	100%	Solar power generation
56	Huaneng Shanwei Wind Power Company Limited 華能汕尾風力發電有限公司	the PRC	RMB115,000,000	100%	Wind power generation
57	Huaneng Yunhe Wind Power Company Limited 華能雲和風力發電有限公司	the PRC	RMB47,000,000	100%	Wind power and solar Power generation
58	Huaneng New Energy Panzhou Wind Power Company Limited 華能新能源盤州市風力發電有限公司	the PRC	RMB208,000,000	100%	Wind power generation
59	Huaneng Ge'ermu Photovoltaic Power Generation Company Limited 華能格爾木光伏發電有限公司	the PRC	RMB295,118,100	100%	Solar power generation

(Expressed in RMB unless otherwise stated)

16 INVESTMENTS IN SUBSIDIARIES (CONTINUED)

	Name of the company	Place of establishment	Registered capital	Percentage of attributable equity interest held by the Company	Principal activities
60	Huaneng Chifeng New Energy Company Limited 華能赤峰新能源有限公司	the PRC	RMB516,160,000	100%	Wind power generation
61	Huaneng New Energy Shilin Photovoltaic Power Company Limited 華能新能源石林光伏發電有限公司	the PRC	RMB10,000,000	100%	Solar power generation
62	Huaneng Zhenglanqi New Energy Power Company Limited 華能正藍旗新能源發電有限公司	the PRC	RMB55,000,000	100%	Wind power and solar power generation
63	Huaneng Siziwangqi New Energy Power Company Limited 華能四子王旗新能源發電有限公司	the PRC	RMB38,000,000	100%	Wind power and solar power generation
64	Huaneng Qinhuangdao Wind Power Company Limited 華能秦皇島風力發電有限公司	the PRC	RMB20,000,000	100%	Wind power generation
65	Huaneng Kumul Photovoltaic Power Generation Company Limited 華能哈密光伏發電有限公司	the PRC	RMB58,000,000	100%	Solar power generation
66	Huaneng Wulatezhongqi New Energy Power Company Limited 華能烏拉特中旗新能源發電有限公司 *(note (iv))*	the PRC	RMB278,497,900	100%	Wind power and solar power generation
67	Huaneng Burqin Wind Power Company Limited 華能布爾津風力發電有限公司	the PRC	RMB10,000,000	100%	Wind power generation
68	Huaneng Qingyuan Wind Power Company Limited 華能慶元風力發電有限公司	the PRC	RMB71,000,000	100%	Wind power generation
69	Huaneng Pingyi Wind Power Company Limited 華能平邑風力發電有限公司	the PRC	RMB20,000,000	100%	Wind power and solar power generation
70	Huaneng Xiongfei (Beijing) New Energy Power Company Limited 華能雄飛(北京)新能源有限公司	the PRC	RMB8,000,000	51%	Solar power generation

(Expressed in RMB unless otherwise stated)

16 INVESTMENTS IN SUBSIDIARIES (CONTINUED)

	Name of the company	Place of establishment	Registered capital	Percentage of attributable equity interest held by the Company	Principal activities
71	Huaneng Zhalaiteqi Solar Power Company Limited 華能紮賚特旗太陽能光伏發電有限公司	the PRC	RMB444,488,000	100%	Wind power and solar power generation
72	Huaneng Jinyun New Energy Power Company Limited 華能縉雲新能源發電有限公司	the PRC	RMB20,000,000	100%	Wind power generation
73	Huaneng Muli Wind Power Company Limited 華能木裡風力發電有限公司	the PRC	RMB20,000,000	100%	Wind power generation
74	Huaneng Jishangweichang Manchu Mongolian Autonomous County Wind Power Company Limited 華能吉上圍場滿族蒙古族自治縣風力發電有限公司	the PRC	RMB20,000,000	100%	Wind power generation
75	Huaneng Haixing Wind Power Company Limited 華能海興風力發電有限公司	the PRC	RMB60,000,000	100%	Wind power generation
76	Huaneng Huoshan New Energy Power Company Limited 華能霍山新能源發電有限公司	the PRC	RMB10,000,000	100%	Wind power generation
77	Huaneng Xifeng Wind Power Company Limited 華能息烽風力發電有限公司	the PRC	RMB20,000,000	100%	Wind power generation
78	Huaneng Yijun New Energy Power Company Limited 華能宜君新能源發電有限公司	the PRC	RMB100,000	100%	Wind power generation
79	Huaneng (Fujian Liancheng) New Energy Company Limited 華能(福建連城)新能源有限公司	the PRC	RMB20,000,000	100%	Wind power generation
80	Huaneng Qinglong Wind Power Company Limited 華能青龍風力發電有限公司	the PRC	RMB20,000,000	100%	Wind power generation
81	Huaneng Abagaqi New Energy Power Company Limited 華能阿巴嘎旗新能源發電有限公司	the PRC	RMB100,000	100%	Wind power generation
82	Huaneng Butuo Photovoltaic Agriculture Power Company Limited 華能布拖光伏農業发電有限公司	the PRC	RMB100,000	51%	Solar power generation

(Expressed in RMB unless otherwise stated)

16 INVESTMENTS IN SUBSIDIARIES (CONTINUED)

	Name of the company	Place of establishment	Registered capital	Percentage of attributable equity interest held by the Company	Principal activities
83	Huaneng New Energy Huilongxu Power Company Limited 華能新能源回龍圩發電有限公司	the PRC	RMB100,000	100%	Wind power generation
84	Huaneng Wugang New Energy Power Company Limited 華能舞鋼新能源發電有限公司	the PRC	RMB1,630,180	100%	Solar power generation
85	Huaneng New Energy Xiangxiang Wind Power Company Limited 華能新能源湘鄉風力發電有限公司	the PRC	RMB20,000,000	100%	Wind power generation
86	Huaneng Wushanxian New Energy Company Limited 華能巫山縣新能源有限公司	the PRC	RMB100,000	100%	Wind power generation
87	Huaneng Zhangbei Wind Power Company Limited 華能張北風力發電有限公司	the PRC	RMB20,000,000	100%	Wind power generation
88	Huaneng Laiyuan Wind Power Company Limited 華能淶源風力發電有限公司	the PRC	RMB20,000,000	100%	Wind power generation
89	Huaneng Wuchuanxian Photovoltaic Power Company Limited 華能武川縣光伏发電有限公司	the PRC	RMB100,000	100%	Solar power generation
90	Huaneng Wulateqianqi Photovoltaic Power Company Limited 華能烏拉特前旗光伏发電有限公司	the PRC	RMB100,000	100%	Solar power generation
91	Huaneng Lanling Wind Power Company Limited 華能蘭陵風力發電有限公司 *(note (iii))*	the PRC	RMB60,000,000	100%	Wind power generation
92	Huaneng Xinzhou New Energy Power Company Limited 華能忻州新能源發電有限公司 *(notes (iii) and (iv))*	the PRC	RMB1,025,124,000	100%	Wind power and solar power generation
93	Huaneng Liangshanzhou New Energy Power Company Limited 華能涼山州新能源發電有限公司 *(notes (iii) and (iv))*	the PRC	RMB302,750,000	100%	Wind power generation
94	Huaneng Fuyu New Energy Power Company Limited 華能富裕新能源發電有限公司 *(note (iii))*	the PRC	RMB100,000	100%	Wind power generation

16 INVESTMENTS IN SUBSIDIARIES (CONTINUED)

Notes:

(i) The English translation of the names is for reference only, except for the subsidiary incorporated in Hong Kong. The official names of these entities are in Chinese.

(ii) The Company directly owns the most equity interests in these companies but the voting power attached to the equity interests does not allow the Company to have the power to govern the financial and operating activities of these companies according to the articles of association of these companies. The Company is the largest equity owner of these companies and no other equity owners individually or in aggregate had the power to control these companies according to the articles of association. Historically, the Company controlled the operation of these entities by appointing senior management, approving annual budget and determining the remuneration of employees etc. The Company had signed the concert party agreements with certain equity owners of these companies, whereby such equity owners have agreed to vote the same as the Company. Such equity owners have also confirmed that the voting in unison with the Company existed since the establishment of these entities. The PRC lawyer of the Company confirmed that the concert party agreements are valid under relevant PRC laws. Considering above mentioned factors, the directors are of the opinion that the Company controlled these entities during the years presented. Therefore the financial statements of these companies are consolidated by the Company during the years presented.

(iii) These companies were newly established in 2018.

(iv) In 2018, to simplify the structure of the Group, certain wholly-owned subsidiaries of the Group were merged by these subsidiaries.

16 INVESTMENTS IN SUBSIDIARIES (CONTINUED)

The following table lists out the information relation to the subsidiaries of the Group which have material non-controlling interest ("**NCI**"). The summarised financial information presented below presents the amounts before any inter-company elimination.

	Huaneng Shantou Wind Power Company Limited		HNNE-CLP Weihai Wind Power Company Limited		Huaneng Panjin Wind Power Company Limited		Huaneng Laoting Wind Power Company Limited		Huaneng Hong Kong Electric Dali Wind Power Company Limited	
	2018	2017	**2018**	2017	**2018**	2017	**2018**	2017	**2018**	2017
	RMB'000	*RMB'000*	***RMB'000***	*RMB'000*	***RMB'000***	*RMB'000*	***RMB'000***	*RMB'000*	***RMB'000***	*RMB'000*
NCI percentage	**50%**	50%	**45%**	45%	**47%**	47%	**45%**	45%	**45%**	45%
Current assets	**25,082**	29,065	**58,114**	46,609	**48,264**	34,361	**46,794**	40,655	**36,442**	37,301
Non-current assets	**315,248**	333,724	**400,087**	434,327	**321,665**	345,492	**300,426**	322,692	**240,897**	260,255
Current liabilities	**(85,418)**	(64,716)	**(142,707)**	(134,876)	**(107,829)**	(76,293)	**(49,594)**	(45,526)	**(64,545)**	(60,841)
Non-current liabilities	**(30,717)**	(58,351)	**(38,714)**	(70,002)	**(89,720)**	(116,640)	**(93,083)**	(117,064)	**(32,445)**	(54,805)
Net assets	**224,195**	239,722	**276,780**	276,058	**172,380**	186,920	**204,543**	200,757	**180,349**	181,910
Carrying amount of NCI	**112,098**	119,861	**124,551**	124,226	**81,484**	88,318	**92,044**	90,341	**81,157**	81,860
Revenue	**66,890**	77,532	**71,088**	70,848	**46,847**	48,850	**51,353**	46,426	**44,119**	45,096
Profit and total comprehensive income for the year	**14,984**	30,694	**19,200**	18,277	**(990)**	13,549	**11,625**	7,841	**12,140**	13,710
Profit allocated to NCI	**7,492**	15,347	**8,640**	8,225	**(465)**	6,368	**5,231**	3,528	**5,463**	6,170
Dividends paid to NCI	**25,093**	11,072	**416**	678	**517**	7,200	**3,528**	5,042	**12,131**	12,158
Cash flows from operating activities	**47,732**	60,161	**32,124**	43,486	**22,423**	27,949	**26,960**	27,421	**17,908**	32,072
Cash flows from investing activities	**(8,975)**	(2,951)	**(3,121)**	(698)	**(1,206)**	(2,583)	**(2,740)**	(2,187)	**(2,216)**	(691)
Cash flows from financing activities	**(40,808)**	(53,419)	**(37,985)**	(31,792)	**(17,808)**	(28,388)	**(29,192)**	(16,364)	**(32,691)**	(20,013)

17 INTEREST IN ASSOCIATES

	2018 RMB'000	2017 RMB'000
Interest in associates	**135,194**	178,956

The following list contains only the particulars of associates, all of which are unlisted corporate entities whose quoted market price are not available:

Name of associates	Place of establishment	Particulars of registered/ subscribed capital	Proportion of ownership interest: Group's effective interest	Proportion of ownership interest: Held by the Company	Principal activities
Shanghai Lingang Offshore Wind Power Company Limited ("Shanghai Lingang", 上海臨港海上風力發電有限公司)	the PRC	RMB351,810,000	46%	46%	Development of offshore wind power projects
Tianjin HIWLR-Taikang Equity Investment Fund Centre (Limited Partnership) ("HIWLR-Taikang", 天津華景泰康股權投資基金中心 (有限合夥)) *(note)*	the PRC	*Note*	19.94%	19.94%	Investment of renewables projects
Jilin Zhanyu Wind Power Assets Management Co., Ltd. ("Jilin Zhanyu", 吉林省瞻榆風電資產經營管理有限公司)	the PRC	RMB713,800,000	12.86%	12.86%	Management of wind power equipment

Note:

HIWLR-Taikang is the partnership established by the Company, Taikang Life Insurance Co., Ltd., Tianjin Huaxu Renewables Technology Development Co., Ltd. and Tianjin HIWLR Ruichi Enterprise Management Consulting Partnership (Limited Partnership) in 2017. HIWLR-Taikang is the operating entity of the first tranche of HIWLR-Taikang Renewables Development Fund amounting to RMB2,006,000,000. The Company subscribed for RMB400,000,000 as one of the limited partners, representing approximately 19.94% of the amount. As at 31 December 2018, the balance of investment cost in HIWLR-Taikang was RMB23,112,000 (2017: RMB60,818,000).

All of the above associates are accounted for using the equity method in the consolidated financial statements.

17 INTEREST IN ASSOCIATES (CONTINUED)

Summarised financial information of the associates reconciled to the carrying amounts in the consolidated financial statements, are disclosed as below:

	Shanghai Lingang		HIWLR-Taikang		Jilin Zhanyu	
	2018	2017	**2018**	2017	**2018**	2017
	RMB'000	*RMB'000*	***RMB'000***	*RMB'000*	***RMB'000***	*RMB'000*
Current assets	**600,647**	370,549	**121,848**	319,999	**35,420**	53,848
Non-current assets	**1,993,433**	1,460,048	**–**	–	**450,420**	480,981
Current liabilities	**(530,129)**	(479,743)	**(5,940)**	(15,151)	**(15,048)**	(16,952)
Non-current liabilities	**(1,686,592)**	(1,077,490)	**–**	–	**–**	–
Equity	**377,359**	273,364	**115,908**	304,848	**470,792**	517,877
Included in the above assets and liabilities:						
Cash and cash equivalents	**211,409**	112,268	**888**	6,018	**28,801**	33,510
Revenue	**–**	–	**13,713**	–	**12,708**	13,957
Gain/(loss) for the year	**–**	–	**2,966**	–	**(47,085)**	(23,993)
Other comprehensive income	**–**	–	**–**	–	**–**	–
Total comprehensive income	**–**	–	**2,966**	–	**(47,085)**	(23,993)
Dividends received from associates	**–**	–	**3,678**	–	**–**	–
Reconciled to the Group's interest in the associates						
Gross amounts of the net assets	**377,359**	273,364	**115,908**	304,848	**470,792**	517,877
Add: Capital injection committed by other partner/shareholders	**–**	–	**–**	155	**171,972**	171,972
Less: Capital injection from the controlling shareholder in advance	**313,395**	209,400	**–**	–	**–**	–
	63,964	63,964	**115,908**	305,003	**642,764**	689,849
The Group's effective interest	**46%**	46%	**19.94%**	19.94%	**12.86%**	12.86%
The Group's share of the net assets	**29,423**	29,423	**23,112**	60,818	**82,659**	88,715
Carrying amount in the consolidated financial statements	**29,423**	29,423	**23,112**	60,818	**82,659**	88,715

18 INTEREST IN A JOINT VENTURE

	2018 *RMB'000*	2017 *RMB'000*
Interest in a joint venture	**66,109**	74,940

The investment in a joint venture represented the 50% equity interests in Beijing Hua Heng Hai Hui Oceanic Energy Co., Ltd. (北京華恒海惠海洋能有限責任公司) with a registered capital of RMB170,200,000. It was established in the PRC in 2011 and is mainly engaged in the development of oceanic energy.

According to the articles of association of the investee, the decisions about its relevant activities require the unanimous consent of the Company and the other equity owner. The parties sharing control have rights to the net assets of the arrangement.

Summarised financial information of the joint venture reconciled to the carrying amounts in the consolidated financial statements, is disclosed as below:

	2018 *RMB'000*	2017 *RMB'000*
Current assets	**43,580**	50,606
Non-current assets	**130,067**	133,960
Current liabilities	**(3,524)**	(4,686)
Non-current liabilities	**(37,906)**	(30,000)
Equity	**132,217**	149,880
Included in the above assets and liabilities:		
Cash and cash equivalents	**25,196**	20,669
Revenue	**–**	–
Loss for the year	**(17,663)**	(3,826)
Other comprehensive income	**–**	–
Total comprehensive income	**(17,663)**	(3,826)
Reconciled to the Group's interest in the joint venture		
Gross amounts of the net assets	**132,217**	149,880
The Group's effective interest	**50%**	50%
The Group's share of the net assets	**66,109**	74,940
Carrying amount in the consolidated financial statements	**66,109**	74,940

19 OTHER NON-CURRENT ASSETS

	Note	31 December 2018 RMB'000	1 January 2018 RMB'000	31 December 2017 RMB'000
Equity investments designated at FVOCI (non-recycling)	*(i), (ii)*			
– Equity securities listed in Hong Kong		**211,414**	285,221	–
– Equity investments in non-listed companies		**833,021**	478,354	–
Available-for-sale financial assets	*(ii)*			
– Equity securities listed in Hong Kong, measured at fair value		**–**	–	285,221
– Equity investments in non-listed companies, measured at cost		**–**	–	449,617
Deductible VAT	*(iii)*	**968,656**	1,510,258	1,510,258
Deposits and advances to third parties	*(iv)*	**44,947**	53,632	53,632
Other long-term assets		**158,630**	167,964	167,964
		2,216,668	2,495,429	2,466,692

19 OTHER NON-CURRENT ASSETS (CONTINUED)

Notes:

(i) The following list contains the equity investments in non-listed entities as of 31 December 2018, all of which are corporate entities and established in the PRC.

	Name of the company	Particulars of registered capital *RMB'000*	Percentage of attributable equity interest	Principal activities
1	China Huaneng Finance Corporation Ltd. ("Huaneng Finance", 中國華能財務有限責任公司)	5,000,000	1%	Financial services
2	Neimeng Huhhot Hydro-Power Generation Co., Ltd. (內蒙古呼和浩特抽水蓄能發電有限責任公司)	1,500,000	6.49%	Hydro-power generation utilizing pumped storage technology
3	Huaneng Carbon Asset Management Co., Ltd. ("Huaneng Carbon", 華能碳資產經營有限公司)	250,000	10%	Management and investment of carbon assets
4	Huaneng Tiancheng Financial Leasing Co., Ltd. ("Huaneng Tiancheng", 華能天成融資租賃有限公司)	4,050,000	10%	Financial leasing and leasing related services

The Group designated the investments in non-listed companies and investments in equity securities listed in Hong Kong at FVOCI (non-recycling), as the investments are held for strategic purposes. Dividends of RMB28,402,000 on these investments were received in 2018 (2017: RMB24,716,000) (see note 6).

As at 31 December 2018, the balance of investment cost in Huaneng Finance, Huaneng Carbon and Huaneng Tiancheng were RMB51,225,000, RMB25,000,000 and RMB411,000,000 (2017: RMB51,225,000, RMB25,000,000 and RMB276,000,000) respectively.

(ii) Available-for-sale financial assets were reclassified to equity investments designated at FVOCI (non-recycling) upon the initial application of IFRS 9 at 1 January 2018 (see note 2 (c)(i)).

(iii) Deductible VAT mainly represents the input VAT relating to purchase of property, plant and equipment, which is deductible from output VAT. Those expected to be deducted within one year is presented in prepayments and other current assets (see note 21).

(iv) The deposits and advances to third parties are unsecured and interest free.

20 TRADE DEBTORS AND BILLS RECEIVABLE

	2018	2017
	RMB'000	*RMB'000*
Amounts due from third parties	**9,968,186**	7,214,032
Less: allowance for doubtful debts	**–**	–
	9,968,186	7,214,032

(a) The ageing analysis of trade debtors and bills receivable of the Group based on due date is as follows:

	2018	2017
	RMB'000	*RMB'000*
Current	**9,968,186**	7,214,032
Past due	**–**	–
	9,968,186	7,214,032
Less: allowance for doubtful debts	**–**	–
	9,968,186	7,214,032

The Group's trade receivables are mainly wind power electricity sales receivables from local grid companies. Generally, the receivables are due within 15 days to 30 days from the date of billing, except for the tariff premium, representing 31% to 96% of total electricity sales, collected by certain power projects. The collection of such tariff premium is subject to the allocation of funds by relevant government authorities to local grid companies, which therefore takes a relatively long time for settlement.

20 TRADE DEBTORS AND BILLS RECEIVABLE (CONTINUED)

(a) The ageing analysis of trade debtors and bills receivable of the Group based on due date is as follows: (continued)

Pursuant to CaiJian [2012] No.102 Notice on the Interim Measures for Administration of Subsidy Funds for Tariff Premium of Renewable Energy (可再生能源電價附加補助資金管理暫行辦法) jointly issued by the Ministry of Finance, the National Development and Reform Commission and the National Energy Administration in March 2012, a set of standardised procedures for the settlement of the tariff premium has come into force since 2012 and approvals on a project by project basis are required before the allocation of funds to local grid companies. As at 31 December 2018, most of the operating projects have been approved for the tariff premium and certain projects are in the process of applying for the approval. The directors of the Company are of the opinion that the approvals will be obtained in due course and the tariff premium receivables are fully recoverable considering that there are no bad debt experiences with the grid companies in the past and the tariff premium is funded by the PRC government.

Trade receivables that were neither past due nor impaired mainly represented the electricity sales receivable from local grid companies for whom there was no recent history of default.

All trade debtors and bills receivable are expected to be recovered within one year.

(b) As disclosed in note 6 (ii), the Group transferred certain accounts receivables with carrying amounts of RMB490,052,000 to Huaneng Group and received the relevant consideration of RMB490,052,000 in December 2018. According to the Transfer Agreement, upon the completion of the transfer, the ownership of the relevant accounts receivables shall be transferred to Huaneng Group which will assume all the risks and rewards of the accounts receivables transferred. The Group derecognised these accounts receivables in December 2018 as a result.

21 PREPAYMENTS AND OTHER CURRENT ASSETS

	2018 *RMB'000*	2017 *RMB'000*
Government grant receivable	**29,132**	49,076
Amounts due from fellow subsidiaries	**15,876**	27,662
Staff advance	**4,994**	4,918
Deposits *(note)*	**27,173**	33,441
Prepayments to		
– Fellow subsidiaries	**463**	454
– Third parties	**8,791**	6,903
Deductible VAT *(note 19(iii))*	**856,486**	1,240,625
Others	**127,214**	33,259
	1,070,129	1,396,338
Less: allowance for doubtful debts	**818**	818
	1,069,311	1,395,520

Note: Deposits mainly represented deposits placed with local authorities for developing wind power and construction. The deposits will be released to the Group during certain development stage or by the completion of the power plants construction.

22 CASH AT BANK AND ON HAND AND OTHER CASH FLOW INFORMATION

(a) Cash at bank and on hand comprise:

	2018 *RMB'000*	2017 *RMB'000*
Cash on hand	**80**	49
Cash at bank and other financial institutions	**3,414,592**	2,502,614
	3,414,672	2,502,663
Representing:		
– Cash and cash equivalents	**3,380,622**	2,502,663
– Time deposits with original maturity over three months	**34,050**	–
	3,414,672	2,502,663

22 CASH AT BANK AND ON HAND AND OTHER CASH FLOW INFORMATION (CONTINUED)

(b) Reconciliation of liabilities arising from financing activities

The table below details changes in the Group's liabilities from financing activities, including both cash and non-cash changes. Liabilities arising from financing activities are liabilities for which cash flows were, or future cash flows will be, classified in the Group's consolidated cash flow statement as cash flows from financing activities.

	Borrowings	Obligations under finance leases	Interest payable	Dividends payable	Total
	RMB'000	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*
	(note 23)	*(note 24)*	*(note 25)*	*(note 25)*	
At 1 January 2018	49,804,086	1,583,339	118,892	80,921	51,587,238
Changes from financing cash flows:					
Proceeds from borrowings	36,383,654	–	–	–	36,383,654
Repayment of borrowings	(35,960,729)	–	–	–	(35,960,729)
Payment of finance lease obligations	–	(480,494)	(1,152)	–	(481,646)
Interest paid	–	–	(2,257,228)	–	(2,257,228)
Dividends of subsidiaries paid to non-controlling interests	–	–	–	(46,674)	(46,674)
Dividends paid to equity shareholders of the Company	–	–	–	(454,361)	(454,361)
Others	(5,184)	–	–	–	(5,184)
Total changes from financing cash flows	417,741	(480,494)	(2,258,380)	(501,035)	(2,822,168)
Other changes:					
Interest expenses *(note 6)*	3,410	61,634	2,129,361	–	2,194,405
Capitalised interest expenses *(note 6)*	–	10,058	115,380	–	125,438
Dividends of subsidiaries to non-controlling interests	–	–	–	77,190	77,190
Dividends to equity shareholders of the Company	–	–	–	454,361	454,361
Input VAT under finance leases	–	32,530	–	–	32,530
Others	–	(4,845)	–	–	(4,845)
Total other changes	3,410	99,377	2,244,741	531,551	2,879,079
At 31 December 2018	50,225,237	1,202,222	105,253	111,437	51,644,149

23 BORROWINGS

(a) The long-term interest-bearing borrowings comprise:

	2018	2017
	RMB'000	*RMB'000*
Bank loans		
– Secured	**6,147,151**	6,542,361
– Unsecured	**24,692,259**	24,650,117
Loan from a fellow subsidiary (unsecured)	**490,000**	500,000
Other borrowings *(note 23(e))*		
– Unsecured	**1,139,317**	1,139,057
	32,468,727	32,831,535
Less: Current portion of long-term borrowings		
– Bank loans	**3,857,829**	3,380,210
	28,610,898	29,451,325

(b) The short-term interest-bearing borrowings comprise:

	2018	2017
	RMB'000	*RMB'000*
Bank loans (unsecured)	**12,760,000**	14,960,000
Loan from a fellow subsidiary (unsecured)	**–**	14,007
Other borrowings *(note 23(e))*		
– Unsecured	**4,996,510**	1,998,544
Current portion of long-term borrowings		
– Bank loans	**3,857,829**	3,380,210
	21,614,339	20,352,761

23 BORROWINGS (CONTINUED)

(c) The effective interest rates per annum on borrowings are as follows:

	2018	2017
Long-term (including current portion)		
Bank loans	**4.31%~4.90%**	4.31%~4.90%
Loan from a fellow subsidiary	**4.41%**	4.41%
Other borrowings *(note 23(e))*	**2.98%**	2.98%
Short-term (excluding current portion of long-term borrowings)		
Bank loans	**3.92%~4.35%**	3.92%~4.35%
Loan from a fellow subsidiary	**n/a**	4.66%
Other borrowings *(note 23(e))*	**3.06%~3.62%**	4.50%,4.70%

(d) The long-term borrowings (including current portion) are repayable as follows:

	2018 *RMB'000*	2017 *RMB'000*
Within 1 year or on demand	**3,857,829**	3,380,210
After 1 year but within 2 years	**3,854,786**	3,618,195
After 2 years but within 5 years	**11,756,502**	10,510,134
After 5 years	**12,999,610**	15,322,996
	32,468,727	32,831,535

23 BORROWINGS (CONTINUED)

(e) Significant terms of other borrowings:

	2018	2017
	RMB'000	*RMB'000*
Long-term		
Corporate bonds *(note (i))*	**1,139,317**	1,139,057
Short-term		
Super short-term debentures *(note (ii))*	**4,996,510**	1,998,544

Notes:

(i) On 11 July 2016, the Company issued a five-year unsecured green corporate bond of RMB1,140 million at par with a coupon rate of 2.95% per annum. The effective interest rate of the bond is 2.98% per annum.

(ii) On 12 October 2018, the Company issued an unsecured super short-term debenture of RMB1,000 million at par with a maturity period of 180 days with the issuing interest rate of 3.30% per annum. The effective interest rate is 3.62% per annum.

On 31 October 2018, the Company issued an unsecured super short-term debenture of RMB1,000 million at par with a maturity period of 270 days with the issuing interest rate of 3.45% per annum. The effective interest rate is 3.61% per annum.

On 31 October 2018, the Company issued an unsecured super short-term debenture of RMB1,000 million at par with a maturity period of 180 days with the issuing interest rate of 3.30% per annum. The effective interest rate is 3.62% per annum.

On 28 November 2018, the Company issued an unsecured super short-term debenture of RMB1,000 million at par with a maturity period of 90 days with the issuing interest rate of 2.90% per annum. The effective interest rate is 3.06% per annum.

On 18 December 2018, the Company issued an unsecured super short-term debenture of RMB1,000 million at par with a maturity period of 90 days with the issuing interest rate of 3.10% per annum. The effective interest rate is 3.32% per annum.

24 OBLIGATIONS UNDER FINANCE LEASES

The Group had obligations under finance leases repayable as follows:

	2018		2017	
	Present value of the minimum lease payments	**Total minimum lease payments**	Present value of the minimum lease payments	Total minimum lease payments
	RMB'000	***RMB'000***	*RMB'000*	*RMB'000*
Within 1 year	**471,916**	**522,784**	352,441	419,677
After 1 year but within 2 years	**261,561**	**292,282**	500,592	556,042
After 2 years but within 5 years	**406,774**	**443,769**	560,405	621,697
After 5 years	**61,971**	**63,326**	169,901	177,680
	730,306	**799,377**	1,230,898	1,355,419
	1,202,222	**1,322,161**	1,583,339	1,775,096
Less: total future interest expense		**119,939**		191,757
Present value of finance lease obligations		**1,202,222**		1,583,339

As at 31 December 2018, the balance of obligations under finance lease with Huaneng Tiancheng was RMB187,931,000 (31 December 2017: RMB232,478,000).

At inception, the lease periods of the finance lease obligation is approximately 5 to 10 years. The principal obligations and interest expenses are to be paid at least annually within the lease period.

25 OTHER PAYABLES

	2018 *RMB'000*	2017 *RMB'000*
Payables for acquisition of property, plant and equipment and intangible assets	**3,490,165**	3,094,733
Retention payable *(note (i))*	**2,154,214**	2,026,029
Bills payable	**548,712**	632,141
Dividends payable	**111,437**	80,921
Amounts due to fellow subsidiaries *(note (ii))*	**92,852**	51,308
Payables for staff related costs	**63,899**	47,794
Payables for other taxes	**139,339**	92,883
Interest payable		
– Fellow subsidiaries	**672**	6,399
– Others	**104,581**	112,493
Other accruals and payables	**111,010**	108,341
	6,816,881	6,253,042

Notes:

(i) Retention payable represents the retention payables due to equipment suppliers and construction contractors which will be settled in accordance with contracted terms during or upon the expiry of the warranty period.

(ii) Amounts due to fellow subsidiaries are all unsecured and interest-free.

All of the other payables are expected to be settled within one year or are repayable on demand.

26 INCOME TAX IN THE CONSOLIDATED STATEMENT OF FINANCIAL POSITION

(a) Tax payable/(recoverable) in the consolidated statement of financial position represents:

	2018	2017
	RMB'000	*RMB'000*
Net tax payable at 1 January	**105,769**	71,770
Provision for the year *(note 8(a))*	**551,277**	348,357
Under/(over)-provision for prior years *(note 8(a))*	**15,301**	(2,068)
Income tax paid	**(577,668)**	(319,345)
Income tax refunded	**14,725**	7,055
Net tax payable at 31 December	**109,404**	105,769
Representing:		
Tax payable	**127,829**	127,821
Tax recoverable	**(18,425)**	(22,052)
	109,404	105,769

(b) Deferred tax assets and liabilities recognised:

The components of deferred tax assets/(liabilities) recognised in the consolidated statement of financial position and the movements during the years are as follows:

Deferred tax assets arising from:	**Trial operation income**	**Others**	**Total**
	RMB'000	*RMB'000*	*RMB'000*
At 1 January 2017	3,092	223	3,315
Charged to profit or loss	(1,409)	–	(1,409)
At 31 December 2017	1,683	223	1,906
At 1 January 2018	**1,683**	**223**	**1,906**
Charged to profit or loss	**(259)**	**–**	**(259)**
At 31 December 2018	**1,424**	**223**	**1,647**

26 INCOME TAX IN THE CONSOLIDATED STATEMENT OF FINANCIAL POSITION (CONTINUED)

(b) Deferred tax assets and liabilities recognised: (continued)

Deferred tax liabilities arising from:	Depreciation of fixed assets and amortisation of concession assets *RMB'000*
At 1 January 2017	(19,626)
Credited to profit or loss	1,355
At 31 December 2017	(18,271)
At 1 January 2018	**(18,271)**
Credited to profit or loss	**113**
At 31 December 2018	**(18,158)**

(c) Deferred tax assets not recognised

In accordance with the accounting policy set out in note 2 (s), as at 31 December 2018, the Group did not recognise deferred tax assets on accumulated tax losses of RMB1,652,612,000 (31 December 2017: RMB2,015,915,000), temporary differences related to impairment provision of property, plant and equipment and other non-current assets of RMB666,088,000 (31 December 2017: RMB244,572,000) and tax credits in relation to purchase of certain environmental protection equipment (note 8 (b)(ii)) of RMB18,904,000 (31 December 2017: RMB61,730,000) as the directors considered it is not probable that sufficient future taxable profits will be available to allow the tax losses, temporary differences and tax credits to be utilised in relevant entities. The tax losses that will expire in the years ending 31 December 2019, 2020, 2021,2022 and 2023 are RMB425,275,000, RMB368,475,000, RMB377,012,000, RMB454,881,000 and RMB26,969,000 respectively.

27 DEFERRED INCOME

	2018	2017
	RMB'000	*RMB'000*
At 1 January	**198,069**	215,238
Credited to profit or loss	**(17,169)**	(17,169)
At 31 December	**180,900**	198,069

Deferred income of the Group mainly represents VAT refund granted by the government relating to the purchase of domestic equipment and subsidies relating to the construction of property, plant and equipment, which would be recognised in other income on a straight-line basis over the expected useful life of the relevant assets.

28 OTHER NON-CURRENT LIABILITIES

Other non-current liabilities primarily including retention payables due to equipment suppliers and construction contractors which is not expected to be settled within one year.

29 CAPITAL, RESERVES AND DIVIDENDS

(a) Movements in components of equity

The reconciliation between the opening and closing balances of each component of the Group's consolidated equity is set out in the consolidated statement of changes in equity. Details of the changes in the Company's individual components of equity between the beginning and the end of the year are set out below:

	Share capital	Capital reserve	Statutory surplus reserve	Fair value reserve (non-recycling)	Retained earnings	Total equity
	RMB'000	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*	*RMB'000*
At 1 January 2017	9,727,996	2,629,406	232,438	–	1,283,593	13,873,433
Changes in equity for 2017:						
Total comprehensive income for the year	–	–	–	–	4,074,134	4,074,134
Issuance of new shares, netting of issuance expenses *(note 29(c))*	838,536	1,070,272	–	–	–	1,908,808
Transfer to reserve fund	–	–	404,347	–	(404,347)	–
Dividends to equity shareholders of the Company *(note 29(b))*	–	–	–	–	(433,228)	(433,228)
At 31 December 2017 *(note)*	10,566,532	3,699,678	636,785	–	4,520,152	19,423,147
Impact of initial application of IFRS 9	–	–	–	21,544	–	21,544
At 1 January 2018	10,566,532	3,699,678	636,785	21,544	4,520,152	19,444,691
Changes in equity for 2018:						
Total comprehensive income for the year	–	–	–	145,285	3,066,094	3,211,379
Transfer to reserve fund	–	–	305,121	–	(305,121)	–
Dividends to equity shareholders of the Company *(note 29(b))*	–	–	–	–	(454,361)	(454,361)
At 31 December 2018	10,566,532	3,699,678	941,906	166,829	6,826,764	22,201,709

Note: The Group, including the Company, has initially applied IFRS 15 and IFRS 9 at 1 January 2018. Under the transition methods chosen, comparative information is not restated. See note 2 (c).

(Expressed in RMB unless otherwise stated)

29 CAPITAL, RESERVES AND DIVIDENDS (CONTINUED)

(b) Dividends

(i) Dividends payable to equity shareholders of the Company attributable to the year

	2018 *RMB*	2017 *RMB*
Final dividend proposed after the end of the reporting period of RMB0.044 per share (2017: RMB0.043)	**464,927,416**	454,360,884

The Board resolved on 18 March 2019 that RMB0.044 per share is to be distributed to the equity shareholders for 2018, subject to approval of the equity shareholders at the coming annual general meeting. The final dividend proposed after the end of the reporting period has not been recognised as a liability at the end of the reporting period.

(ii) Dividends payable to equity shareholders of the Company attributable to the previous financial year, approved and paid during the year

	2018 *RMB*	2017 *RMB*
Final dividend in respect of the financial year ended 31 December 2017, approved during the year, of RMB0.043 per share (year ended 31 December 2016: RMB0.041 per share)	**454,360,884**	433,227,820

29 CAPITAL, RESERVES AND DIVIDENDS (CONTINUED)

(c) Share capital

	The Group and the Company	
	2018	2017
	RMB'000	*RMB'000*
Issued and fully paid		
5,535,311,200 domestic state-owned ordinary shares of RMB1.00 each	**5,535,311**	5,535,311
5,031,220,992 H shares of RMB1.00 each	**5,031,221**	5,031,221
	10,566,532	10,566,532

On 18 May 2017, the Company issued 838,536,000 H shares with a par value of RMB1.00, at a price of HK$2.61 per H share. The proceeds of RMB838,536,000 representing the par value, were credited to the Company's share capital. The remaining proceeds of RMB1,070,272,000 (after net of issuance expenses) were credited to the capital reserve account.

All equity shareholders are entitled to receive dividends as declared from time to time and are entitled to one vote per share at meetings of the Company. All shares rank equally with regard to the Company's residual assets.

(d) Nature and purpose of reserves

(i) Capital reserve

Capital reserve includes share premium and other capital reserve.

Share premium represents the difference between the total amount of the par value of shares issued and the amount of the net proceeds received.

Other capital reserve mainly represents the difference between the total amount of the nominal value of shares issued and the amount of the net assets and cash injected by the promoters upon the establishment of the Company.

29 CAPITAL, RESERVES AND DIVIDENDS (CONTINUED)

(d) Nature and purpose of reserves (continued)

(ii) Statutory surplus reserve

According to the Company's Article of Association, the Company is required to transfer 10% of its net profit as determined in accordance with the China Accounting Standard for Business Enterprises to its statutory surplus reserve until the reserve balance reaches 50% of the registered capital. The transfer to this reserve must be made before distribution of a dividend to equity shareholders. This reserve fund can be utilised in setting off accumulated losses or increasing capital of the Company and is non-distributable other than in liquidation.

(iii) Exchange reserve

The Exchange reserve comprises all foreign exchange differences arising from the translation of the financial statements of foreign operations that have functional currency other than the RMB. The reserve is dealt with in accordance with the accounting policies as set out in note 2 (v).

(iv) Fair value reserve (recycling)

Prior to 1 January 2018, this reserve included the cumulative net change in the fair value of available-for-sale equity securities held at the end of the reporting period in accordance with IAS 39. This amount has been reclassified to fair value reserve (non-recycling) upon the initial adoption of IFRS 9 at 1 January 2018 (see note 2 (c)(i)).

(v) Fair value reserve (non-recycling)

The fair value reserve (non-recycling) comprises the cumulative net change in the fair value of equity investments designated at FVOCI under IFRS 9 that are held at the end of the reporting period (see note 2 (g)).

(e) Capital management

The Group's primary objectives when managing capital are to safeguard the Group's ability to continue as a going concern, so that it can continue to provide returns for equity shareholders and benefits for other stakeholders.

The Group actively and regularly reviews and manages its capital structure to maintain a balance between the higher equity shareholders returns that might be possible with higher levels of borrowings and the advantages and security afforded by a sound capital position, and makes adjustments to the capital structure in light of changes in economic conditions.

29 CAPITAL, RESERVES AND DIVIDENDS (CONTINUED)

(e) Capital management (continued)

The Group monitors its capital structure on the basis of liability-to-asset ratio, which is calculated by dividing total liabilities by total assets. The liability-to-asset ratio of the Group as at 31 December 2018 is 68% (2017: 71%).

There were no changes in the Group's approach to capital management compared with previous years. Neither the Company nor any of its subsidiaries are subject to externally imposed capital requirements.

30 FINANCIAL RISK MANAGEMENT AND FAIR VALUES OF FINANCIAL INSTRUMENTS

Exposure to credit, liquidity, interest rate and currency risks arises in the normal course of the Group's business.

The Group's exposure to these risks and the financial risk management policies and practices used by the Group to manage these risks are described below.

(a) Credit risk

Credit risk refers to the risk that a counterparty will default on its contractual obligations resulting in a financial loss to the Group. The Group's credit risk is primarily attributable to trade debtors and bills receivable, prepayments and other current financial assets and other non-current financial assets. Substantially all of the Group's cash and cash equivalents are deposited in the stated owned/controlled PRC banks which the directors assessed the credit risk to be insignificant.

Except for the financial guarantees given by the Company to the subsidiaries as set out in note 32, the Group does not provide any other guarantees which would expose the Group to credit risk. The maximum exposure to credit risk in respect of these financial guarantees at the end of the reporting period is disclosed in note 32.

The receivables from sales of electricity mainly represent receivables from the provincial power grid companies. The Group has no significant credit risk with any of these power grid companies as the Company and its subsidiaries maintain long-term and stable business relationships with these companies. The receivables from the provincial power grid companies accounted for 99.1% of the Group's total trade debtors as at 31 December 2018 (31 December 2017: 99.0%).

The Group's other receivables mainly consist of amounts due from government, deposits and amounts due from fellow subsidiaries with no historical impairment losses as at 31 December 2018, and no significant expected credit losses are expected.

30 FINANCIAL RISK MANAGEMENT AND FAIR VALUES OF FINANCIAL INSTRUMENTS (CONTINUED)

(a) Credit risk (continued)

The Group measures loss allowances for trade receivables at an amount equal to lifetime ECLs, which is calculated using a provision matrix. As the Group's historical credit loss experience does not indicate significantly different loss patterns for different debtor segments, the loss allowance based on past due status is not further distinguished between the Group's different customer bases.

The Group's exposure to credit risk and ECLs for trade and other receivables is not material as at 31 December 2018.

Expected loss rates are based on actual loss experience over the past 3 years. These rates are adjusted to reflect differences between economic conditions during the period over which the historic data has been collected, current conditions and the Group's view of economic conditions over the expected lives of the receivables.

(b) Liquidity risk

The Group's objective is to ensure continuity of sufficient funding and flexibility by utilising a variety of bank and other borrowings with debt maturities spreading over a range of periods, thereby ensuring that the Group's outstanding borrowing obligation is not exposed to excessive repayment risk in any one year.

The Company is responsible for the Group's overall cash management and the raising of borrowings to cover expected cash demands. The Group's policy is to regularly monitor current and expected liquidity requirements to ensure that it maintains sufficient reserves of cash and adequate committed lines of funding from major financial institutions to meet its liquidity requirements in the short and longer term. In order to repay the borrowings due within one year, the Group negotiates banking facilities and utilises operating cash inflows in its subsidiaries. The Group manages the proportion of its current liabilities with respect to the total liabilities to mitigate the liquidity risk. The directors have determined that adequate liquidity exists to finance the working capital and capital expenditure requirements of the Group during the year.

30 FINANCIAL RISK MANAGEMENT AND FAIR VALUES OF FINANCIAL INSTRUMENTS (CONTINUED)

(b) Liquidity risk (continued)

The following tables show the remaining contractual maturities at the end of the reporting period date of the Group's non-derivative financial liabilities, which are based on contractual undiscounted cash flows (including interest payments computed using contractual rates or, if floating, based on rates current at the end of the reporting period) and the earliest date the Group and can be required to pay:

	Carrying amount *RMB'000*	**Contractual cash flows** *RMB'000*	**1 year or less** *RMB'000*	**1–2 years** *RMB'000*	**2–5 years** *RMB'000*	**More than 5 years** *RMB'000*
31 December 2018						
Long-term borrowings *(note 23(a))*	**28,610,898**	**35,224,103**	**1,228,725**	**5,056,527**	**14,293,285**	**14,645,566**
Short-term borrowings *(note 23(b))*	**21,614,339**	**22,125,440**	**22,125,440**	**–**	**–**	**–**
Obligations under finance leases *(note 24)*	**1,202,222**	**1,322,161**	**522,784**	**292,282**	**443,769**	**63,326**
Other non-current liabilities *(note 28)*	**1,884,337**	**1,884,337**	**–**	**613,058**	**1,079,533**	**191,746**
Other payables *(note 25)*	**6,816,881**	**6,816,881**	**6,816,881**	**–**	**–**	**–**
	60,128,677	**67,372,922**	**30,693,830**	**5,961,867**	**15,816,587**	**14,900,638**

	Carrying amount *RMB'000*	Contractual cash flows *RMB'000*	1 year or less *RMB'000*	1–2 years *RMB'000*	2–5 years *RMB'000*	More than 5 years *RMB'000*
31 December 2017						
Long-term borrowings *(note 23(a))*	29,451,325	36,627,461	1,280,944	4,980,957	13,765,330	16,600,230
Short-term borrowings *(note 23(b))*	20,352,761	20,897,795	20,897,795	–	–	–
Obligations under finance leases *(note 24)*	1,583,339	1,775,096	419,677	556,042	621,697	177,680
Other non-current liabilities *(note 28)*	2,919,563	2,919,563	–	1,026,009	1,683,772	209,782
Other payables *(note 25)*	6,253,042	6,253,042	6,253,042	–	–	–
	60,560,030	68,472,957	28,851,458	6,563,008	16,070,799	16,987,692

30 FINANCIAL RISK MANAGEMENT AND FAIR VALUES OF FINANCIAL INSTRUMENTS (CONTINUED)

(c) Interest rate risk

The Group's interest rate risk arises primarily from borrowings. Borrowings issued at variable rates expose the Group to cash flow interest rate risk.

The Group regularly reviews and monitors the mix of fixed and variable rate borrowings in order to manage its interest rate risks. During the years ended 31 December 2018 and 2017, however, management of the Group did not consider it necessary to use interest rate swaps to hedge their exposure to interest.

The following table details the profile of the Group's net borrowings (interest-bearing financial liabilities less interest-bearing financial assets) at the end of the reporting period. The detailed interest rates and maturity information of the Group's borrowings are disclosed in note 23.

	2018 *RMB'000*	2017 *RMB'000*
Net fixed rate borrowings:		
Borrowings	**9,635,827**	6,751,608
Less: Bank deposits (including restricted deposits)	**65,811**	34,077
	9,570,016	6,717,531
Net floating rate borrowings:		
Borrowings	**40,589,410**	43,052,478
Obligations under finance lease	**1,202,222**	1,583,339
Less: Bank deposits (including restricted deposits)	**3,416,352**	2,520,699
	38,375,280	42,115,118
Total net borrowings:	**47,945,296**	48,832,649

At 31 December 2018, it is estimated that a general increase/decrease of 100 basis points in interest rates of net floating borrowings, with all other variables held constant, would have decreased/increased the Group's profit after tax and retained profits by approximately RMB307,405,000 (31 December 2017: RMB357,772,000).

30 FINANCIAL RISK MANAGEMENT AND FAIR VALUES OF FINANCIAL INSTRUMENTS (CONTINUED)

(c) Interest rate risk (continued)

The sensitivity analysis above has been determined assuming that the change in interest rates had occurred at the end of the reporting period and had been applied to the exposure to interest rate risk for non-derivative financial instruments in existence at the end of the reporting period.

The estimated 100 basis points increase or decrease represents management's assessment of a reasonably possible change in interest rates over the period until the end of the next annual reporting period. The sensitivity analysis is performed on the same basis for 2017.

(d) Currency risk

The Group is exposed to currency risk primarily through sales and purchases which give rise to receivables, borrowings and cash balances that are denominated in a foreign currency other than RMB. The currencies giving rise to this risk are primarily Hong Kong dollars and Euros.

(i) Recognised assets and liabilities

Substantially all of the revenue-generating operations of the Group are transacted in RMB. The Company has certain proceeds from share issuance in Hong Kong dollar that have not converted into RMB which are expected to be utilised following the strategic arrangement of the Group.

On the other hand, RMB is not a freely convertible currency and the PRC government may at its discretion restrict access to foreign currencies for current account transactions in the future. Changes in the foreign exchange control system may prevent the Group from satisfying sufficient foreign currency demands and the Group may not be able to pay dividends in foreign currencies to its equity shareholders.

30 FINANCIAL RISK MANAGEMENT AND FAIR VALUES OF FINANCIAL INSTRUMENTS (CONTINUED)

(d) Currency risk (continued)

(ii) Exposure to currency risk

The following table details the Group's exposure at the end of the reporting period to currency risk arising from recognised assets or liabilities denominated in a currency other than the functional currency of the entity to which they relate. Differences resulting from the translation of the financial statements of foreign operations into the Group's presentation currency are excluded.

	Exposure to foreign currencies (expressed in RMB)			
	2018		2017	
	HK$	**EUR**	HK$	EUR
	RMB'000	***RMB'000***	*RMB'000*	*RMB'000*
Cash and cash equivalents	**3,768**	**1,754**	6,530	1,744
Other payables	**(2,352)**	**–**	(2,294)	–
Net exposure	**1,416**	**1,754**	4,236	1,744

The following table indicates the instantaneous change in the Group's profit after tax (and retained profits) and other components of consolidated equity that would arise if foreign exchange rates to which the Group has significant exposure at the end of the reporting period had changed at that date, assuming all other risk variables remained constant.

	2018		2017	
	Increase/ (decrease) in foreign exchange rates	**Effect on profit after tax and retained profits**	Increase/ (decrease) in foreign exchange rates	Effect on profit after tax and retained profits
		RMB'000		*RMB'000*
HK$	**5%**	**71**	5%	212
	(5)%	**(71)**	(5)%	(212)
EUR	**5%**	**88**	5%	87
	(5)%	**(88)**	(5)%	(87)

30 FINANCIAL RISK MANAGEMENT AND FAIR VALUES OF FINANCIAL INSTRUMENTS (CONTINUED)

(d) Currency risk (continued)

(ii) Exposure to currency risk (continued)

Results of the analysis as presented in the above table represent an aggregation of the instantaneous effects on each of the Group entities' profit after tax and equity measured in respective functional currencies, translated into RMB at the end of the reporting period for presentation purposes.

The sensitivity analysis assumes that the change in foreign exchange rates had been applied to re-measure those financial instruments held by the Group which expose the Group to foreign currency risk at the end of the reporting period, including inter-company payables and receivables within the Group which are denominated in a currency other than the functional currencies of the lender and the borrower. The analysis excludes differences that would result from the translation of the financial statements of foreign operations into the Group's presentation currency. The analysis is performed on the same basis for 2017.

(e) Fair values

Financial assets and liabilities measured at fair value

The following table presents the fair value of the Group's financial instruments measured at the end of the reporting period on a recurring basis, categorised into the three-level fair value hierarchy as defined in IFRS 13, Fair value measurement. The level into which a fair value measurement is classified is determined with reference to the observability and significance of the inputs used in the valuation technique as follows:

- Level 1 valuations: Fair value measured using only Level 1 inputs i.e. unadjusted quoted prices in active markets for identical assets or liabilities at the measurement date.

- Level 2 valuations: Fair value measured using Level 2 inputs i.e. observable inputs which fail to meet Level 1, and not using significant unobservable inputs. Unobservable inputs are inputs for which market data are not available.

- Level 3 valuations: Fair value measured using significant unobservable inputs.

30 FINANCIAL RISK MANAGEMENT AND FAIR VALUES OF FINANCIAL INSTRUMENTS (CONTINUED)

(e) Fair values (continued)

	Fair value at 31 December 2018	**Fair value measurements as at 31 December 2018 categorised into**	
		Level 1	**Level 3**
	RMB'000	***RMB'000***	***RMB'000***
Financial assets *(note 19)*:			
Equity investments in non-listed companies	**833,021**	**–**	**833,021**
Investment in equity securities listed in Hong Kong	**211,414**	**211,414**	**–**

	Fair value at 31 December 2017	Fair value measurements as at 31 December 2017 categorised into Level 1
	RMB'000	*RMB'000*
Financial assets *(note 19)*:		
Investment in equity securities listed in Hong Kong	285,221	285,221

As at 31 December 2017, the equity investments in non-listed companies are measured at cost and these investments have been reclassified to financial assets designated at FVOCI (non-recycling) and remeasured upon the adoption of IFRS 9 at 1 January 2018 (see note 2 (c)(i)).

During the year ended 31 December 2018, there were no transfers of financial instruments between level 1 and level 2, or transfers into or out of level 3.

As at 31 December 2018, the fair values of equity investments in non-listed companies are determined using the income approach with discounted cash flow method. The inputs of the valuation model mainly consist of the expected financial performance, period of expected performance and weighted average cost of capital. Discount rates ranging from 6.37% to 14.51% were used in the calculations of fair values under discounted cash flow model.

30 FINANCIAL RISK MANAGEMENT AND FAIR VALUES OF FINANCIAL INSTRUMENTS (CONTINUED)

(e) Fair values (continued)

The movement during the period in the balance of the Level 3 fair value measurements is as follows:

	2018 ***RMB'000***
Equity investments in non-listed companies:	
Balance at 31 December 2017	**–**
Adjustment on initial application of IFRS 9 *(note 2(c)(i))*	**478,354**
Adjusted balance at 1 January 2018	**478,354**
Additional investments	**135,000**
Changes in fair value recognised in other comprehensive income	**219,667**
Balance at 31 December 2018	**833,021**

From 1 January 2018, any gains or losses arising from the remeasurement of the Group's unlisted equity investments held for strategic purposes are recognised in the fair value reserve (non-recycling) in other comprehensive income. Upon disposal of the equity investments, the amount accumulated in other comprehensive income is transferred directly to retained earnings. Prior to 1 January 2018, any gains arising from the disposal of the unlisted equity investments were presented in the "Finance income" line item in the consolidated statement of comprehensive income.

(f) Fair values of financial assets and liabilities carried at other than fair value

The carrying amounts of the Group's financial instruments carried at cost or amortised cost primarily including receivables, payables and borrowings are not materially different from their fair values as at 31 December 2018 and 2017, which are estimated by discounting the future contractual cash flows at the current market interest rate that is available to the Group for similar financial instruments.

31 COMMITMENTS

(a) Capital commitments outstanding at the year end not provided for in the financial statements were as follows:

	2018	2017
	RMB'000	*RMB'000*
Contracted for	**5,380,470**	5,352,453
Authorised but not contracted for	**27,073,799**	32,529,510
	32,454,269	37,881,963

(b) At the year end, the total future minimum lease payments under non-cancellable operating leases are payable as follows:

	2018	2017
	RMB'000	*RMB'000*
Within 1 year	**21,403**	44,000
After 1 year but within 5 years	**3,831**	25,832
After 5 years	**809**	7,853
	26,043	77,685

The Group leases certain buildings through non-cancellable operating leases. These operating leases do not contain provisions for contingent lease rentals. None of the rental agreements contain escalation provisions that may require higher future rental payments.

32 CONTINGENCY

Financial guarantees issued

At 31 December 2018, the Company has issued certain guarantees to banks and other financial institutions in respect of bank loans and finance lease arrangement granted to the subsidiaries, amounting to RMB1,373,262,000 (31 December 2017: RMB1,782,999,000).

33 MATERIAL RELATED PARTY TRANSACTIONS

(a) Transactions with related parties

The Group is part of a larger group of companies under Huaneng Group and has significant transactions and relationships with the subsidiaries of Huaneng Group.

Apart from those disclosed elsewhere in the financial statements, the principal related party transactions which were carried out in the ordinary course of business are as follows:

	2018 *RMB'000*	2017 *RMB'000*
Non-exempted continuing connected transactions		
Service provided to		
Fellow subsidiaries	**1,185**	138
Purchase of product and equipment from		
Fellow subsidiaries	**13,608**	32,513
Service provided by		
Fellow subsidiaries *(note (ii))*	**174,652**	155,460
Net deposit in		
Huaneng Finance	**266,280**	1,058,588
Interest income		
Huaneng Finance	**26,000**	22,130
Net finance lease obligation repaid to		
Huaneng Tiancheng	**44,547**	46,154
Interest expense		
Huaneng Tiancheng	**12,464**	14,555
Sales of electricity to		
Fellow subsidiaries	**5,251**	4,450
Purchase of power generation rights from		
A fellow subsidiary	**–**	235
Sales of power generation rights to		
A fellow subsidiary	**–**	113

33 MATERIAL RELATED PARTY TRANSACTIONS (CONTINUED)

(a) Transactions with related parties (continued)

	2018	2017
	RMB'000	*RMB'000*
Non-exempted continuing connected transactions (continued)		
Transfer of trade receivables to		
Huaneng Group *(note 6(ii))*	**490,052**	–
Arrangement fee charged by		
Huaneng Group *(note 6(ii))*	**46,110**	–
Other connected transactions		
Purchase of power generation rights from		
Fellow subsidiaries	**2,295**	–
Service provided by		
Fellow subsidiaries	**411**	4,213
Increase/(Decrease) of investments in		
Huaneng Tiancheng	**135,000**	–
HIWLR-Taikang	**(37,706)**	60,818
Loans received from		
Fellow subsidiaries	**12,661,545**	15,548,251
Loans repaid to		
Fellow subsidiaries	**12,685,552**	15,321,000
Interest expense		
Fellow subsidiaries	**38,403**	36,680
Net working capital provided to/(repayment by)		
Fellow subsidiaries	**4,903**	(13)
Repayments of loan guaranteed by		
Huaneng Group	**–**	19,251
Transfer the upfront project cost		
A fellow subsidiary	**–**	18,991

33 MATERIAL RELATED PARTY TRANSACTIONS (CONTINUED)

(a) Transactions with related parties (continued)

Notes:

(i) The related party transactions listed above constitute connected transactions or continuing connected transactions as defined in Chapter 14A of the Rules Governing the Listing of Securities on HKSE (the "**Listing Rules**"). The detailed disclosures required by Chapter 14A of the Listing Rules are provided in the "Reports of the Board of Directors" section of the annual report for the year ended 31 December 2018.

(ii) Service provided by fellow subsidiaries mainly comprised property insurance services provided by Alltrust Insurance Company of China Limited (永誠財產保險股份有限公司), technical services and management support services provided by Xi'an Thermal Power Research Institute Co., Ltd. (西安熱工研究院有限公司), property lease services provided by Xinsheng Property Management Co., Ltd. (新升物業管理有限公司) and Shanghai Huayong Investment Development Co., Ltd. (上海華永投資發展有限公司) and technological research services provided by China Huaneng R&D Center Co., Ltd. (華能集團技術創新中心有限公司).

(b) Outstanding balances with related parties

The deposits placed with a fellow subsidiary, Huaneng Finance, amounted to RMB2,485,018,000 as at 31 December 2018 (2017: RMB2,218,738,000). Details of the other outstanding balances with related parties are set out in notes 17, 18, 19, 21, 23, 24 and 25.

(c) Transactions with other state-controlled entities in the PRC

The Group is a state-controlled entity and operates in an economic regime currently dominated by entities directly or indirectly owned or controlled by the PRC government and numerous government authorities and agencies (collectively referred to as "government-related entities").

Apart from transactions mentioned above, the Group conducts a majority of its business activities with government-related entities in the ordinary course of business. These transactions are carried out at terms similar to those that would be entered into with non-government-related entities. Transactions with other government-related entities included but are not limited to the following:

– Sales of electricity;

– Depositing and borrowing money;

– Purchase of materials and receiving construction work services; and

– Service concession arrangement.

33 MATERIAL RELATED PARTY TRANSACTIONS (CONTINUED)

(c) Transactions with other state-controlled entities in the PRC (continued)

The tariff of electricity is regulated by relevant government. The Group prices its other services and products based on commercial negotiations. The Group has also established its approval processes for sales of electricity, purchase of products and services and its financing policy for borrowing. Such approval processes and financing policy do not depend on whether the counterparties are government-related entities or not.

For the years ended 31 December 2018 and 2017, almost all revenue from the sales of electricity is made to the provincial power grid companies which are government-related entities. As at 31 December 2018 and 2017, substantially almost all the trade debtors and bills receivable are due from these power grid companies.

The Company and its subsidiaries maintained substantially all of the bank deposits in government-related financial institutions while lenders of substantially all of the Company and its subsidiaries' loans are also government-related financial institutions, associated with the respective interest income or interest expense incurred.

Other collectively significant transactions with government-related entities also included a large portion of equipment and materials purchases, and property, plant and equipment construction services received.

(d) Commitments with related parties

Commitments with related parties outstanding at the year end not provided for in the financial statements were as follows:

	2018 ***RMB'000***	2017 *RMB'000*
Services to be provided by related parties	**29,303**	76,631
Product and equipment to be provided by related parties	**23,838**	21,635
Investment commitment to HIWLR-Taikang	**339,182**	339,182

33 MATERIAL RELATED PARTY TRANSACTIONS (CONTINUED)

(e) Key management personnel remuneration

Remuneration for key management personnel, including amounts paid to the Company's directors as disclosed in note 9, and certain of the highest paid employees as disclosed in note 10, is as follows:

	2018 ***RMB'000***	2017 *RMB'000*
Salaries and other emoluments	**4,091**	3,628
Bonus	**5,148**	4,221
Retirement scheme contributions	**981**	855
	10,220	8,704

34 PARENT AND ULTIMATE HOLDING COMPANY

The directors of the Company consider its parent and ultimate holding company to be Huaneng Group, which is a state-owned company established in the PRC.

35 POSSIBLE IMPACT OF AMENDMENTS, NEW STANDARDS AND INTERPRETATIONS ISSUED BUT NOT YET EFFECTIVE FOR THE YEAR ENDED 31 DECEMBER 2018

Up to the date of issue of these financial statements, the IASB has issued a number of amendments, new standards and interpretations which are not yet effective for the year ended 31 December 2018 and which have not been adopted in these financial statements. These include the following which may be relevant to the Group.

	Effective for accounting periods beginning on or after
IFRS 16, *Leases*	1 January 2019
IFRIC 23, *Uncertainty over income tax treatments*	1 January 2019
Annual Improvements to IFRSs 2015-2017 Cycle	1 January 2019
Amendments to IAS 28, *Long-term interest in associates and joint ventures*	1 January 2019

35 POSSIBLE IMPACT OF AMENDMENTS, NEW STANDARDS AND INTERPRETATIONS ISSUED BUT NOT YET EFFECTIVE FOR THE YEAR ENDED 31 DECEMBER 2018 (CONTINUED)

The Group is in the process of making an assessment of what the impact of these amendments, new standards and interpretations is expected to be in the period of initial application. So far the Group has identified some aspects of IFRS 16 which may have a significant impact on the consolidated financial statements. Further details of the expected impacts are discussed below. While the assessment has been substantially completed for IFRS 16, the actual impact upon the initial adoption of this standard may differ as the assessment completed to date is based on the information currently available to the Group, and further impacts may be identified before the standard is initially applied in the Group's interim financial report for the six months ended 30 June 2019. The Group may also change its accounting policy elections, including the transition options, until the standard is initially applied in that financial report.

IFRS 16, Leases

As disclosed in note 2 (k), currently the Group classifies leases into finance leases and operating leases and accounts for the lease arrangements differently, depending on the classification of the lease. The Group enters into some leases as the lessor and others as the lessee.

IFRS 16 is not expected to impact significantly on the way that lessors account for their rights and obligations under a lease. However, once IFRS 16 is adopted, lessees will no longer distinguish between finance leases and operating leases. Instead, subject to practical expedients, lessees will account for all leases in a similar way to current finance lease accounting, i.e. at the commencement date of the lease the lessee will recognise and measure a lease liability at the present value of the minimum future lease payments and will recognise a corresponding "right-of-use" asset. After initial recognition of this asset and liability, the lessee will recognise interest expense accrued on the outstanding balance of the lease liability, and the depreciation of the right-of-use asset, instead of the current policy of recognising rental expenses incurred under operating leases on a systematic basis over the lease term. As a practical expedient, the lessee can elect not to apply this accounting model to short-term leases (i.e. where the lease term is 12 months or less) and to leases of low-value assets, in which case the rental expenses would continue to be recognised on a systematic basis over the lease term.

IFRS 16 will primarily affect the Group's accounting as a lessee of leases for properties, plant and equipment which are currently classified as operating leases. The application of the new accounting model is expected to lead to an increase in both assets and liabilities and to impact on the timing of the expense recognition in the consolidated statement of comprehensive income over the period of the lease.

35 POSSIBLE IMPACT OF AMENDMENTS, NEW STANDARDS AND INTERPRETATIONS ISSUED BUT NOT YET EFFECTIVE FOR THE YEAR ENDED 31 DECEMBER 2018 (CONTINUED)

IFRS 16, Leases (continued)

IFRS 16 is effective for annual periods beginning on or after 1 January 2019. As allowed by IFRS 16, the Group plans to use the practical expedient to grandfather the previous assessment of which existing arrangements are, or contain, leases. The Group will therefore apply the new definition of a lease in IFRS 16 only to contracts that are entered into on or after the date of initial application. In addition, the Group plans to elect the practical expedient for not applying the new accounting model to short-term leases and leases of low-value assets.

The Group plans to elect to use the modified retrospective approach for the adoption of IFRS 16 and will recognise the cumulative effect of initial application as an adjustment to the opening balance of equity at 1 January 2019 and will not restate the comparative information. As disclosed in note 31 (b), at 31 December 2018 the Group's future minimum lease payments under non-cancellable operating leases amount to RMB26,043,000 for properties, approximately RMB4,640,000 of which is payable beyond 1 year after the reporting date. Upon the initial adoption of IFRS 16, the opening balances of lease liabilities and the corresponding right-of-use assets will be adjusted respectively, after taking account the effects of discounting, as at 1 January 2019.

Other than the recognition of lease liabilities and right-of-use assets, the Group expects that the transition adjustments to be made upon the initial adoption of IFRS 16 will not be material. However, the expected changes in accounting policies as described above could have a material impact on the Group's financial statements from 2019 onwards.

36 COMPANY-LEVEL STATEMENT OF FINANCIAL POSITION

	2018 *RMB'000*	2017 *RMB'000*
Non-current assets		
Property, plant and equipment	**353,366**	410,701
Intangible assets	**8,023**	10,694
Investments in subsidiaries	**19,574,960**	18,179,642
Investment in associates	**147,278**	184,984
Investment in a joint venture	**85,100**	85,100
Other non-current assets	**13,009,864**	13,572,186
Total non-current assets	**33,178,591**	32,443,307
Current assets		
Prepayments and other current assets	**20,050,434**	18,476,801
Cash at bank and on hand	**1,850,422**	1,211,596
Total current assets	**21,900,856**	19,688,397
Current liabilities		
Borrowings	**19,536,445**	18,477,289
Other payables	**695,929**	876,679
Tax payable	**3,418**	3,418
Total current liabilities	**20,235,792**	19,357,386
Net current assets	**1,665,064**	331,011
Total assets less current liabilities	**34,843,655**	32,774,318

36 COMPANY-LEVEL STATEMENT OF FINANCIAL POSITION (CONTINUED)

	Note	2018 RMB'000	2017 RMB'000
Non-current liabilities			
Borrowings		**12,641,596**	13,350,771
Deferred income		**350**	400
Total non-current liabilities		**12,641,946**	13,351,171
NET ASSETS		**22,201,709**	19,423,147
CAPITAL AND RESERVES	*29*		
Share capital		**10,566,532**	10,566,532
Reserves		**11,635,177**	8,856,615
TOTAL EQUITY		**22,201,709**	19,423,147

Approved and authorised for issue by the board of directors on 18 March 2019.

Name: Lin Gang
Position: *Chairman*

Name: Wen Minggang
Position: *Director*

Corporate Information

REGISTERED OFFICE

10-11th Floor
No. 23A Fuxing Road
Haidian District, Beijing
The PRC

HEAD OFFICE IN THE PRC

10-11th Floor
No. 23A Fuxing Road
Haidian District, Beijing
The PRC

PRINCIPAL PLACE OF BUSINESS IN HONG KONG

31st Floor, Tower 2, Times Square
1 Matheson Street
Causeway Bay
Hong Kong

COMPANY'S WEBSITE

www.hnr.com.cn

COMPANY SECRETARY

Ms. ZHU Tao

AUTHORIZED REPRESENTATIVES

Mr. CAO Shiguang
Mr. WEN Minggang

EXECUTIVE DIRECTORS

Mr. LIN Gang (Chairman)
Mr. CAO Shiguang (President)
Mr. WEN Minggang

NON-EXECUTIVE DIRECTORS

Mr. WANG Kui
Mr. DAI Xinmin
Mr. ZHANG Qi(1)
Mr. ZHAI JI

INDEPENDENT NON-EXECUTIVE DIRECTORS

Mr. QIN Haiyan
Ms. DAI Huizhu
Mr. ZHOU Shaopeng
Mr. WAN Kam To

SUPERVISORS

Mr. HUANG Jian
Mr. WANG Huanliang
Ms. ZHONG Suzhi

AUDIT COMMITTEE

Mr. ZHOU Shaopeng (Chairman)
Mr. WAN Kam To
Mr. WANG Kui

(1) On 12 March 2019, Mr. ZHANG Qi resigned as the non-executive director of the Company due to retirement.

NOMINATION COMMITTEE

Mr. LIN Gang (Chairman)
Mr. ZHOU Shaopeng
Mr. QIN Haiyan

REMUNERATION COMMITTEE

Mr. QIN Haiyan (Chairman)
Ms. DAI Huizhu
Mr. CAO Shiguang

PRC LEGAL ADVISERS

DeHeng Law Offices
12/F, Tower B, Focus Place
19 Finance Street, Beijing
The PRC

AUDITOR

KPMG
Certified Public Accountants
8th Floor, Prince's Building
10 Chater Road, Central
Hong Kong

KPMG Huazhen LLP
8th Floor, KPMG Tower Oriental Plaza
No.1 East Chang An Avenue, Beijing
The PRC

H SHARE REGISTRAR

Computershare Hong Kong Investor Services Limited
Shops 1712-1716, 17th Floor, Hopewell Centre
183 Queen's Road East, Wanchai
Hong Kong

PRINCIPAL BANKERS

China Development Bank Corporation
No. 29 Fuchengmenwai Street
Xicheng District, Beijing
The PRC

China Construction Bank Corporation
No. 25 Finance Street
Beijing
The PRC

Industrial and Commercial Bank of China Limited
No. 55 Fuxingmennei Street
Xicheng District, Beijing
The PRC

Glossary of Technical Terms

"gross power generation"	total power generated by a power plant in a specific period of time, including its electricity consumption and electricity generated during the construction and testing period
"GWh"	unit of energy, gigawatt-hour. 1 GWh = 1 million kWh. GWh is typically used as a measure for the annual energy production of large power plants
"installed capacity"	the capacity of power generation units or wind turbines that have been completely assembled or erected in the case of wind power. For wind power, installed capacity includes the capacity of wind turbines in testing period
"kWh"	unit of energy, kilowatt-hour. The standard unit of energy typically used in the electric power industry. One kilowatt-hour is the amount of energy that would be produced by a generator producing one thousand watts for one hour
"MW"	unit of power, megawatt. 1 MW = 1,000 kW, MW is typically used to measure installed capacity of power plants
"MWh"	unit of energy, megawatt-hour. 1 MWh = 1,000 kWh
"renewable energy"	energy generated from sustainable energy sources that are regenerative or, for all practical purposes, cannot be depleted
"weighted average utilization hours"	the consolidated gross power generation less the electricity generated during the construction and testing period in a specified period divided by the weighted average consolidated operational capacity in the same period

華能新能源股份有限公司
Huaneng Renewables Corporation Limited *