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CGN Power Co., Ltd.*

中國廣核電力股份有限公司

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

(Stock Code: 1816)

**ANNUAL RESULTS ANNOUNCEMENT
FOR THE YEAR ENDED DECEMBER 31, 2018**

FINANCIAL HIGHLIGHTS

For the year ended December 31, 2018:

- Operating revenue of the Group was approximately RMB50,827,919,000, representing an increase of 11.4% over last year (restated).
- Net profit attributable to shareholders of the parent company was approximately RMB8,702,633,000, representing a decrease of 9.0% over last year (restated).
- Net profit attributable to shareholders of the parent company (excluding the effects of non-recurring gains or losses) was approximately RMB8,609,513,000, representing an increase of 8.0% over last year (restated).
- The Board recommended a payment of final cash dividend of RMB0.072 (inclusive of tax) per share.

Note: On February 26, 2019, the Board announced the Company would disclose its financial reports (including the annual results and related financial information disclosed and set out in this announcement) in accordance with the China Accounting Standards for Business Enterprises (“CASBE”) and relevant requirements with immediate effect.

* *For identification purpose only*

The board of directors (the “**Board**”) of CGN Power Co., Ltd. (the “**Company**”, “**we**” or “**us**”) hereby announces the consolidated operating results of the Company and its subsidiaries (the “**Group**”) for the year ended December 31, 2018 (the “**Reporting Period**”) together with the comparative figures for the year 2017. The financial information of the Group for the year ended December 31, 2018 shown in this results announcement is based on the audited consolidated financial statements prepared in accordance with the CASBE and the disclosure requirements of the Hong Kong Companies Ordinance (Chapter 622 of the Laws of Hong Kong) (“**Hong Kong Companies Ordinance**”).

According to the Consultation Conclusions on Acceptance of Mainland Accounting and Auditing Standards and Mainland Audit Firms for Mainland Incorporated Companies Listed in Hong Kong (《有關接受在香港上市的內地註冊成立公司採用內地的會計及審計準則以及聘用內地會計師事務所的諮詢總結》) published by The Stock Exchange of Hong Kong Limited (the “**Stock Exchange**”) in December 2010, the issuers incorporated in the People’s Republic of China (the “**PRC**”) and listed in Hong Kong are allowed to prepare their financial statements in accordance with the CASBE, and the accounting firms in the PRC approved by the Ministry of Finance and the China Securities Regulatory Commission (the “**CSRC**”) are allowed to audit these financial statements in accordance with the China Standards on Auditing (the “**Arrangement**”).

In view of the Arrangement and the continuing convergence between the CASBE and the International Financial Reporting Standards issued by the International Accounting Standards Board, and in order to facilitate the application process with the CSRC in relation to the proposed A Share Offering of the Company, to align the financial information disclosure of the Company in both markets as well as to improve the efficiency and reduce the cost of disclosure, the Board has passed a resolution on February 26, 2019 to make disclosure of financial information of the Company based on the financial statements which are prepared under the CASBE (the “**Alignment in Disclosure of Accounting Standards**”) pursuant to the Articles of Association of the Company and the applicable PRC laws and regulations. From the date of approval by the Board, the Company will disclose its financial reports (including the annual results and related financial information disclosed in this announcement) in accordance with the CASBE and relevant requirements. For details, please refer to the announcement of the Company published on the website of the Stock Exchange on February 26, 2019.

FINANCIAL INFORMATION

The financial information set out below in this announcement is extracted from the Company's 2018 Annual Report (the "2018 Annual Report"). Such financial information has been reviewed by the audit and risk management committee of the Company, approved by the Board and has been agreed by Deloitte Touche Tohmatsu Certified Public Accountants LLP, the external auditor of the Company. The consolidated financial statements of the Company for the year 2018 prepared in accordance with CASBE has been audited by the external auditor of the Company with unqualified audit opinion being issued.

Consolidated Income Statement

For the year ended December 31, 2018

(Expressed in RMB)

	NOTES	2018	2017 (Restated)
I. Operating revenue	4	50,827,919,184.43	45,633,453,920.64
Less: Operating costs	4	28,503,854,609.56	25,185,044,094.56
Taxes and surcharges		632,770,128.93	627,556,194.70
Selling expenses		102,120,591.17	92,234,493.13
Administrative expenses		2,362,898,123.90	2,282,682,092.32
Research and development expenses		1,019,825,909.61	773,886,060.89
Finance costs	5	6,000,868,773.69	6,106,623,054.60
Including: Interest expenses		5,943,755,683.21	6,104,789,952.20
Interest income		254,816,814.36	206,879,219.46
Asset impairment losses	6	107,189,032.49	385,197,778.65
Credit impairment losses	7	(223,491,277.23)	N/A
Add: Other gains	8	1,563,140,899.78	1,513,456,994.20
Investment income	9	1,044,558,662.97	2,312,138,173.13
Including: Income from investment in associates and joint ventures	9	1,029,509,833.39	602,635,840.38
Gains from changes in fair value		16,076,115.36	207,443,679.60
Gains/Losses from disposal of assets		106,649.90	(6,236,182.25)
II. Operating profit		14,945,765,620.32	14,207,032,816.47
Add: Non-operating income		7,639,433.82	4,290,905.13
Less: Non-operating expenses		53,929,295.75	43,064,331.77
III. Total profit		14,899,475,758.39	14,168,259,389.83
Less: Income tax expenses	10	1,217,798,428.26	1,444,071,829.16

	NOTES	2018	2017 (Restated)
IV. Net profit		13,681,677,330.13	12,724,187,560.67
(I) Classified by continuity of operations			
1. Net profit from continuing operations		13,681,677,330.13	12,724,187,560.67
2. Net profit from discontinued operations		—	—
(II) Classified by ownership			
1. Net profit attributable to shareholders of the parent company		8,702,632,650.82	9,564,092,697.56
2. Non-controlling interests		4,979,044,679.31	3,160,094,863.11
V. Other comprehensive income, net of tax		225,716,697.62	(546,518,290.50)
Other comprehensive income attributable to shareholders of the parent company, net of tax		154,367,152.58	(439,187,291.66)
(I) Other comprehensive income that will not be reclassified to profit or loss		(58,991,366.47)	(3,182,500.00)
1. Change arising from remeasurement of defined benefit plan		(880,250.00)	(3,182,500.00)
2. Other comprehensive income that cannot be transferred to profit or loss under the equity method		66,639,133.53	—
3. Change in fair value of investment in other equity instruments		(124,750,250.00)	N/A
(II) Other comprehensive income that may be reclassified to profit or loss		213,358,519.05	(436,004,791.66)
1. Other comprehensive income that can be transferred to profit or loss under the equity method		(788,366.06)	(114,301,295.16)
2. Translation differences arising from translation of foreign currency financial statements		214,146,885.11	(321,703,496.50)
Other comprehensive income attributable to non-controlling interests, net of tax		71,349,545.04	(107,330,998.84)
VI. Total comprehensive income		13,907,394,027.75	12,177,669,270.17
Total comprehensive income attributable to shareholders of the parent company		8,856,999,803.40	9,124,905,405.90
Total comprehensive income attributable to non-controlling interests		5,050,394,224.35	3,052,763,864.27
VIII. Earnings per share			
(I) Basic earnings per share	11	0.191	0.210
(II) Diluted earnings per share	11	N/A	N/A

Consolidated Balance Sheet

As at December 31, 2018

(Expressed in RMB)

	NOTES	December 31, 2018	January 1, 2018 (Restated)	December 31, 2017 (Restated)
Current assets				
Cash at bank and in hand		15,207,936,762.52	12,386,827,010.72	12,386,827,010.72
Derivative financial assets		4,753,642.10	1,486,635.64	1,486,635.64
Bills receivable and accounts receivable	12	6,649,380,976.65	6,448,248,256.22	6,455,449,463.32
Prepayments		5,128,948,753.87	5,956,944,721.06	5,956,944,721.06
Other receivables		907,577,214.54	1,532,214,773.38	1,532,214,773.38
Inventories		21,372,255,356.38	19,738,836,983.09	26,558,036,864.75
Contract assets		3,409,787,026.47	3,341,739,828.96	N/A
Non-current assets due within one year		3,659,033.86	1,248,496.91	1,248,496.91
Other current assets		2,703,617,527.46	3,012,443,166.92	3,012,443,166.92
Total current assets		55,387,916,293.85	52,419,989,872.90	55,904,651,132.70
Non-current assets				
Available-for-sale financial assets		N/A	N/A	195,310,350.00
Long-term equity investments		10,203,023,176.92	8,494,770,583.53	8,363,631,040.45
Other investment in equity instruments		422,689,500.00	509,184,500.00	N/A
Other non-current financial assets		812,257.18	1,857,052.64	N/A
Investment properties		210,346,041.36	239,670,411.82	239,670,411.82
Fixed assets		210,850,206,582.15	159,147,244,593.48	159,147,244,593.48
Construction in progress		74,624,722,113.05	115,285,710,535.35	115,285,710,535.35
Intangible assets		4,719,796,447.25	4,581,473,985.13	4,581,473,985.13
Development costs		1,962,455,756.90	1,645,279,271.67	1,645,279,271.67
Goodwill		419,242,673.32	419,242,673.32	419,242,673.32
Long-term deferred expenses		1,734,658,492.05	1,938,904,964.08	1,938,904,964.08
Deferred tax assets		1,774,868,398.17	1,587,266,716.35	1,587,266,716.35
Other non-current assets		6,244,932,628.08	7,990,314,033.25	7,992,171,085.89
Total non-current assets		313,167,754,066.43	301,840,919,320.62	301,395,905,627.54
Total assets		368,555,670,360.28	354,260,909,193.52	357,300,556,760.24

	NOTES	December 31, 2018	January 1, 2018 (Restated)	December 31, 2017 (Restated)
Current liabilities				
Short-term loans	13	16,296,240,042.13	19,392,821,406.87	19,392,821,406.87
Derivative financial liabilities		2,724,971.67	29,930,116.11	29,930,116.11
Bills payable and accounts payable	14	18,247,064,570.09	17,344,673,545.04	17,344,673,545.04
Receipts in advance		2,058,361.07	—	5,104,185,934.33
Contract liabilities		835,799,748.43	1,619,524,674.53	N/A
Employee benefits payable		42,616,433.80	37,010,301.56	37,010,301.56
Taxes payable		1,431,294,200.96	1,174,163,665.64	1,174,163,665.64
Other payables		4,507,638,498.41	5,046,292,288.85	5,046,292,288.85
Non-current liabilities due within one year	15	18,295,109,240.17	11,075,406,593.09	11,075,406,593.09
Other current liabilities		964,545,364.41	1,221,690,823.91	1,221,690,823.91
Total current liabilities		60,625,091,431.14	56,941,513,415.60	60,426,174,675.40
Non-current liabilities				
Long-term loans	16	179,639,946,139.80	183,512,482,979.08	183,512,482,979.08
Bonds payable	17	8,488,044,399.25	6,995,866,518.52	6,995,866,518.52
Long-term employee benefits payable		102,267,273.40	65,988,743.31	65,988,743.31
Provisions	18	4,001,531,754.01	3,244,865,740.27	3,244,865,740.27
Deferred income		1,395,854,838.75	995,286,142.41	995,286,142.41
Deferred tax liabilities		1,177,284,416.72	1,207,762,861.44	1,160,681,738.94
Total non-current liabilities		194,804,928,821.93	196,022,252,985.03	195,975,171,862.53
Total liabilities		255,430,020,253.07	252,963,766,400.63	256,401,346,537.93
Shareholders' equity				
Share capital	19	45,448,750,000.00	45,448,750,000.00	45,448,750,000.00
Capital reserve		3,350,519,181.82	3,314,215,773.99	3,314,215,773.99
Other comprehensive income		699,854,140.51	743,265,664.54	403,233,865.89
Specific reserve		197,139,693.40	131,413,773.45	131,413,773.45
Surplus reserve		3,341,495,665.44	2,712,326,934.84	2,712,326,934.84
Retained earnings		18,077,156,831.53	12,896,430,805.68	12,838,530,033.75
Total equity attributable to				
shareholders of the parent company		71,114,915,512.70	65,246,402,952.50	64,848,470,381.92
Non-controlling interests		42,010,734,594.51	36,050,739,840.39	36,050,739,840.39
Total shareholders' equity		113,125,650,107.21	101,297,142,792.89	100,899,210,222.31
Total liabilities and shareholders' equity		368,555,670,360.28	354,260,909,193.52	357,300,556,760.24

Notes to the consolidated financial statements

For the year ended December 31, 2018

1. COMPANY OVERVIEW

The Company was established in the PRC on March 25, 2014 (the date of establishment) as a joint stock company with limited liability under the Company Law of the PRC, and its shares have been listed on the Main Board of the Stock Exchange on December 10, 2014.

The parent and the ultimate holding company of the Company is China General Nuclear Power Corporation (“CGNPC”), a state-owned enterprise in the PRC controlled by the State-Owned Assets Supervision and Administration Commission of the State Council.

The scope of business of the Group mainly includes: production and supply of electricity and heat generated mainly from nuclear energy, and provision of related professional technical services; disposal of nuclear wastes; organization and implementation of the construction and management for nuclear power stations engineering projects; organization of the operation, repair and related businesses for nuclear power stations; organization of the design development and scientific research for nuclear power stations; and engagement in related investment, import and export businesses.

2. BASIS OF PREPARATION

The Group adopts the Accounting Standards for Business Enterprises and relevant requirements promulgated by the Ministry of Finance, and discloses relevant financial information in accordance with the Rules on the Preparation and Report of Information Disclosure for Companies Publicly Issuing Securities No. 15 – General Requirements for Financial Reports (Revised in 2014). In addition, the financial statements also include information disclosure according to the relevant requirements under the Hong Kong Companies Ordinance and the Rules Governing the Listing of Securities on the Stock Exchange (the “**Stock Exchange Listing Rules**”).

3. CHANGES IN SIGNIFICANT ACCOUNTING POLICIES AND ACCOUNTING ESTIMATES

From January 1, 2018, the Group commenced the adoption of the Accounting Standards for Business Enterprises No. 14 – Revenue (Cai Kuai [2017] No. 22, the “**New Standards for Revenue**”, while the standards for revenue prior to such revision are referred to as the “**Original Standards for Revenue**”), as well as the Accounting Standards for Business Enterprises No. 22 – Recognition and Measurement of Financial Instruments (Cai Kuai [2017] No. 7), the Accounting Standards for Business Enterprises No. 23 – Transfer of Financial Assets (Cai Kuai [2017] No. 8), the Accounting Standards for Business Enterprises No. 24 – Hedging Accounting (Cai Kuai [2017] No. 9) and the Accounting Standards for Business Enterprises No. 37 – Presentation of Financial Instruments (Cai Kuai [2017] No. 14) (the above four are collectively referred to as the “**New Standards for Financial Instruments**”, while the standards for financial instruments prior to such revision are referred to as the “**Original Standards for Financial Instruments**”), which were all revised by the Ministry of Finance in 2017. Besides, the financial statements have been prepared in accordance with the Notice of the Revised Format of Financial Statements for General Business Enterprises for 2018 (Cai Kuai [2018] No. 15, the “**Cai Kuai No. 15 Document**”) issued by the Ministry of Finance on June 15, 2018.

- (1) The New Standards for Revenue introduced a five-step method for recognition and measurement of revenue, and added more instructions on specific transactions (or matters). Under the New Standards for Revenue, entities that adopt such standards for the first time shall adjust the retained earnings and amounts of other related items in the financial statements at the beginning of the year in which such standards are firstly adopted (i.e. January 1, 2018) for the cumulative affected amounts due to initial adoption of such standards, whereby the information in comparable period shall not be adjusted. Upon adoption of the New Standards for Revenue, the Group solely adjusts the cumulative affected amounts for the outstanding contracts on the date of initial adoption. For changes in contracts arose before the beginning of the period in which of the New Standards for Revenue are firstly adopted, the Group adopts an simplified approach, namely that the Group identifies the fulfilled and unfulfilled performance obligations, determine the transaction price and allocate such price between the fulfilled and unfulfilled performance obligations according to the final arrangement on changes in contracts.

Besides the provision of more extensive disclosures of revenue transactions, impacts from the adoption of the New Standards for Revenue on relevant items on the consolidated balance sheet as at January 1, 2018 are as follows:

Item	December 31, 2017	Reclassification	January 1, 2018
Current Assets:			
Bills receivable and accounts receivable	6,455,449,463.32	(7,201,207.10)	6,448,248,256.22
Inventories	26,558,036,864.75	(6,819,199,881.66)	19,738,836,983.09
Contract assets	—	3,341,739,828.96	3,341,739,828.96
Current Liabilities:			
Receipts in advance	5,104,185,934.33	(5,104,185,934.33)	—
Contract liabilities	—	1,619,524,674.53	1,619,524,674.53

- (2) For classification and measurement of financial assets, the New Standards for Financial Instruments require that financial assets should be classified into three categories: “financial assets measured at amortized cost”, “financial assets at fair value through other comprehensive income (“FVTOCI”)” and “financial assets at fair value through profit or loss (“FVTPL”)” based on the characteristics of their contractual cash flows and business models for the enterprises to manage these assets. The categories in the Original Standards for Financial Instruments including loans and receivables, held-to-maturity investments and available-for-sale financial assets have been cancelled. Investments in equity instruments not held for trading are generally categorized into financial assets at FVTPL, and are also allowed to be designated as financial assets at FVTOCI, but such designation is non-revocable, and the cumulative changes in fair value previously recognized in other comprehensive income shall not be transferred to profit or loss upon disposal.

For impairment of financial assets, the New Standards for Financial Instruments on impairment are applicable to financial assets measured at amortized cost and at FVTOCI, and contract assets. The New Standards for Financial Instruments require adoption of expected credit losses model to replace the original credit-impaired model for provision of impairment. The new impairment model requires adoption of a three-phase model, where credit loss allowance is made based on expected credit losses within 12 months or during the whole life in view of whether the credit risks of relevant financial instruments have been significantly increased since initial recognition. For accounts receivable and contract assets, impairment provision are measured at the expected credit losses during the whole life.

If the recognition and measurement of financial instruments. before January 1, 2018 is inconsistent with the New Standards for Financial Instruments, the Group would adjust in accordance with the retrospective requirement under the New Standards for Financial Instruments. In case of inconsistency between the comparative figures in financial statements in prior period and requirements of the New Standards for Financial Instruments, the Group would not make adjustment. The shortfall between the original carrying amount of the financial instruments and the new carrying amount on the adoption date of the New Standards for Financial Instruments shall be recognized in retained earnings or other comprehensive income as at January 1, 2018. The effects of the Group's adoption of the New Standards for Financial Instruments on the consolidated balance sheet as at January 1, 2018 are detailed in the table below.

Under the Original Standards for Financial Instruments			Under the New Standards for Financial Instruments		
Item in the financial statements	Measurement category	Carrying value	Item in the financial statements	Measurement category	Carrying value
Cash at bank and in hand	Amortized cost	12,386,827,010.72	Cash at bank and in hand	Amortized cost	12,386,827,010.72
Derivative financial assets	FVTPL	1,486,635.64	Derivative financial assets	FVTPL	1,486,635.64
Bills receivable and accounts receivable	Amortized cost	6,455,449,463.32	Bills receivable and accounts receivable	Amortized cost	6,448,248,256.22
Other receivables	Amortized cost	1,532,214,773.38	Other receivables	Amortized cost	1,532,214,773.38
Non-current assets due within one year (derivative financial instruments)	FVTPL	1,248,496.91	Non-current assets due within one year (derivative financial instruments)	FVTPL	1,248,496.91
Available-for-sale financial assets (investments in equity instruments)	Cost	195,310,350.00	Investment in other equity instruments	FVTOCI	509,184,500.00
Other non-current financial assets (derivative financial instruments)			Other non-current financial assets (derivative financial instruments)	FVTPL	1,857,052.64
Other non-current assets (derivative financial instruments)	FVTPL	1,857,052.64	Other non-current assets (derivative financial instruments)		

On the date of initial adoption (i.e. January 1, 2018), the original carrying amount of financial assets and the carrying amount of the financial assets as classified and measured in accordance with the New Standards for Financial Instruments are reconciled as follows.

Item in the financial statements	Carrying amount under the Original Standards for Financial Instruments (December 31, 2017)	Reclassification	Remeasurement	Carrying amount under the New Standards for Financial Instruments (January 1, 2018)
Investment in other equity instruments ⁽¹⁾	—	195,310,350.00	313,874,150.00	509,184,500.00
Available-for-sale financial assets ⁽¹⁾	195,310,350.00	(195,310,350.00)	—	—
Deferred tax liabilities ⁽¹⁾	1,160,681,738.94	—	47,081,122.50	1,207,762,861.44
Long-term equity investments ⁽²⁾	8,363,631,040.45	—	131,139,543.08	8,494,770,583.53
Other comprehensive income ⁽¹⁾⁽²⁾	403,233,865.89	(57,900,771.93)	397,932,570.58	743,265,664.54
Retained earnings ⁽²⁾	12,838,530,033.75	57,900,771.93	—	12,896,430,805.68

- (1) The Group has adopted the New Standards for Financial Instruments since January 1, 2018. The originally held available-for-sale financial assets were reclassified as investment in other equity instruments. On January 1, 2018, the fair value was re-measured and increased by RMB313,874,150.00. At the same time, the deferred income tax liabilities were adjusted by RMB47,081,122.50 and the other comprehensive income was adjusted by RMB266,793,027.50.
- (2) CGN Industry Investment Fund Phase I Co., Ltd. (中廣核一期產業投資基金有限公司) (“**CGN Fund Phase I**”), an associate of the Group, has adopted the New Standards for Financial Instruments from January 1, 2018, and the originally held available-for-sale financial assets were reclassified as investment in other equity instruments and re-measured. The Group adjusted the carrying value of long-term equity investments by RMB131,139,543.08 based on its shareholding. At the same time, other comprehensive income was adjusted by RMB131,139,543.08.

CGN Finance Co., Ltd. (中廣核財務有限責任公司), an associate of the Group, has adopted the New Standards for Financial Instruments since January 1, 2018. The originally held available-for-sale financial assets were reclassified as financial assets at FVTPL. The Group transferred the cumulative recognized changes in fair value of RMB57,900,771.93 from other comprehensive income to retained earnings at the beginning of the period based on its shareholding.

On the date of initial adoption (i.e. January 1, 2018), the original impairment provision of financial assets and the impairment provision classified and measured in accordance with the New Standards for Financial Instruments are reconciled as follows.

Item	Impairment provision under the Original Standards for Financial Instruments	Reclassification	Remeasurement	Impairment provision under the New Standards for Financial Instruments
Bills receivable and accounts receivable	228,171,522.61	(2,133,904.67) ^(Note)	—	226,037,617.94
Other receivables	217,664,256.88	—	—	217,664,256.88

Note: The reclassification is reclassification of contract assets.

- (3) In the preparation of 2018 financial statements, the Group implemented the Cai Kuai No. 15 Document promulgated by the Ministry of Finance on June 15, 2018. The Cai Kuai No. 15 Document revised the reporting items in the balance sheet and the income statement by adding new line items of “bills receivable and accounts receivable”, “bills payable and accounts payable” and “research and development expenses”, revising the reporting contents of line items of “other receivables”, “fixed assets”, “construction in progress”, “other payables”, “long-term payables” and “administrative expenses”, eliminating the line items of “bills receivable”, “accounts receivable”, “dividends receivable”, “interest receivable”, “disposal of fixed assets”, “construction materials”, “bills payable”, “accounts payable”, “interest payable”, “dividends payable” and “special payables”, adding the line items of “including: interest expenses” and “interest income” under the item of “finance costs” for reporting, and adjusted the location for reporting certain items in the income statement, such that the location of the item of withholding individual income tax refunds received is adjusted to under the line item of “other gains” in the income statement. For the changes to the above-mentioned reporting items, the Group adopted the retrospective adjustment method for accounting treatment and made retrospective adjustments to the data in the comparable financial statements.

4. OPERATING REVENUE AND COSTS

Item	2018		2017 (Restated)	
	Revenue	Cost	Revenue	Cost
From principal operations	50,543,922,149.96	28,227,621,577.00	45,457,057,438.81	25,023,009,068.36
Of which: Sales of electricity	46,071,750,901.61	23,425,317,972.01	41,543,214,608.05	21,569,118,165.15
Construction, installation and design services	3,178,563,261.77	3,812,574,569.31	2,680,488,509.49	2,540,486,014.50
Rendering of services	721,858,441.79	494,359,016.18	722,427,251.63	555,609,759.92
Sales of goods and others	571,749,544.79	495,370,019.50	510,927,069.64	357,795,128.79
From other operations	283,997,034.47	276,233,032.56	176,396,481.83	162,035,026.20
Total	50,827,919,184.43	28,503,854,609.56	45,633,453,920.64	25,185,044,094.56

5. FINANCE COSTS

Item	2018	2017 (Restated)
Interest expenses	9,947,795,170.31	10,011,056,835.96
Less: Capitalized interest expenses	4,004,039,487.10	3,906,266,883.76
Less: Interest income	254,816,814.36	206,879,219.46
Exchange losses	192,710,406.19	434,835,618.10
Less: Capitalized exchange losses	96,248,163.36	436,090,317.94
Nuclear power facility disposal reserve	197,603,371.22	182,361,434.12
Bank charges and others	17,864,290.79	27,605,587.58
Total	6,000,868,773.69	6,106,623,054.60

6. ASSET IMPAIRMENT LOSSES

Item	2018	2017
Bad debts losses	—	109,881,863.64
Impairment losses of inventories	139,409,032.49	275,315,915.01
Impairment losses of prepayments	(32,220,000.00)	—
Total	107,189,032.49	385,197,778.65

7. CREDIT IMPAIRMENT LOSSES

Item	2018	2017
Bad debts losses of accounts receivable	(105,075,832.81)	
Bad debts losses of other receivables	(127,409,009.62)	
Impairment losses of contract assets	8,993,565.20	
Total	(223,491,277.23)	

8. OTHER GAINS

Item	2018	2017
Value-added tax refunds	1,408,237,981.06	1,386,129,487.10
Other government grants	143,333,834.97	118,535,257.69
Others	11,569,083.75	8,792,249.41
Total	1,563,140,899.78	1,513,456,994.20

9. INVESTMENT INCOME

Item	2018	2017
Income from long-term equity investments accounted for using the equity method	1,029,509,833.39	602,635,840.38
Investment income (loss) from disposal of long-term equity investments	(771,849.04)	1,856,801,074.11 ^(Note)
Income from derivative financial instruments	2,911,325.02	(167,323,962.10)
Investment income from holding available-for-sale financial assets		23,861,166.70
Investment income from holding other equity instruments	15,382,800.00	
Others	(2,473,446.40)	(3,835,945.96)
Total	1,044,558,662.97	2,312,138,173.13

Note: Mainly comprised the investment income of RMB1,785,082,112.93 generated from the remeasurement of equity originally held in Fujian Ningde Nuclear Power Co., Ltd. (福建寧德核電有限公司) (“**Ningde Nuclear**”) on the acquisition date upon the change of Ningde Nuclear from a joint venture to a subsidiary of the Company, the investment income of RMB199,325.71 generated from the Group’s disposal of an associate, Suzhou Longyuan Bailu Wind Power Vocational Training Center Co., Ltd. (蘇州龍源白鷺風電職業培訓中心有限公司), and the investment income of RMB71,519,635.47 generated from the Group’s disposal of a subsidiary, Nanjing Xinsu Thermoelectricity Co., Ltd. (南京新蘇熱電有限公司), totaling RMB1,856,801,074.11.

10. INCOME TAX EXPENSES

Item	2018	2017 (Restated)
Current income tax expenses	1,555,897,354.32	1,337,798,743.18
Deferred income tax expenses	(336,958,473.33)	95,494,862.58
Adjustments to income tax of previous years	(1,140,452.73)	10,778,223.40
Total	1,217,798,428.26	1,444,071,829.16

The Company and its subsidiaries are subject to enterprise income tax (“EIT”) at 25%, except for the following subsidiaries which enjoyed certain tax exemption and relief.

As China Nuclear Power Design Co., Ltd. (Shenzhen) (深圳中廣核工程設計有限公司) (“**CGN Design**”), Lingdong Nuclear Power Co., Ltd. (嶺東核電有限公司) (“**Lingdong Nuclear**”), China Nuclear Power (Shenzhen) Radiation Monitoring Technology Co., Ltd. (中廣核 (深圳) 輻射監測技術有限公司), China Nuclear Power (Beijing) Simulation Technology Corporation Ltd. (中廣核 (北京) 仿真技術有限公司), CGN Inspection Technology Co., Ltd. (中廣核 檢測技術有限公司), Suzhou Nuclear Power Research Institute (蘇州熱工研究院有限公司) (“**Suzhou Nuclear Power Research Institute**”), Guangdong Nuclear Power Joint Venture Co, Ltd. (廣東核電合營有限公司), China Nuclear Power Technology Research Institute (中廣核研究院有限公司) (“**CNPRI**”), Ling’ao Nuclear Power Co., Ltd. (嶺澳核電有限公司)

(“**Ling’ao Nuclear**”) and China Nuclear Power Engineering Co., Ltd. (中廣核工程有限公司) (“**CGN Engineering**”) were qualified as national high-tech enterprises, these companies were approved to enjoy the preferential tax rate of 15% in accordance with the relevant EIT laws and regulations for the year ended December 31, 2018 and the year ended December 31, 2017. The qualification as high-tech enterprises of Guangdong Nuclear Power Joint Venture Co., Ltd. (廣東核電合營有限公司) and CGN Design was expired on June 19, 2018 and November 2, 2018, respectively. These companies are reapplying for renewal. According to the Announcement of the State Administration of Taxation on the Issues Relating to the Implementation of the Income Tax Policy for High-Tech Enterprise 《國家稅務總局關於實施高新科技企業所得稅優惠政策有關問題的公告》, Guangdong Nuclear Power Joint Venture Co., Ltd. (廣東核電合營有限公司) and CGN Design shall temporarily pay EIT at a rate of 15% for 2018.

Pursuant to the Notice on the Execution of the Catalogue of Public Infrastructure Projects Entitled for Tax Benefit (Cai Shui [2008] No. 46) issued by the Ministry of Finance and the State Administration of Taxation and the Supplementary Notice of Tax Benefit Scheme in relation to Public Infrastructure Project (Cai Shui [2014] No. 55), as Lingdong Nuclear, Yangjiang Nuclear Power Co., Ltd. (陽江核電有限公司) (“**Yangjiang Nuclear**”), Guangxi Fangchenggang Nuclear Power Co., Ltd. (廣西防城港核電有限公司) (“**Fangchenggang Nuclear**”), Ningde Nuclear, Taishan Nuclear Power Joint Venture Co., Ltd. (台山核電合營有限公司) (“**Taishan Nuclear**”) and CGN Lufeng Nuclear Power Co., Ltd. (中廣核陸豐核電有限公司) (“**Lufeng Nuclear**”) falls under the Tax Benefit Scheme in relation to the Investment in and Operation of Key Public Infrastructure Projects Supported by the State, these companies were entitled to EIT exemption for three years followed by 50% exemption for the next three years commencing from their first revenue generating year.

Yangjiang Unit 1 was subject to EIT at 12.5% for 2017 and 2018; Unit 2 was entitled to EIT exemption for 2017, and was subject to EIT at 12.5% for 2018; Unit 3 was entitled to EIT exemption for 2017 and 2018; Unit 4 was entitled to EIT exemption for 2017 and 2018 and Unit 5 was entitled to EIT exemption for 2018.

Fangchenggang Units 1 and 2 were entitled to EIT exemption for 2017 and 2018.

Ningde Unit 1 was subject to EIT at 12.5% for 2017 and 2018; Unit 2 was subject to EIT at 12.5% for 2017 and 2018; Unit 3 was entitled to EIT exemption for 2017, and was subject to EIT at 12.5% for 2018; and Unit 4 was entitled to EIT exemption for 2017 and 2018.

Taishan Unit 1 was entitled to EIT exemption for 2018.

Lufeng Nuclear had not yet generated operating revenue as at December 31, 2018.

11. EARNINGS PER SHARE

Basic earnings per share are calculated by dividing the net profit attributable to shareholders of the parent company by the weighted average number of ordinary shares of the Company in issue.

	2018	2017
Net profit attributable to shareholders of the parent company	8,702,632,650.82	9,564,092,697.56
Weighted average number of ordinary shares of the Company in issue	45,448,750,000.00	45,448,750,000.00
Basic earnings per share	0.191	0.210

No diluted earnings per share for both 2018 and 2017 were presented as the Group had no potential ordinary share in issue during the years ended December 31, 2018 and 2017.

12. BILLS RECEIVABLE AND ACCOUNTS RECEIVABLE

(1) Total bills receivable and accounts receivable

Item	December 31, 2018	December 31, 2017(Restated)
Bills receivable	18,433,532.76	38,521,967.11
Accounts receivable	6,630,947,443.89	6,416,927,496.21
Total	6,649,380,976.65	6,455,449,463.32

(2) Bills receivable

Item	December 31, 2018	December 31, 2017
Bank acceptance bills	18,433,532.76	38,461,967.11
Commercial acceptance bills	—	60,000.00
Total	18,433,532.76	38,521,967.11

(3) Accounts receivable

Item	December 31, 2018	December 31, 2017
Accounts receivable arising from contracts with customers	6,751,528,146.34	6,645,099,018.82
Including: Group 1	6,249,212,682.38	6,311,225,558.98
Group 2	417,994,768.11	325,050,155.79
Accounts receivable for which provision for bad debts has been individually made	84,320,695.85	8,825,304.05
Less: Impairment provisions	120,580,702.45	228,171,522.61
Total	6,630,947,443.89	6,416,927,496.21

Group 1:

Aging	December 31, 2018				December 31, 2017			
	Expected average loss rate	Carrying balance	Bad debt provisions	Carrying value	Expected average loss rate	Carrying balance	Bad debt provisions	Carrying value
Less than 1 year (inclusive)	0.30%	6,206,957,852.57	18,680,010.40	6,188,277,842.17	0.30%	5,299,557,079.40	15,898,671.24	5,283,658,408.16
1-2 years	5.00%	27,766,996.20	1,388,349.81	26,378,646.39	5.00%	544,893,605.06	27,244,680.25	517,648,924.81
2-3 years	20.00%	14,473,379.27	2,894,675.85	11,578,703.42	20.00%	243,590.06	48,718.01	194,872.05
3-4 years	30.00%	14,454.34	4,336.30	10,118.04	30.00%	451,529,284.46	135,458,785.35	316,070,499.11
4-5 years	50.00%	—	—	—	50.00%	—	—	—
More than 5 years	100.00%	—	—	—	100.00%	15,000,000.00	15,000,000.00	—
Total	0.37%	6,249,212,682.38	22,967,372.36	6,226,245,310.02	3.07%	6,311,223,558.98	193,650,854.85	6,117,572,704.13

Group 2:

Aging	December 31, 2018				December 31, 2017			
	Expected average loss rate	Carrying balance	Bad debt provisions	Carrying value	Expected average loss rate	Carrying balance	Bad debt provisions	Carrying value
Less than 1 year (inclusive)	0.30%	372,626,834.11	1,117,768.49	371,509,065.62	0.30%	184,776,713.00	554,330.14	184,222,382.86
1-2 years	10.00%	23,679,042.99	2,367,904.30	21,311,138.69	10.00%	111,944,332.63	11,194,433.26	100,749,899.37
2-3 years	30.00%	15,557,407.02	4,667,222.11	10,890,184.91	30.00%	11,370,712.47	3,411,213.74	7,959,498.73
3-4 years	50.00%	1,706,689.31	853,344.66	853,344.65	50.00%	11,690,592.45	5,845,296.22	5,845,296.23
4-5 years	80.00%	692,000.00	553,600.00	138,400.00	80.00%	2,888,574.47	2,310,859.58	577,714.89
More than 5 years	100.00%	3,732,794.68	3,732,794.68	—	100.00%	2,379,230.77	2,379,230.77	—
Total	3.23%	417,994,768.11	13,292,634.24	404,702,133.87	7.91%	325,050,155.79	25,695,363.71	299,354,792.08

13. SHORT-TERM LOANS

Item	December 31, 2018	December 31, 2017 (Restated)
Credit loans	16,296,240,042.13	19,392,821,406.87

As at December 31, 2018, the Group had no overdue and unsettled short-term loans.

14. BILLS PAYABLE AND ACCOUNTS PAYABLE

(1) Total bills payable and accounts payable

Items	December 31, 2018	December 31, 2017(Restated)
Bills payable	2,260,164,887.24	997,259,992.66
Accounts payable	15,986,899,682.85	16,347,413,552.38
Total	18,247,064,570.09	17,344,673,545.04

(2) Bills payable

Item	December 31, 2018	December 31, 2017
Commercial acceptance bills	104,438,140.29	—
Bank acceptance bills	2,155,726,746.95	997,259,992.66
Total	2,260,164,887.24	997,259,992.66

As at December 31, 2018, the Group had no overdue and unsettled bills payable.

(3) Accounts payable

Aging	December 31, 2018	December 31, 2017 (Restated)
Less than 1 year	13,578,695,513.73	13,440,401,789.44
1-2 years	1,047,166,567.09	1,528,797,057.70
2-3 years	893,219,613.47	392,842,471.26
More than 3 years	467,817,988.56	985,372,233.98
Total	15,986,899,682.85	16,347,413,552.38

15. NON-CURRENT LIABILITIES DUE WITHIN ONE YEAR

Item	December 31, 2018	December 31, 2017
Long-term loans due within one year	15,792,525,241.13	10,071,199,432.43
Bonds payable due within one year	2,500,000,000.00	1,000,000,000.00
Derivative financial instruments due within one year	—	1,630,161.62
Post-employment benefit scheme liabilities due within one year	2,583,999.04	2,576,999.04
Total	18,295,109,240.17	11,075,406,593.09

16. LONG-TERM LOANS

Item	December 31, 2018	December 31, 2017
Credit loans	24,825,267,074.65	28,582,546,088.91
Guaranteed loans ⁽¹⁾	6,000,000,000.00	6,000,000,000.00
Pledged loans ⁽²⁾	164,426,485,135.51	159,001,136,322.60
Mortgaged loans ⁽³⁾	180,719,170.77	—
Total	195,432,471,380.93	193,583,682,411.51
Less: Long-term loans due within one year	15,792,525,241.13	10,071,199,432.43
Long-term loans due after one year	179,639,946,139.80	183,512,482,979.08

Notes:

- (1) In August 2012, Guangdong Nuclear Power Investment Co., Ltd. (廣東核電投資有限公司) (“GNIC”), a subsidiary of the Company, entered into the “Taiping Asset – CGN Power Project Debt Investment Plan Investment Contract” (《太平資產—中廣核核電項目債權投資計劃投資合同》) with Taiping Asset Management Co., Ltd. (太平資產管理有限公司) (“Taiping Asset”) pursuant to which Taiping Asset initiated the establishment of “Taiping Asset – CGN Power Project Debt Investment Plan” with the actual investment proceeds of RMB3,000,000,000.00. The proceeds were invested in GNIC in the form of debts, and were used in the construction of nuclear power projects of Taishan Nuclear and Yangjiang Nuclear under GNIC. CGNPC provides a full unconditional irrevocable joint and several liability guarantee for all the obligations of GNIC under such contract to Taiping Asset. As at December 31, 2018, the loan had not expired.

In November 2015, Lufeng Nuclear, a subsidiary of the Company, entered into a contract with China Development Bank Financial Leasing Co., Ltd. (國銀金融租賃有限公司) (“China Development Bank Financial”) for capital financing, and the principal received was RMB500,000,000.00. In 2016, the Company transferred the leased assets of RMB300,000,000.00 to China Development Bank Financial. In October 2017, Lufeng Nuclear and China Development Bank Financial entered into a supplementary contract to increase the financing amount to RMB3,000,000,000.00 on the basis of the above contract. CGNPC provided Lufeng Nuclear with a joint and several liability guarantee for all debts under the above contract with all its legal assets. As at December 31, 2018, the balance of outstanding loans of Lufeng Nuclear was RMB3,000,000,000.00.

- (2) Pledged loans are pledged by the Group with its interests under sales agreements of electricity, insurance contracts and equity interest held.
- (3) Secured loans are secured by the Company’s subsidiaries Suzhou Nuclear Power Research Institute, CGN Engineering and CNPRI with land use rights and buildings.

The annual interest rate range of the above loans:

	2018	2017
Annual interest rate range of the above loans	0.49%-5.30%	0.49%-6.95%

17. BONDS PAYABLE

Category	December 31, 2018	December 31, 2017
Long-term bonds	4,498,219,043.17	4,495,866,518.52
Medium-term notes	3,989,825,356.08	—
Private placement financing instruments	2,500,000,000.00	3,500,000,000.00
Total	10,988,044,399.25	7,995,866,518.52
Less: Bonds payable due within one year	2,500,000,000.00	1,000,000,000.00
Bonds payable due after one year	8,488,044,399.25	6,995,866,518.52

18. PROVISIONS

Item	December 31, 2018	December 31, 2017
Provision for nuclear power plant decommissioning ⁽¹⁾	3,689,783,017.22	2,952,097,625.57
Provision for low and medium level radioactive waste disposal ⁽²⁾	310,281,961.52	292,768,114.70
Others	1,466,775.27	—
Total	4,001,531,754.01	3,244,865,740.27

- (1) It is the discounted value of the best estimate of the expected cost of processing the nuclear power plant decommissioning of the Group.
- (2) It is the best estimate of the expected disposal cost of long-term and short-term low and medium level radioactive waste generated by nuclear power plants.

19. SHARE CAPITAL

Details of the movement of the number of shares comprising domestic shares and H shares are shown as below:

	Number of domestic shares '000	Number of H Shares '000	Share capital RMB'000
Registered, issued and fully paid ordinary shares of RMB1.00 each As at January 1, 2017, December 31, 2017 and December 31, 2018	<u>34,285,125</u>	<u>11,163,625</u>	<u>45,448,750</u>

20. DIVIDEND

Subsequent to the end of the Reporting Period, a final dividend of RMB0.072 per share in respect of the year ended December 31, 2018 amounting to approximately RMB3,272,310,000.00 in total has been proposed by the Board and is subject to approval by the shareholders of the Company (the “Shareholders”) in the 2019 first extraordinary general meeting.

During the Reporting Period, a final dividend of RMB0.068 per share in respect of the year ended December 31, 2017 was declared to the owners of the Company amounting to approximately RMB3,090,515,000 in total, which was approved by the Shareholders at the 2017 annual general meeting convened on May 30, 2018. The Company has paid the dividend by July 31, 2018.

21. SHARE-BASED PAYMENT

(1) Overall Share-based Payment

	2018	2017
Total equity instruments granted by the Company during the year	—	568,970,000
Total equity instruments exercised by the Company during the year	—	—
Total equity instruments of the Company that have expired during the year	(5,520,013.00)	(27,360,000)
The range of exercise price of outstanding share appreciation rights of the Company at the end of the period and the remaining period of the contract	HKD2.09/3.50 0.96 - 5.95 years	HKD2.09/3.50 1.96 - 6.95 years

The Group has set up an H-share Appreciation Rights (“SAR”) Scheme (the “Scheme”) for core staff who exert significant impact on the Company’s strategic target, including certain Directors (excluding independent non-executive Directors and external Directors), senior management and core technical and management staff of the Company who have exerted direct influence on the overall results and sustainable development of the Company (“Incentive Recipients”). The Scheme was approved at the annual general meeting of the Company on June 12, 2015. Supervisors of the Company are not Incentive Recipients.

The initial implementation plan of the SAR was approved by the Board on November 5, 2015. Pursuant to the initial scheme, 218,880,000 units of SAR were granted to Incentive Recipients of the Group at the exercise price of HKD3.50 per share. One third of the total number of SAR are vested and entitled on or after December 19, 2016, one third of the total number of SAR are vested and entitled on or after December 18, 2017 and the remaining one third of the total number of SAR are vested and entitled on or after December 18, 2018.

The secondary implementation plan of the SAR was approved by the Board on December 14, 2017. Pursuant to the secondary scheme, 568,970,000 units of SAR were granted to Incentive Recipients of the Group at the exercise price of HKD2.09 per share. One third of the total number of SAR are vested and entitled on or after December 16, 2019, one third of the total number of SAR are vested and entitled on or after December 15, 2020 and the remaining one third of the total number of SAR are vested and entitled on or after December 15, 2021.

Each unit of SAR is notionally linked to one H Share and represents the rights conferred on the relevant Incentive Recipients to receive in cash stipulated earnings from the increase in market value of the relevant H share. The SARs will have certain services periods and three years after the respective vesting dates. In addition, the exercise of SAR is also subject to the performance condition of the Group and Incentive Recipients including achievements of certain performance targets.

(2) Cash-Settled Share-based Payment

	2018	2017
Methods for determining fair value of liabilities undertaken by the Company and calculated by share or other equity instruments	Black-Scholes options valuation model	Black-Scholes options valuation model
Accumulated liabilities arising from cash-settled share-based payment in liabilities	61,728,273.40	24,949,743.31
Total fees recognized in respect of cash-settled share-based payment during the year	36,778,539.27	6,591,071.77

The fair value of share-based payment is measured by using the Black-Scholes Model, and inputs used in the model are as follows:

Item	Closing balance	Opening balance
Share price	1.86	2.12
Expected volatility	28.92 - 34.83%	35.34 - 36.37%
Expected dividend yield	4.484%	2.755%

The first grant under the Shares Appreciation Rights Incentive Scheme:

Item	Closing balance	Opening balance
Exercise price	3.50	3.50
Expected term	0.96 - 2.96 years	1.96 - 3.96 years
Risk-free rate	1.731 - 1.758%	1.285 - 1.519%

The second batch of Share Appreciation Rights Incentive Scheme:

Item	Closing balance	Opening balance
Exercise price	2.09	2.09
Expected term	3.95 - 5.95 years	4.95 - 6.95 years
Risk-free rate	1.791 - 1.859%	1.604 - 1.693%

The variables and assumptions used in computing the fair value of the share options are based on the Directors' best estimate. Changes in variables of specific assumptions may result in changes in the value of the options.

22. BREAKDOWN OF NON-RECURRING GAINS OR LOSSES

Item	2018	2017(Restated)
Gains or losses from disposal of non-current assets ⁽¹⁾	(665,199.14)	1,850,564,891.86
Government grants recognized in profit or loss for the current period (except for those closely related to the Company's business and for fixed or quantitative purposes in accordance with national uniform standards)	143,333,834.97	118,535,257.69
Net gains or losses of the subsidiaries as a result of business combination under common control from the beginning of the period to the combination date ⁽²⁾	415,889.99	399,920.63
Except for the effective hedging transactions related to the normal operation of the Company, the gains or losses from changes in fair value arising from holding financial assets and liabilities held for trading, as well as the investment income arising from disposal of financial assets and liabilities held for trading and available-for-sale financial assets	7,850,932.34	29,936,167.21
Other non-operating income and expenses other than the items above, net	(46,289,861.93)	(38,773,426.64)
Other gains or losses items that meet the definition of non-recurring gains or losses	11,136,508.04	10,183,550.29
Total	115,782,104.27	1,970,846,361.04
Income tax effect of non-recurring gains or losses	15,645,554.97	309,803,540.24
Effect of non-recurring gains or losses attributable to minority shareholders	7,016,832.13	70,970,514.40
Effect of non-recurring gains or losses attributable to shareholders of the parent company, net	93,119,717.17	1,590,072,306.40

- (1) The gains or losses from disposal of non-current assets in 2017 mainly comprise the gain from remeasurement of RMB1,785,082,112.93 generated upon the change of Ningde Nuclear from a joint venture to a subsidiary of the Group and the gain of RMB71,519,635.47 from disposal of Nanjing Xinsu Thermoelectricity Co., Ltd. (南京新蘇熱電有限公司).
- (2) The amount of this item has taken into account the offset of internal unrealized gains and losses between related parties and the corresponding income tax effect.

Finance, Assets and Investments

Our investment and operational strategies affect our business performance, which in turn translate into the finance data combined in our financial statements.

(I) Financial Performance and Analysis

Key Financial Indicators

Item	2018	2017 (Restated)
Indicators of profitability		
EBITDA margin (%) ⁽¹⁾	57.1	60.7
Net profit margin (%) ⁽²⁾	26.9	27.9
Indicators of investment returns		
Return on equity (excluding non-controlling interests) (%) ⁽³⁾	12.8	15.9
Return on total assets (%) ⁽⁴⁾	5.8	6.4
Indicators of solvency		
Asset-liability ratio (%) ⁽⁵⁾	69.3	71.8
Debt to equity ratio (%) ⁽⁶⁾	183.5	206.7
Interest coverage ⁽⁷⁾	2.1	2.0

Notes:

- (1) EBITDA margin = (Total profit + Interest expenses recognized in profit or loss + Depreciation and amortization)/ Operating revenue * 100%
- (2) Net profit margin = Net profit/ Operating revenue * 100%
- (3) Return on equity (excluding non-controlling interests) = Net profit attributable to shareholders of the parent company/Average equity attributable to shareholders of the parent company (the arithmetic mean of the opening and closing balances) * 100%
- (4) Return on total assets = (Total profit + Interest expenses recognized in profit or loss)/ Average total assets (the arithmetic mean of the opening and closing balances) * 100%
- (5) Asset-liability ratio = Total liabilities/ Total assets * 100%
- (6) Debt to equity ratio = Net debt (the total amount of bank and other borrowings less cash and cash equivalents and other deposits over three months)/ Total shareholders' equity * 100%
- (7) Interest coverage = (Total profit + Interest expenses recognized in profit or loss)/ (Interest expenses recognized in profit or loss + Interest expenses capitalized)

Financial Results and Analysis

For the year ended December 31

	2018	2017	Fluctuations	Percentage
	RMB'000	RMB'000	increase/ (decrease)	change increase/ (decrease)
		(Restated)	RMB'000	%
Revenue from principal operations	50,543,922.15	45,457,057.44	5,086,864.71	11.2
Cost of principal operations	28,227,621.58	25,023,009.07	3,204,612.51	12.8
Finance costs	6,000,868.77	6,106,623.05	(105,754.28)	(1.7)
Other gains ⁽¹⁾	1,563,140.90	1,513,456.99	49,683.91	3.3
Investment income ⁽²⁾	1,044,558.66	2,312,138.17	(1,267,579.51)	(54.8)
Including: Income from investment in associates and joint ventures ⁽³⁾	1,029,509.83	602,635.84	426,873.99	70.8
Non-recurring gains or losses ⁽⁴⁾	115,782.10	1,970,846.36	(1,855,064.26)	(94.1)
Net profit attributable to shareholders of the parent company	8,702,632.65	9,564,092.70	(861,460.05)	(9.0)
Net profit attributable to shareholders of the parent company (excluding the effects of non-recurring gains or losses)	8,609,512.93	7,974,020.39	635,492.54	8.0

- (1) Other gains mainly comprise value-added tax refunds and other government grants.
- (2) The decrease in investment income was primarily due to the investment income amounted to RMB1,785,082,110 in total arising from the remeasurement of equity originally held in Ningde Nuclear on the acquisition date upon the change of Ningde Nuclear from a joint venture to a subsidiary of the Company on January 1, 2017.
- (3) The increase in income from investment in associates and joint ventures was primarily due to the increase of 29.31% in the on-grid power generation of Liaoning Hongyanhe Nuclear Power Co., Ltd. (遼寧紅沿河核電有限公司) (“**Hongyanhe Nuclear**”), an associate, over the previous year, resulting in profit better than last year.
- (4) The decrease in non-recurring gains or losses was primarily due to the investment income amounted to RMB1,785,082,110 in total arising from the remeasurement of equity originally held in Ningde Nuclear on the acquisition date upon the change of Ningde Nuclear from a joint venture to a subsidiary of the Company on January 1, 2017.

Revenue from Principal Operations

For the year ended December 31				
	2018 RMB'000	2017 RMB'000 (Restated)	Fluctuations increase/ (decrease) RMB'000	Percentage change increase/ (decrease) %
Sales of electricity ⁽¹⁾	46,071,750.90	41,543,214.61	4,528,536.29	10.9
Revenue from construction, installation and design services ⁽²⁾	3,178,563.26	2,680,488.51	498,074.75	18.6
Others	1,293,607.99	1,233,354.32	60,253.67	4.9
Total revenue from principal operations	<u>50,543,922.15</u>	<u>45,457,057.44</u>	<u>5,086,864.71</u>	<u>11.2</u>

- (1) The increase in revenue from sales of electricity was primarily due to the commencement of commercial operation of Yangjiang Units 4 and 5 and Taishan Unit 1 in March 2017, July 2018 and December 2018, respectively, and the increase in the overall power generation utilization hours of the units. The on-grid power generation of our subsidiaries increased by 11.13% as compared with 2017.
- (2) The increase in revenue from construction, installation and design services was primarily due to the increase in the construction volume of Hongyanhe Units 5 and 6 and the preliminary work of the proposed Ningde Phase II project (including Ningde Units 5 and 6) of CGN Engineering.

Cost of Principal Operations

For the year ended December 31

	2018 RMB'000	2017 RMB'000 (Restated)	Fluctuations increase/ (decrease) RMB'000	Percentage change increase/ (decrease) %
Cost of sales of electricity	23,425,317.97	21,569,118.17	1,856,199.80	8.6
Of which: Cost of nuclear fuel ⁽¹⁾	7,338,796.57	6,765,809.25	572,987.32	8.5
Depreciation of fixed assets ⁽²⁾	6,956,778.93	6,263,622.61	693,156.32	11.1
Provision for spent fuel management ⁽³⁾	1,332,687.59	1,187,124.43	145,563.16	12.3
Construction, installation and design services ⁽⁴⁾	3,812,574.57	2,540,486.01	1,272,088.56	50.1
Other costs	989,729.04	913,404.89	76,324.15	8.4
Total cost of principal operations	<u>28,227,621.58</u>	<u>25,023,009.07</u>	<u>3,204,612.51</u>	<u>12.8</u>

- (1) The increase in cost of nuclear fuel was primarily due to the commencement of commercial operation of Yangjiang Units 4 and 5 and Taishan Unit 1 in March 2017, July 2018 and December 2018, respectively, and the increase in the overall power generation utilization hours of the units. The on-grid power generation of our subsidiaries increased by 11.13% as compared with 2017.
- (2) The increase in depreciation of fixed assets was primarily due to the commencement of commercial operation of Yangjiang Units 4 and 5 and Taishan Unit 1 in March 2017, July 2018 and December 2018, respectively, and the increase in the overall power generation utilization hours of the units. The on-grid power generation of our subsidiaries increased by 11.13% as compared with 2017.
- (3) The increase in provision for spent fuel management was primarily due to the commencement of provision and payment for spent fuel management as Ningde Unit 1 commenced commercial operation for five years in April 2018.
- (4) The increase in cost of construction, installation and design service was primarily due to the increase in the construction volume of Hongyanhe Units 5 and 6 and the preliminary work of the proposed Ningde Phase II project (including Ningde Units 5 and 6) of CGN Engineering.

Financial Position

The major assets, inventories, receivables, payables and borrowings of the Company are shown in the table below. Details of the financial position are set out in the notes to the consolidated financial statements.

	December 31, 2018 RMB'000	January 1, 2018 RMB'000 (Restated)	Fluctuations increase/ (decrease) RMB'000	Percentage change increase/ (decrease) %
Bank and other borrowings ⁽¹⁾	222,716,755.82	220,972,370.34	1,744,385.48	0.8
Receivables ⁽²⁾	16,095,693.97	17,279,147.58	(1,183,453.61)	(6.8)
Payables ⁽³⁾	23,592,561.18	24,010,490.51	(417,929.33)	(1.7)
Inventories	21,372,255.36	19,738,836.98	1,633,418.38	8.3
Fixed assets and intangible assets ⁽⁴⁾	215,570,003.03	163,728,718.58	51,841,284.45	31.7

- (1) Bank and other borrowings comprise short-term loans, long-term loans, bonds payable, and long-term loans and bonds payable due within one year.
- (2) Receivables comprise bills receivable and accounts receivable, prepayments, contract assets and other receivables. The main reason for the decrease in receivables was that CGN Engineering completed the settlement of partial work with Hongyanhe Nuclear.
- (3) Payables comprise bills payable and accounts payable, receipts in advance, contract liabilities and other payables.
- (4) The main reason for the increase in fixed assets and intangible assets was that Yangjiang Unit 5 and Taishan Unit 1 commenced commercial operation in July 2018 and December 2018, respectively, and the relevant construction in progress was transferred to fixed assets.

Cash Flow Analysis

In 2018, the Company's cash flow position was better than the same period of previous year, in which the net cash flows from operating activities increased as compared with 2017, mainly because the income increased as compared with 2017. Net cash flows from investment activities decreased as compared with 2017, mainly due to the remaining payment of the Company for the acquisition of 61% equity interest in Fangchenggang Nuclear, 100% equity interest in Lufeng Nuclear and 100% equity interest in CGN Engineering amounted to RMB5,536.3 million in 2017, and the significant decrease in cash paid for acquisition of fixed assets as compared with the previous year as a result of the commencement of commercial operation of Yangjiang Unit 5 and Taishan Unit 1, cash paid for acquisition of fixed assets decreased significantly as compared with the previous year; the net cash flows from financing activities also decreased as compared with 2017, mainly due to the higher net cash inflow from operating activities of the Company in 2018 as compared with the previous year and the lower net cash outflow from investing activities as compared with the previous year, which decreased financing amount, including an increase in the amount of equity financing by RMB2,030.3 million from 2017 and a decrease in the amount of net debt financing by RMB12,505.4 million from 2017.

	2018	2017	Fluctuations	Percentage
	RMB'000	RMB'000	increase/ (decrease)	change increase/ (decrease)
		(Restated)	RMB'000	%
Net cash flows from				
operating activities	28,409,570.58	26,870,816.95	1,538,753.63	5.7
Net cash flows from investing activities	(16,382,045.13)	(24,604,375.11)	8,222,329.98	(33.4)
Net cash flows from financing activities	(10,910,023.69)	(435,007.90)	(10,475,015.79)	2,408.0

(II) Assets and Investments

The Group was mainly engaged in the investment in construction of nuclear power generating units, technical improvement in the nuclear power plants in operation, and research and development of technologies related to nuclear power for the year ended December 31, 2018.

INVESTMENT IN FIXED ASSETS

For the year ended December 31, 2018, the Group's investment in fixed assets amounted to approximately RMB18,902.4 million, representing a decrease of RMB760.6 million or 3.9% from RMB19,663.0 million in 2017, mainly due to the decrease in capital expenditure arising from the commercial operations of Yangjiang Unit 5 and Taishan Unit 1.

MAJOR INVESTMENTS IN EQUITY

For the year ended December 31, 2018, the Group increased its capital contribution in associates by RMB494.4 million, of which RMB399.1 million, RMB54.4 million and RMB40.9 million were made to Hongyanhe Nuclear. Fujian Ningde Second Nuclear Power Co., Ltd (福建寧德第二核電有限公司) and CGN Fund Phase I, respectively.

MAJOR ACQUISITION AND DISPOSAL

The Company entered into an investment agreement with Shenzhen Guotong Clean Energy Partners Corporation (Limited Partnership) (深圳國同清潔能源合夥企業) (“**Shenzhen Guotong**”) on December 29, 2017, pursuant to which the Company and Shenzhen Guotong established Guangxi Fangchenggang CGN Nuclear Power Industry Investment Co., Ltd. (廣西防城港中廣核核電產業投資有限公司) (“**Fangchenggang Investment**”) on January 10, 2018 to hold 61% equity interest in Fangchenggang Nuclear, a subsidiary of the Company. The Company and Shenzhen Guotong hold 60% and 40% equity interest in Fangchenggang Investment, respectively. Both Fangchenggang Investment and Fangchenggang Nuclear are subsidiaries of the Company and their financial results have been consolidated into the consolidated financial statements of the Group, with the procedures of the transfer of the relevant equity interest completed on February 11, 2018.

On March 8, 2018, the Company signed a share transfer agreement with CGNPC and Shenzhen Nengzhihui Investment Co., Ltd. (深圳市能之匯投資有限公司) (“**Nengzhihui**”), a wholly-owned subsidiary of CGNPC, pursuant to which the Company shall acquire 100% equity interest in CGN Ocean Power Co., Ltd. (中廣核海洋能源有限公司) and 100% equity interest in CGN Hebei Thermal Power Co., Ltd. (中廣核河北熱電有限公司), both held by CGNPC, from CGNPC, and 100% equity interest in CGN Power Sales Co., Ltd. (中廣核電力銷售有限公司) from Nengzhihui, a subsidiary of CGNPC, respectively, at an equity transfer price of approximately RMB235.0 million. The equity transfers were completed on April 30, 2018.

Saved for the matters above, the Group had no other material acquisition disposal for the year ended December 31, 2018.

USE OF PROCEEDS

The Company issued 10,148,750,000 H shares by way of global offering in December 2014 with net proceeds of approximately RMB21,603.5 million (in equivalent) from the offering after deducting various issuance costs. As of December 31, 2018, the Company had used RMB20,531.7 million of the net proceeds for the purposes as set out in the prospectus, representing 95.0% of the net proceeds from the offering.

Items	Movements RMB'000
Net proceeds from the listing	21,603,535
Less: Proceeds used	20,531,709
Among which: Acquisition of 60% equity interest in Taishan Nuclear Power Industry Investment Co., Ltd. and 12.5% equity interest in Taishan Nuclear	9,700,196
Capital expenditure for nuclear power stations under construction	8,714,300
Research and development activities	783,813
Replenishment of working capital	1,333,400
Proceeds unused as at December 31, 2018	<u>1,071,826</u>

The remaining unused proceeds have been intended to be used mainly for research & development activities and overseas market exploration. The proceeds intended to be used for research and development activities are being progressively used according to the annual research and development plan of the Company. As the Company has not carried out any overseas projects, the proceeds intended to be used for overseas market exploration remain unused.

External Financing Environment

In 2018, the global economy generally maintained a recovery trend, but the development and policies of major economies varied. The economy in the United States continued to recover, but the sustainability of its economic growth faced challenges. The United States Federal Reserve Board of Governors increased the federal funds rate for the fourth time to 2.25%-2.50%. Slowdown of the economic recovery in the Eurozone, the uncertainty of the Brexit and the geopolitical risks in the Eurozone have put downward pressure on the Eurozone economy. The PRC's gross domestic product (GDP) grew by 6.6% over the same period of previous year. The national economy remained within a reasonable range, with general stability and steady progress continuing.

In 2018, the local monetary policy in the PRC remained stable with a suitable degree of tightness. With the benchmark interest rate of RMB loans remained unchanged, the interest rate of RMB in the market gradually went downward with a reasonable and sufficient liquidity level. The Company's financing pressure was gradually relieved. Facing the ever-changing internal and external environment, the Company continued to strengthen the organization, coordination and risk monitoring of financing, making full use of internal and external financing channels, ensuring capital security and controlling financing costs.

Equity Financing

With reference to the Company's needs for business development, through equity financing, we consolidated the long-term capital of the Company. The overall capital structure of the Company was optimized according to changes in the external environment. The ability to resist the risk of fluctuations in the external economic and financial environment was consolidated and enhanced, which promoted the sustainable development of the Company's business. For those projects with huge capital expenditure and good earnings forecasts, we will prudently consider the use of equity financing to balance the risks and to enhance Shareholders' value.

We plan to conduct an initial public offering of RMB-denominated ordinary shares (the "A Shares") for no more than 10% of the total share capital of the Company after issuance in the PRC. The funds raised will be used for the construction of Yangjiang Units 5 and 6 and Fangchenggang Units 3 and 4 as well as replenishing the working capital of the Company. Upon the approval from the Board and general meeting, we submitted application materials including the A Share offering prospectus to the CSRC for the purpose of A Share offering and received a notice of acceptance in respect thereof issued by the CSRC on June 22, 2018. After completion of fund-raising, our financial strength will be improved, thereby appropriately reducing the finance costs and further enhancing the financial support capacity for the development of nuclear power projects. For details, please refer to the relevant announcements published in February, April, June and September 2018 and the relevant circulars published in March and July 2018.

Debt Financing

In 2018, we continued to improve diversified ways of financing, reasonable mix of currencies and term structure so as to provide stable and economical source of funding for the business development of the Company. As at December 31, 2018, the Group's total borrowings amounted to approximately RMB222,716.8 million with major financing channels including bank borrowings, bond financing, entrusted loans and insurance debt, etc. We maintain a debt structure mainly comprising RMB-denominated and long-term debts, which not only satisfies our operational characteristics of focusing on nuclear power projects, but also effectively prevents liquidity risks and systematic exchange rate risks.

In 2018, the Company optimized debt structure and reduced financing costs by measures such as increasing the scale of direct investment. We also seized market opportunities and issued four tranches of medium-term notes of RMB4,000.0 million in total. At the same time, we optimized payment term management, and actively promoted note payment in view of not adding pressure on refinancing. By replacing cash settlement with settlement through commercial bill of exchange, we reduced capital utilization and extended payment terms, increasing capital use efficiency.

Debt Risk Management

In recent years, we adopted measures such as forward transactions, debt swaps and early repayment to reduce exchange rate exposure of foreign currency debts gradually. Exposure of foreign currency debts as at the end of the Reporting Period was mainly Euro export credit of Taishan Nuclear. Meanwhile, we managed new foreign currency debt by payments for foreign commercial contracts through spot or forward purchase of foreign exchange in RMB, and effectively reduced the impact of significant exchange rate risk.

In order to cope with interest rate risk, control medium-term financing cost and optimize debt structure, the Company issued four tranches of medium-term notes in April, August and October 2018 with an amount of RMB1,000.0 million for each tranche and an interest rate of 4.70%, 4.69%, 4.24% and 4.03% respectively, mainly used for repayment for bank loans of subsidiaries. Interest rates of issuance were all lower than comparable new external loan interest rate of subsidiaries, effectively controlling financing cost and reducing impact of interest rate fluctuation on the Company's operations.

To manage liquidity risks, we monitor and maintain our cash at bank and in hand as well as the level of unutilized banking facilities. As of December 31, 2018, we had credits for unutilized general banking facilities of RMB121,693.0 million, credits for ultra-short-term financing notes being readily available for public offering of RMB2,000.0 million, credit for medium-term financing notes being readily available for public offering of RMB6,000.0 million and cash at bank and in hand of RMB15,207.9 million, which can provide sufficient cash support for the operation of the Company and reduce the impact from cash flow fluctuation.

Credit Rating

Maintaining a good credit rating helps lower our cost of financing. In May 2018, China Chengxin International Credit Rating Co., Ltd. (中誠信國際信用評級有限責任公司) assessed the credit rating of the Company and maintained our AAA credit rating with stable outlook.

Contingencies

External Guarantees

The Group confirmed that, for the year ended December 31, 2018, the Group had not provided any external guarantee.

Pledge of Assets

As at December 31, 2018, the Group's fixed assets of RMB24,346.5 million in carrying value were pledged to banks and related parties to secure loans for the Group. As at December 31, 2017, the carrying value of the Group's fixed assets pledged to banks and related parties was RMB19,215.7 million.

As at December 31, 2018 and December 31, 2017, the electricity tariff collection rights of Ling'ao Nuclear, Lingdong Nuclear, Yangjiang Nuclear, Ningde Nuclear, Fangchenggang Nuclear and Taishan Nuclear were pledged to secure the facilities and loans from banks to these entities.

Legal Proceedings

For the year ended December 31, 2018, there was no significant litigation against the Group, and the Board was not aware of any pending or threatened litigation against the Group which had or could have a material and adverse effect on the financial conditions or operations of the Group.

Investment Direction

Based on the strategies and business development needs of the Company, the Company will finance the construction of nuclear power stations under construction according to investment schedules, continue to fund the technology improvement in nuclear power stations in operation, make continuous investment in the research, development and innovation of technologies, and fund the acquisitions of contingent assets in 2019. In addition, the Company will also carry out relevant investment activities at appropriate time by exercising its rights to acquire retained businesses as set out in the non-competition deed entered into between the Company and CGNPC, thereby laying a solid foundation for the Company's future development.

Business Performance and Outlook

(I) Industry Overview

According to the external commitment of the Chinese government, non-fossil energy will account for 20% of the PRC's primary energy consumption by 2030. Nuclear power, as a clean energy source, embraces critical development opportunities. According to the report named Scenario Study on Energy Emissions under the Realization of Global 1.5 °C Target in the PRC (《我國實現全球1.5 °C目標下的能源排放情景研究》) prepared by the Energy Research Institute of the National Development and Reform Commission (the “NDRC”), to achieve the 1.5 °C temperature control target, the installed capacity of nuclear power should reach 189.41 GW by 2030, the installed capacity of nuclear power should reach 536.95 GW by 2050, and nuclear power shall account for 28.1% of power generation. The domestic policy of safe and efficient development of nuclear power remained unchanged.

In 2018, the overall economy in the PRC remained within a reasonable range and stable, with general stability and continuing steady progress. According to the Analysis and Forecast Report on the Situation of Electricity Supply and Demand in China in 2018-2019 (《2018-2019年度全國電力供需形勢分析預測報告》) issued by the China Electricity Council (the “CEC”), the electricity consumption in the PRC recorded a year-on-year increase of 8.5% in 2018, which was the highest growth rate in seven years. At the same time, the scale of the PRC's installed power generation capacity increased by 6.5% as compared with the same period of previous year. The increase of electricity consumption in the PRC was for the first time greater than the increase in installed capacity of power generation in the PRC. The power supply and demand throughout the country changed from generally at ease over the past few years to generally balanced. The State has also launched policies securing nuclear power consumption one after another. In November 2018, the NDRC and the National Energy Administration published the Action Plan on Clean Energy Consumption (2018–2020) (《清潔能源消納行動計劃(2018-2020年)》) (the “**Action Plan**”). The Action Plan required that, when formulating mid-term and long-terms plans for the scale of electricity transactions in the market and power generation of the thermal power unit, the relevant departments of local governments shall reserve sufficient priority power generation space for clean energy, and phase down the planned power generation of coal-fire power plant. In September 2018, the Ministry of Justice issued the Atomic Energy Law (Draft for Comments) (《原子能法(徵求意見稿)》) which required that the State shall encourage nuclear power development and implement protective consumption policy of nuclear power. The National Energy Administration also took the lead to promote the pilot run for “full load power generation with favorable tariff” of nuclear power and explored the ways and approaches to realize the full load power generation of nuclear power units, creating favorable conditions for enhancing nuclear power units in terms of economy. Average utilization hours of nuclear power generating units in 2018 across the country reached 7,184 hours, increasing by 76 hours compared with 2017. The utilization rate of nuclear power still remained at a relatively high level.

	Ratio of installed capacity by type of energy (%)		Ratio of generation capacity by type of energy (%)		Average utilization hours (hours)	
	2018	2017	2018	2017	2018	2017
Nuclear power	2.4	2.0	4.2	3.9	7,184	7,108
Thermal power	60.0	62.2	70.4	70.9	4,361	4,209
Hydropower	18.4	19.2	17.6	18.6	3,613	3,579
Wind power	9.5	9.2	5.24	4.8	2,095	1,948

Note: Data from the Analysis and Forecast Report on the Situation of Electricity Supply and Demand in China in 2018-2019 of the CEC.

In 2018, with the further reforms in the national power system, the share of electricity traded in the market further expanded. According to statistics of the CEC, the share of electricity traded in the market accounted for 30.2% of national power generation in 2018, increasing by 4.3 percentage points compared with the corresponding period of last year. Except for Guangdong Province, the volume of electricity traded in the market where our nuclear power bases were located in other provinces recorded a large increase as compared with 2017.

(II) Business Performance and Analysis

As of the end of 2018, we managed 22 nuclear power generating units in operation and six nuclear power generating units under construction. During the year, we had two new nuclear power generating units commencing commercial operation, namely Yangjiang Unit 5 and Taishan Unit 1.

As of December 31, 2018, the number and capacity of nuclear power generating units in operation and nuclear power generating units under construction are as follows:

		As at December 31, 2018	As at December 31, 2017	Growth rate
Nuclear power generating units in operation	Number	22	20	10.00%
	Capacity	24,306 MW	21,470 MW	13.21%
Nuclear power generating units under construction	Number	6	8	-25.00%
	Capacity	7,434 MW	10,270 MW	-27.61%

We will introduce and analyse the Company's business performance in 2018 in respect of five aspects, namely safety management, nuclear power generating units in operation, nuclear power generating units under construction, sales of electricity and lean management.

Safety Management

Safety is crucial to any company. We always adhere to the concept of “Nuclear Safety is Paramount” and our basic principles of “Safety First, Quality Foremost, Pursuit of Excellence”, and apply them to various stages of the design, construction, operation and decommissioning of the nuclear power plants (“NPPs”). Based on our experience in nuclear power operation over the years, we have established a mature safety management system.

We highly value safety and always place safety at our top priority. We believe that maintaining nuclear power safety is a great responsibility to the State, society, Shareholders, employees and other stakeholders. Only with safety can our units in operation maintain stable operation and our units under construction make steady progress, and thus we can achieve constant improvement in our overall results.

We continue to launch activities such as “On-site Management”, “Observing Nuclear Safety from Compliance with Procedures” and “Precautionary Education on Nuclear Safety Culture” so as to enhance the nuclear safety culture awareness among all employees. At the same time, we continue to promote internal and external supervision as well as dynamic and transparent experience feedback. We organize regular emergency drills under different emergent scenarios and ensure effective operation of safety management system so as to promote the further enhancement of the Company’s safety management level.

According to the International Nuclear and Radiological Event Scale (《國際核事件分級表》) (the “INES”) set by the International Atomic Energy Agency (the “IAEA”), the NPPs we operated and managed have maintained our all-time good safety record of no nuclear event at level 2 or above in 2018.

In 2018, the number of operational events of our nuclear power generating units in operation are as follows:

Base or NPP	Number of Operational Events	
	As of December 31, 2018	As of December 31, 2017
Daya Bay Base (including Daya Bay Nuclear Power Station, Ling'ao Nuclear Power Station and Lingdong Nuclear Power Station)	1	0
Yangjiang Nuclear Power Station	1	5
Fangchenggang Nuclear Power Station	0	2
Ningde Nuclear Power Station	2	7
Taishan Nuclear Power Station *	0	N/A
Hongyanhe Nuclear Power Station	1	2

* Taishan Unit 1 commenced commercial operation on December 13, 2018.

According to the INES of the IAEA, as of December 31, 2018, no operational events at level 1 or above occurred in the 22 nuclear generating units we managed, and a total of five deviations without safety significance (below scale/Level 0) occurred.

Note: Nuclear incidents are classified into seven levels in the INES according to their impact on (i) people and the environment, (ii) radiological barriers and control, and (iii) defence-in-depth. Level 1 to Level 3 are termed “incident”, while Level 4 to Level 7 are termed “accidents”. Events without safety significance are classified as “below scale/Level 0”.

For other related activities of safety management, please refer to the 2018 environmental, social and governance report of the Company.

Nuclear Power Generating Units in Operation

Safe and stable operation of power generating units is the foundation of nuclear power enterprises. In 2018, all nuclear power generating units in operation managed by us maintained safe and stable operation, including Yangjiang Unit 5 and Taishan Unit 1 which have commenced commercial operation, with a total annual on-grid power generation of 157,044.58 GWh, representing a year-on-year increase of 14.02% as compared with that of 2017.

Among which, the total annual on-grid power generation from NPPs managed by our subsidiaries (including Daya Bay Nuclear Power Station, Ling'ao Nuclear Power Station, Lingdong Nuclear Power Station, Yangjiang Nuclear Power Station, Fangchenggang Nuclear Power Station, Ningde Nuclear Power Station and Taishan Nuclear Power Station) amounted to 128,774.43 GWh, representing a year-on-year increase of 11.13% as compared with that of 2017. The total annual on-grid power generation from NPPs managed by our associates (Hongyanhe Nuclear Power Station) amounted to 28,270.15 GWh, representing a year-on-year increase of 29.31% as compared with that of 2017.

Name of NPP	On-grid power generation from January to December 2018 (GWh)	On-grid power generation from January to December 2017 (GWh)	Change rate for the same period (%)
<i>From subsidiaries</i>			
Daya Bay Nuclear Power Station	15,751.48	15,720.17	0.20
Ling'ao Nuclear Power Station ¹	14,260.61	14,741.28	-3.26
Lingdong Nuclear Power Station	16,125.83	15,197.19	6.11
Yangjiang Nuclear Power Station ²	35,138.39	29,962.65	17.27
Fangchenggang Nuclear Power Station ³	15,081.60	11,782.05	28.00
Ningde Nuclear Power Station ⁴	31,732.44	28,469.37	11.46
Taishan Nuclear Power Station ⁵	684.09	Under construction	N/A
Subsidiaries, total	128,774.43	115,872.70	11.13
<i>From associates</i>			
Hongyanhe Nuclear Power Station ³	28,270.15	21,862.17	29.31
Subsidiaries and associates, total	157,044.58	137,734.87	14.02

Notes:

1. Duration of refuelling outage of Ling'ao Nuclear Power Station in 2018 was longer as compared with 2017.
2. Yangjiang Unit 4 commenced commercial operation on March 15, 2017. Yangjiang Unit 5 commenced commercial operation on July 12, 2018. Duration of refueling outage of Yangjiang Nuclear Power Station in 2018 was longer as compared with 2017.
3. Duration of refuelling outage of Fangchenggang Nuclear Power Station and Hongyanhe Nuclear Power Station in 2018 was longer as compared with 2017. Duration of temporary operation at reduced load or shutdown as requested by power grids was shorter as compared with 2017.
4. Duration of temporary operation at reduced load or shutdown of Ningde Nuclear Power Station as requested by power grids in 2018 was shorter as compared with 2017.
5. Taishan Unit 1 commenced commercial operation on December 13, 2018 and started statistics for on-grid power generation.

Operation Performance

Capacity factor, load factor and utilization hours are the three indicators normally used by us to evaluate the utilization of nuclear power generating units. They are mainly subject to the effects of refuelling outages for the generating units. According to the arrangements of the annual outage plan, there are certain differences between the duration of refuelling outages for different generating units, and refuelling outages may be implemented over to the next year, resulting in small differences between the duration of outages in different years with respect to the same type of refuelling outage for the same type of generating unit. Meanwhile, load factor and utilization hours of nuclear power generating units are also under the influence of temporary operation at reduced load or shutdown resulting from the demand and supply conditions of the electricity market.

In 2018, we had 22 nuclear power generating units in operation, with an average capacity factor of 92.75%, an average load factor of 86.94% and average utilization hours of 7,554 hours, as compared with 89.59%, 79.31% and 6,906 hours of the 20 nuclear power generating units in operation in 2017. The details of the operation performance of generating units we operated and managed in 2018 are as follows:

Nuclear power station	Capacity factor (%)		Load factor (%)		Utilization hours (hours)	
	2018	2017	2018	2017	2018	2017
<i>From subsidiaries</i>						
Daya Bay Unit 1 ¹	89.25	99.98	90.34	101.23	7,915	8,869
Daya Bay Unit 2 ²	99.72	88.74	100.87	89.41	8,838	7,834
Ling'ao Unit 1 ³	87.52	89.15	84.19	84.59	7,373	7,408
Ling'ao Unit 2 ⁴	92.09	96.32	87.61	93.22	7,672	8,164
Lingdong Unit 1 ⁵	89.32	86.99	88.12	84.19	7,720	7,369
Lingdong Unit 2 ⁶	98.34	91.33	91.85	85.97	8,047	7,525
Yangjiang Unit 1 ⁷	88.23	99.61	86.09	97.10	7,541	8,506
Yangjiang Unit 2 ⁸	99.98	87.97	99.72	84.17	8,736	7,373
Yangjiang Unit 3 ⁹	91.61	86.49	88.58	83.00	7,759	7,271
Yangjiang Unit 4 ¹⁰	82.42	90.00	73.79	89.41	6,464	7,832
Yangjiang Unit 5 ¹¹		Under		Under		Under
	99.60	construction	95.05	construction	8,326	construction
Fangchenggang Unit 1 ¹²	89.60	76.19	83.32	59.05	7,299	5,172
Fangchenggang Unit 2 ¹³	99.98	80.70	85.87	74.25	7,522	6,505
Ningde Unit 1 ¹⁴	88.50	83.66	84.48	79.86	7,401	6,996
Ningde Unit 2 ¹⁵	89.13	98.80	86.30	91.11	7,560	7,981
Ningde Unit 3 ¹⁶	92.54	95.62	89.54	88.20	7,843	7,726
Ningde Unit 4 ¹⁷	99.99	84.38	94.27	60.63	8,258	5,311
Taishan Unit 1 ¹⁸		Under		Under		Under
	96.47	construction	94.97	construction	8,319	construction
<i>From associates</i>						
Hongyanhe Unit 1 ¹⁹	99.98	88.92	95.95	79.41	8,406	6,957
Hongyanhe Unit 2 ²⁰	89.80	98.08	84.03	63.77	7,362	5,586
Hongyanhe Unit 3 ²¹	91.17	83.07	71.11	61.46	6,231	5,384
Hongyanhe Unit 4 ²²	85.16	85.76	56.56	36.14	4,956	3,166

Notes:

1. Daya Bay Unit 1 completed a refuelling outage in 2018 and did not conduct any refuelling outage in 2017.
2. Daya Bay Unit 2 did not conduct any refuelling outage in 2018 and completed a refuelling outage in 2017.
3. Ling'ao Unit 1 completed a refuelling outage in 2018 and refuelling outage duration in 2018 was longer compared with 2017.
4. Ling'ao Unit 2 completed a refuelling outage in 2018 and did not conduct any refuelling outage in 2017.
5. Lingdong Unit 1 completed a refuelling outage in 2018 and refuelling outage duration in 2018 was shorter compared with 2017.
6. Lingdong Unit 2 did not conduct any refuelling outage in 2018 and completed a refuelling outage in 2017.
7. Yangjiang Unit 1 completed a refuelling outage in 2018 and did not conduct any refuelling outage in 2017.
8. Yangjiang Unit 2 did not conduct any refuelling outage in 2018 and completed a refuelling outage in 2017.
9. Yangjiang Unit 3 completed a refuelling outage in 2018 and refuelling outage duration in 2018 was shorter compared with 2017.
10. Yangjiang Unit 4 completed the initial outage after commencement of operation in 2018 and its duration was longer, being similar to that of a ten-year outage.
11. Yangjiang Unit 5 commenced commercial operation on July 12, 2018.
12. Fangchenggang Unit 1 completed a refuelling outage in 2018 and refuelling outage duration in 2018 was shorter compared with 2017.
13. Fangchenggang Unit 2 did not conduct any refuelling outage in 2018 and completed a refuelling outage in 2017.
14. Ningde Unit 1 commenced a refuelling outage in 2018 and was completed on January 5, 2019. Refuelling outage duration in 2018 was flat compared with 2017.
15. Ningde Unit 2 completed a refuelling outage in 2018 and did not conduct any refuelling outage in 2017.
16. Ningde Unit 3 completed a refuelling outage in 2018 and refuelling outage duration in 2018 was longer compared with 2017.
17. Ningde Unit 4 did not conduct any refuelling outage in 2018 and completed a refuelling outage in 2017.
18. Taishan Unit 1 commenced commercial operation on December 13, 2018.
19. Hongyanhe Unit 1 did not conduct any refuelling outage in 2018 and completed a refuelling outage in 2017.

20. Hongyanhe Unit 2 completed a refuelling outage in 2018 and did not conduct any refuelling outage in 2017.
21. Hongyanhe Unit 3 completed a refuelling outage in 2018 and refuelling outage duration in 2018 was shorter compared with 2017.
22. Hongyanhe Unit 4 completed the initial outage after commencement of operation in 2018 and its duration was longer, being similar to that of a ten-year outage.

Based on the design of pressurised water reactor (the “PWR”) NPPs, the nuclear reactor of each unit in operation must be shut down and refuelled after a certain period of time. Taking the safety and economic considerations for NPPs into account, nuclear power operators often make use of the refuelling period to intensively conduct preventive and corrective maintenance projects as well as various modifications projects, and this is usually referred to as refuelling outage by NPPs. The refuelling intervals of our nuclear power stations are generally 12 to 18 months. According to the technical requirements for the operation of NPPs, inspection, testing and maintenance for major equipment are required every ten years. Such activities will be conducted during the refuelling period of generating units, and this is usually referred to as ten-year outage by NPPs. In addition to the refuelling outage and ten-year outage, the refuelling outage of new generating units conducted in the next year after commencement of operation is usually referred to as initial outage.

During the refuelling outage period, we carry out inspection, maintenance and modifications for equipment with selectivity based on the requirements of nuclear power station preventive maintenance guidelines, in-service inspection guidelines, requirements on operation technology specification as well as the experience on the operation of generating units to secure the safety of the units, improve the operating performance of the equipment, and ensure that the units would maintain good operating conditions in the next cycle according to the design requirements.

Considering the economic factors and arrangements for related works, refuelling outages intervals of nuclear power generating units are not fixed to every 12 to 18 months. In order to ensure the safe operation of the generating units, we usually take local power load fluctuations into account and communicate with local power grid companies to rationalize the refuelling outage plans for generating units. As the needs for inspection and maintenance projects are different, the duration of each refuelling outage is not identical. More inspection items are required for the initial and ten-year outages, resulting in a longer inspection period compared to that of regular refuelling outages. According to the specific operating conditions of each generating unit, we continue to enhance and develop targeted refuelling outage plans, reasonably arrange inspection and maintenance projects, and actively adopt advanced technology to improve the efficiency of inspection and maintenance, in order to have good control over the duration of each refuelling outage on the premise of ensuring the quality of safety.

In 2018, we successfully conducted 14 refuelling outages, including the refuelling outage of Ningde Unit 3 conducted at the end of 2017 and completed 13 refuelling outages during the year including two initial outages. Another one refuelling outage was conducted over to the next year.

In 2018, the total aggregate number of calendar days for refuelling outages was approximately 525 days.

“Pursuit of Excellence” is one of the basic principles of the Company. In order to discover our inadequacies and make sustained improvements, we continue to compare our indicators with international counterparts. When compared with the one-year benchmark value of the 12 performance indicators for the PWR set by the World Association of Nuclear Operators (“WANO”), for our nuclear power units, the ratio of performance indicators achieving the world’s top 1/4 level and top 1/10 level remained at a high level. Ling’ao Unit 1 has been operating without unplanned reactor shutdown for more than 4,600 days (excluding refueling outages duration) and continued to rank No. 1 among units of the same type in the world.

The following table indicates the comparison of our 22 nuclear power generating units for 2018 and the one-year benchmark value of the 12 performance indicators for the PWR set by WANO in 2017:

	2018	2017
Number of units	22	20
Total number of indicators	264	240
Including:		
Number/percentage of indicators ranked top 1/4 level in the world	208/78.79%	177/73.75%
Number/percentage of indicators ranked top 1/10 level in the world	193/73.11%	164/68.33%

Environmental Performance

We continued to improve radioactive waste management, optimize emissions discharge process and strictly comply with emission control standards. In 2018, the radioactive waste management of the 22 generating units in operation managed by us has strictly complied with the national laws and regulations, and has met the standards of the relevant technical specifications.

The following table sets forth the amounts and percentages of the various types of radioactive waste discharged at our NPPs for the period indicated as a percentage of the national standards. The amounts of all of the radioactive substances discharged by all of our NPPs were below the applicable PRC limits.

	Daya Bay Base Area (including Daya Bay Nuclear Power Station, Ling'ao Nuclear Power Station and Lingdong Nuclear Power Station)											
	Yangjiang Nuclear Power Station		Fangchenggang Nuclear Power Station		Ningde Nuclear Power Station		Taishan Nuclear Power Station		Hongyanhe Nuclear Power Station			
	2018	2017	2018	2017	2018	2017	2018	2017	2018	2017	2018	2017
Discharged liquid radioactive waste (radionuclides other than tritium) as a percentage of the national standards	0.35%	0.47%	0.29%	0.38%	0.43%	0.78%	0.30%	0.38%	0.54%	Under construction	0.21%	0.22%
Discharged gas radioactive waste (inert gases) as a percentage of the national standards	0.56%	0.44%	0.24%	0.30%	0.35%	0.39%	0.30%	0.51%	0.71%	Under construction	0.21%	0.15%
Solid radioactive waste (m ³)	248.6	276.4	44.8	42.8	64.6	101.3	136.8	129.6	0	Under construction	159.6	196.8
Results of environmental monitoring	Normal	Normal	Normal	Normal	Normal	Normal	Normal	Normal	Normal	Normal	Normal	Normal

Note: The main reason for changes in the data includes: the refuelling outage plan is different for every unit, maintenance projects are different, Yangjiang Unit 5 and Taishan Unit 1 were put into commercial operation in 2018.

The Ministry of Ecology and Environment continuously monitored the air-absorbed rates in the periphery of our nuclear power generating units in operation in the PRC. The monitoring data indicated that the air-absorbed rates fell within the fluctuation range of local background radiation levels.

Nuclear power is a clean energy source that contributes to energy saving and emissions reduction to the society. Our annual on-grid nuclear power generation in effect represented a reduction of approximately 48.3697 million tons of standard coal consumption, approximately 132.5456 million tons of CO₂ emissions, with an equivalent effect of planting a forest of 0.3534 million hectares.

Nuclear Power Generating Units under Construction

The quality of units under construction is important for the safe and efficient operations of nuclear power generating units after commencement of operation. We meticulously organize project construction in strict compliance with the requirements of relevant laws and regulations. We would enter into the next phase of work only after passing the inspection of the national regulatory authorities which confirmed our compliance with the requirements. We also attach importance to learning from experience feedbacks of domestic and foreign NPP construction, and improving of the safety and quality of our construction work.

As of December 31, 2018, among six nuclear power generating units we construct, two were in the commissioning phase, three were in the equipment installation phase and one were in the civil construction phase.

We control, supervise and manage aspects including the safety, quality, progress, investment, technology and environment of our construction projects, so as to ensure that the projects under construction comply with various regulatory requirements and facilitate safe, stable and economical operation of the units after commencement of commercial operation.

Nuclear Power Generating Units	Civil Construction Phase ¹	Equipment Installation Phase ²	Commissioning Phase ³	Grid Connection Phase ⁴	Expected Date of Commencement of Operation
<i>From subsidiaries</i>					
Yangjiang Unit 6			√		Second half of 2019
Taishan Unit 2			√		2019
Fangchenggang Unit 3		√			2022
Fangchenggang Unit 4	√				2022
<i>From associates</i>					
Hongyanhe Unit 5		√			Second half of 2020
Hongyanhe Unit 6		√			2021

Notes:

- ¹ “Civil construction” phase refers to the process from the First Concrete Day (FCD) to the proper roof installation of the main plant of the nuclear reactor.
- ² “Equipment installation” phase refers to the process from the installation of nuclear island equipment upon the roof installation of the main plant of the nuclear reactor to the nuclear island main system meeting the conditions to conduct cold function tests.
- ³ “Equipment commissioning” phase refers to the process of conducting cold function tests for nuclear island main system and commencing joint debugging for the power plant.
- ⁴ “Grid connection” phase refers to the commissioning of generators upon the first grid connection with the power grid, demonstrating that the power generating units are capable for power generation.

The construction process of nuclear power generating units may be affected by various factors including, among others, delivery delays, increase in the cost of key equipment and materials, delay in obtaining regulatory approvals, permits or licenses, unexpected engineering, environmental or geological problems, change of localization ratio as well as the implementation of additional PRC regulatory and safety requirements for nuclear safety, so the actual date of commencement of operation may be different from such expected date. We will disclose updated information pursuant to the relevant requirements from time to time.

On May 23, 2018, Fangchenggang Unit 3 entered the equipment installation phase.

On December 10, 2018, Taishan Unit 2 began the hot functional test. On January 25, 2019, Taishan Unit 2 has completed the hot functional test.

On October 31, 2018, Yangjiang Unit 6 completed the cold functional test. On February 23, 2019, Yangjiang Unit 6 has completed the hot functional test.

The remaining units under construction of the Company are under steady progress as planned.

Sales of Electricity

Over 90% of the Group's revenue came from sales of electricity by our subsidiaries. We sell the electricity generated by our NPPs based on electricity sales contracts. In 2018, the on-grid power generation of our subsidiaries was 128,774.43 GWh and the sales revenue of electricity was approximately RMB46,071.8 million, representing 90.6% of our operating revenue for the year.

In 2018, the condition of oversupply of electricity in the PRC has improved. As the economic development condition of each region differs, the demand and supply for electricity in some provinces where our nuclear power generating units are located varies. In light of the complex power market situation, the Company adopted the power sales strategy of “striving for more shares of planned on-grid power generation, striving for better market power generation and power tariff and striving for development and utilization of incremental market”, and completed our power plan for the year and guaranteed the overall economic benefits of the Company.

We actively communicated and coordinated with national competent departments to promote the efficient implementation of the Provisional Measures for Nuclear Power Offtake under the Condition of Securing Nuclear Safety (《保障核電安全消納暫行辦法》) in various provinces. In November 2018, the NDRC and the National Energy Administration issued the Action Plan, providing good conditions for securing nuclear power consumption.

The electricity consumption in Guangdong Province increased by 6.1% in 2018 over the corresponding period of previous year. In 2018, the Company and Guangdong Provincial Government have agreed that, in order to prevent uncertainties caused by market volatility, the Company's nuclear power units in Guangdong Province will participate in electricity market in the “full load power generation with favourable tariff” model in 2018, which is expected to be maintained in the next two years.

The electricity consumption in Fujian Province increased by 9.5% in 2018 over the corresponding period of previous year. In 2018, by pursuing more market-based generation and generation right transactions, the on-grid power generation of Ningde Nuclear increased by 11.46% over the corresponding period of previous year.

The electricity consumption in Liaoning Province increased by 7.8% in 2018 over the corresponding period of previous year. In 2018, as the electricity transmission lines of Hongyanhe Nuclear have completed, we strived for expanding outbound electricity quota and electricity sales channels, and the on-grid power generation of Hongyanhe Nuclear increased by 29.31% over the corresponding period of previous year.

The electricity consumption in Guangxi Zhuang Autonomous Region increased by 17.8% in 2018 over the corresponding period of previous year. Since we developed new market and participated in cross-district electricity transmission, the on-grid power generation of Fangchenggang Nuclear increased by 28.00% over the corresponding period of previous year.

In 2018, our nuclear power generating units in operation achieved a total on-grid power generation of 157,044.58 GWh, representing a year-on-year increase of 14.02%, including the market-based power generation volume of 37,380.91 GWh from the other nuclear power generating units excluding Guangdong province, accounting for approximately 23.80% of the on-grid power generation, representing a year-on-year increase of 9.37 percentage points over the corresponding period in 2017.

While striving to increase on-grid power generation, we also paid close attention to the on-grid tariffs of operating units. In 2018, the on-grid tariffs of planned power generation by commercial nuclear power units of the Company remained stable. As the oversupply condition of electricity improved, on-grid tariffs of market-based power generation became rational and its difference with on-grid tariffs of planned power generation was narrowed every year. In 2018, average electricity tariff of other nuclear power units' electricity traded in market (except Guangdong province) was approximately RMB0.3492/kWh (VAT included).

As of December 31, 2018, the on-grid tariffs (VAT included) of the planned electricity sales of our nuclear power generating units in operation is as follows:

Nuclear Power		On-grid Tariffs (VAT included) (RMB/kWh)
Generating Units	Clients	
Daya Bay Unit 1	Guangdong Power Grid Co., Ltd.	0.42
Daya Bay Unit 2	Guangdong Power Grid Co., Ltd.	0.42
Ling'ao Unit 1	Guangdong Power Grid Co., Ltd.	0.429
Ling'ao Unit 2	Guangdong Power Grid Co., Ltd.	0.429
Lingdong Unit 1	Guangdong Power Grid Co., Ltd.	0.43
Lingdong Unit 2	Guangdong Power Grid Co., Ltd.	0.43
Yangjiang Unit 1	Guangdong Power Grid Co., Ltd.	0.43
Yangjiang Unit 2	Guangdong Power Grid Co., Ltd.	0.43
Yangjiang Unit 3	Guangdong Power Grid Co., Ltd.	0.43
Yangjiang Unit 4	Guangdong Power Grid Co., Ltd.	0.43
Yangjiang Unit 5	Guangdong Power Grid Co., Ltd.	0.43
Fangchenggang Unit 1	Guangxi Power Grid Co., Ltd.	0.4207
Fangchenggang Unit 2	Guangxi Power Grid Co., Ltd.	0.4207
Ningde Unit 1	Fujian Electric Power Co., Ltd.	0.43
Ningde Unit 2	Fujian Electric Power Co., Ltd.	0.43
Ningde Unit 3	Fujian Electric Power Co., Ltd.	0.4055
Ningde Unit 4	Fujian Electric Power Co., Ltd.	0.3717
Hongyanhe Unit 1	Liaoning Electric Power Co., Ltd.	0.4142
Hongyanhe Unit 2	Liaoning Electric Power Co., Ltd.	0.4142
Hongyanhe Unit 3	Liaoning Electric Power Co., Ltd.	0.4142
Hongyanhe Unit 4	Liaoning Electric Power Co., Ltd.	0.4142

Note: According to the Notice on Reducing the On-grid Tariffs of Some Power Generation Enterprises (《關於降低部分發電企業上網電價的通知》) issued by the Fujian Provincial Price Bureau in September 2018, the on-grid tariff of Ningde Units 1 to 4 was confirmed by both Ningde Nuclear and Fujian Electric Power Co., Ltd (福建省電力有限公司).

As at the date of this announcement, Taishan Nuclear had not received the on-grid tariff approval document for the planned power generation of the relevant units. Under normal circumstances, local power grid company will pay 80% of the benchmark on-grid tariff of the local coal-fired generating unit (desulfurization) as the provisional tariff during the period between the unit is put into commercial operation and the on-grid tariff of the planned power generation is approved, and such portion of the tariff will be retroactively settled after the approval of the commercial tariff.

Lean Management

We continue to put efforts into lean management. In 2018, we made certain achievements in lean management.

In order to effectively control the operation and maintenance costs of power stations, we have formulated a cost control plan for the past three years based on the results of benchmarking with domestic and overseas counterparts, and issued standards for different items of cost and expense. Based on these standards, each NPP and specialized company actively improved the independent maintenance rate and utilization rate of standard working hours, continuously optimized the preventive maintenance strategy of equipment, promoted business integration, and strengthened the coordination and management of contractors, etc. With the effective implementation of these measures, the Company basically achieved the cost control target of 2018 under the premise of ensuring safety and quality.

(III) Future Outlook

With the PRC's economy entering into a period of high-quality development, and the ongoing intensified implementation of power system reform, the Company's development and operation are facing a lot of new requirements and new changes. We will adhere to the nuclear safety culture with "Honesty and Transparency" and the basic principle of "Safety First, Quality Foremost, Pursuit of Excellence" as well as the core value of "Doing Things Right in One Go" to explore new ideas, actively plan and respond.

In 2019, we plan to carry out the following initiatives:

- We will fully implement the requirements of the Nuclear Safety Law of the People's Republic of China (《中華人民共和國核安全法》) and strengthen nuclear safety management and responsibilities;
- In the premise of ensuring safety and quality, we will push forward construction of generating units as planned. Two generating units under construction (Yangjiang Unit 6 and Taishan Unit 2) are expected to commence commercial operation in 2019;

- We will ensure the safe and stable operation of all the generating units in operation. We plan to conduct 17 refuelling outages during the year (including an initial refuelling outage). According to the regular arrangement of power grids during holidays, we plan to mainly conduct five refuelling outages in the first quarter, six in the second quarter, three in the third quarter, and three in the fourth quarter of 2019;
- We will adapt to the changes in the electricity market situation, continuously optimize the marketing system, and mechanism of electricity market, and develop the capabilities of the marketing team for sales of electricity to strive for more on-grid generation through various channels and initiatives, striving to achieve an average utilization hour of generating units in 2019 not less than that in 2018;
- We will promote reliability of fuels and equipment, and improve safety system performance of power generating units with business growth driven by independent innovation such as application of technology innovation and technical transformation, in order to facilitate the sustainable development of the Company;
- We will continuously push forward the implementation of specialization, centralization and standardization management strategy and lean management and strengthen internal resource coordination and cooperation to effectively control construction cost of units under construction as well as operation and management cost of generating units in operation; and
- We will closely follow the change of national policy, domestic and international economic and financial environment, adhere to the principle of prudence, identify changes in risks in a timely manner through operation of risk management system, and adjust our measures when appropriate to ensure the steady development of the Company.

HUMAN RESOURCES

The total number of employees of the Group was 18,663 (excluding our affiliates) as of December 31, 2018. The Group implements remuneration policy that is competitive in the industry, and pays commissions and discretionary bonus to its employees with reference to performance of the Group and individual employees. The total cost of the employees for the year ended December 31, 2018 amounted to approximately RMB8,839.6 million (exclusive of our associates and joint ventures).

The Company has established a long-term share appreciation rights incentive scheme to enhance its attractiveness to key talents and create more value for Shareholders. The H Shares Appreciation Rights Scheme was approved at the 2014 annual general meeting held on June 12, 2015. The details of the grant of the SAR are set out in Note 21 to the financial information in this announcement.

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

Neither the Company nor any of its subsidiaries purchased, sold or redeemed any of the Company's listed securities during the year ended December 31, 2018.

FINAL DIVIDEND AND CLOSURE OF SHARE REGISTER OF MEMBERS

When considering the dividend distribution ratio, the Company will take into consideration the business performance of the Company for the year, the future development strategies of the Company and other factors for cash distributions, provided that it shall not be lower than 33% of the distributable net profits for the year. The Company intends to provide its Shareholders with steady and growing dividend by maintaining a reasonable increase in dividend (the dividend for respective year subject to approval at the annual general meeting of the relevant financial year) in the three financial years of 2018, 2019 and 2020 based on the annual dividend per share for 2017.

The Board has proposed to declare a final cash dividend of RMB0.072 (tax inclusive) per share for the year from January 1, 2018 to December 31, 2018 to our Shareholders as of the record date of dividend payment. The ratio of final dividend distribution for the year is based on the consideration of various factors including the business performance of the Company for the year 2018. The distribution of dividends for 2018 shall be subject to the Shareholders' approval at the 2019 first extraordinary general meeting of the Company which will be convened on April 23, 2019 and it is expected to be paid on or around June 5, 2019.

The share register of members of the Company will be closed from April 27, 2019 (Saturday) to May 2, 2019 (Thursday) (both days inclusive) to determine Shareholders' entitlement to the final dividend. In order to qualify for the final dividend, all the transfer documents of the Company accompanied by relevant share certificates, must be lodged to Hong Kong Investor Services Limited, the share registrar for H shares at Shops 1712-1716, 17th Floor, Hopewell Center, 183 Queen's Road East, Wanchai, Hong Kong ("**H Share Registrar**") (for holders of H Shares) or the office of the Board at the headquarters in the PRC at 18/F, South Tower, CGN Building, No. 2002, Shennan Road, Futian District, Shenzhen, Guangdong Province, the PRC (the "**Office of the Board**") (for holders of domestic shares) no later than 4:30 p.m. on April 26, 2019 (Friday). For details of the distribution of the final dividend of the Company, please refer to the relevant circular issued by the Company on March 12, 2019.

EXCHANGE RATE

For the year ended December 31, 2018, the Group has not suffered any major difficulties of or impacts on its operations or liquidity due to exchange rate fluctuations. For the risk of exchange rate fluctuations of the Company, we have been adhering to the principle of prudence, conducting timely debt hedging and risk prevention arrangements to reduce the impact of financial market volatility on the Company's operating costs, expected earnings and cash flow.

SUBSEQUENT EVENT

On January 4, 2019, the resolution on the equity transfer agreement proposed to be entered into between CGN Engineering and CGNPC was considered and approved by the Board. Pursuant to the equity transfer agreement, CGN Engineering sold 100% equity interests in Shanghai Engineering Science & Technology Co., LTD (上海中廣核工程科技有限公司) to CGNPC at a consideration of approximately RMB710 million. For details, please refer to the relevant announcement of the Company dated January 4, 2019.

ANNUAL GENERAL MEETING AND CLOSURE OF SHARE REGISTER OF MEMBERS

The Company intends to convene the 2018 annual general meeting in May 2019. The share register of members of the Company will be closed from April 29, 2019 (Monday) to May 29, 2019 (Wednesday) (both days inclusive) to determine Shareholders' entitlement to attend and vote at the annual general meeting. In order to be entitled to attend and vote at the annual general meeting, all the transfer documents of the Company accompanied by relevant share certificates, must be lodged to the H share Registrar of the Company in Hong Kong (for holders of H Shares) or the Office of the Board (for holders of domestic shares) no later than 4:30 p.m. on April 26, 2019 (Friday). For the exact date in relation to the closure of share register, please refer to the circular of the 2018 annual general meeting to be issued by the Company in due course.

For the matters to be considered and approved at the 2018 annual general meeting and the date of the 2018 annual general meeting, please refer to the circular of the 2018 annual general meeting to be issued by the Company in due course at a later date.

COMPLIANCE WITH THE CORPORATE GOVERNANCE CODE

The Company has complied with the code provisions as set out in the Corporate Governance Code and Corporate Governance Report (the “**Stock Exchange Codes**”) contained in Appendix 14 to the Listing Rules. Meanwhile, on November 14, 2018, the Board approved the second revision of the Corporate Governance Code of the Company that was adopted by the Company. This revision mainly considered and absorbed the suggested revision requirements of the Listing Rules. The Corporate Governance Code of the Company includes the basic requirements of the Stock Exchange Code and in many aspects exceeds the standards of its recommended best practices.

During the period from January 1, 2018 to December 31, 2018, the Company had complied with the all code provisions contained in the Stock Exchange Codes, except for the one of the best recommended practices proposed in the Stock Exchange Codes (namely a listed company should announce and publish quarterly results report). Nonetheless, we have published reports on operation data of the Company on a quarterly basis. At the end of every quarter, we publish quarterly financial statements in the domestic market in accordance with the requirements of the mainland’s bond market, and also made overseas regulatory announcements on the Stock Exchange’s website simultaneously to disclose the quarterly financial position based on the CASBE, and provide explanations on their differences with the International Accounting Standards where appropriate.

According to the features of the industry, we have established the Nuclear Safety Committee under the Board, which enables us to enhance the supervision on nuclear safety and management for the Company. The nomination committee of the Board has established the board diversity policy with indicators, set up the standards of the board composition and the quantified indicators for Directors’ performance. We set up early schedules for the Board meetings, specialized committee meetings, supervisory meetings, trainings for supervisors and inspection planning throughout the year, reporting the information on operation and production of the Company to the Board in a timely manner.

COMPLIANCE WITH THE MODEL CODE FOR SECURITIES TRANSACTIONS BY DIRECTORS

The Company has adopted the Model Code for Securities Transactions by Directors of Listed Issuers (the “**Model Code**”) as set out in Appendix 10 to the Listing Rules as the code of conduct regarding securities transactions of the Company by directors and supervisors of the Company. The Company has also formulated and adopted the Code for Securities Transactions by Directors and Specified Individuals on terms no less exacting than those of the Model Code. According to the specific enquiry made to all Directors and supervisors of the Company, all Directors and supervisors of the Company have confirmed that they have strictly complied with the standards set out in the Model Code throughout the Reporting Period.

AUDIT AND RISK MANAGEMENT COMMITTEE

The Company has established an audit and risk management committee (the “**Audit and Risk Management Committee**”) in compliance with the requirements of Rule 3.21 of the Listing Rules and the Stock Exchange Codes with written terms of reference. The Board has delegated to the Audit and Risk Management Committee with written terms of reference prepared according to the relevant requirements of the Articles of Association, the Company Law of the PRC, the Listing Rules, and A Guide for Effective Audit Committees published by the Hong Kong Institute of Certified Public Accountants. The terms of reference are detailed in the Terms of Reference for the Audit and Risk Management Committee under the Board of Directors of the Company and set out on the websites of the Company and the Stock Exchange. As of the date of this announcement, the Audit and Risk Management Committee comprises one non-executive Director (Mr. Zhang Yong) and two independent non-executive Directors (Mr. Na Xizhi and Mr. Francis Siu Wai Keung). Mr. Francis Siu Wai Keung, who possesses accounting qualification, acts as the chairman of the Audit and Risk Management Committee.

The Audit and Risk Management Committee has reviewed the 2018 annual results and the consolidated financial statements for the year ended December 31, 2018 of the Group prepared in accordance with the CASBE.

AUDITORS

Deloitte Touche Tohmatsu Certified Public Accountants LLP has audited the consolidated financial statements for the year ended December 31, 2018 prepared by the Company in accordance with the CASBE.

PUBLICATION OF ANNUAL RESULTS AND ANNUAL REPORT

This results announcement is published on the Stock Exchange’s website (<http://www.hkexnews.hk>) and the Company’s website (<http://www.cgnp.com.cn>) respectively.

The Company will dispatch to the Shareholders in due course all the information required by the Listing Rules together with the 2018 Annual Report of the Company, which will also be published on the websites of the Company and the Stock Exchange.

By order of the Board
CGN Power Co., Ltd.*
Zhang Shanming
Chairman

The PRC, March 12, 2019

If there is any discrepancy between the English version and the Chinese version in respect of this announcement, the Chinese version shall prevail.

As at the date of this announcement, the Board of the Company comprises Mr. Gao Ligang as executive Director; Mr. Zhang Shanming, Mr. Tan Jiansheng, Mr. Shi Bing, Ms. Zhong Huiling and Mr. Zhang Yong, as non-executive Directors; Mr. Na Xizhi, Mr. Hu Yiguang and Mr. Francis Siu Wai Keung, as independent non-executive Directors.