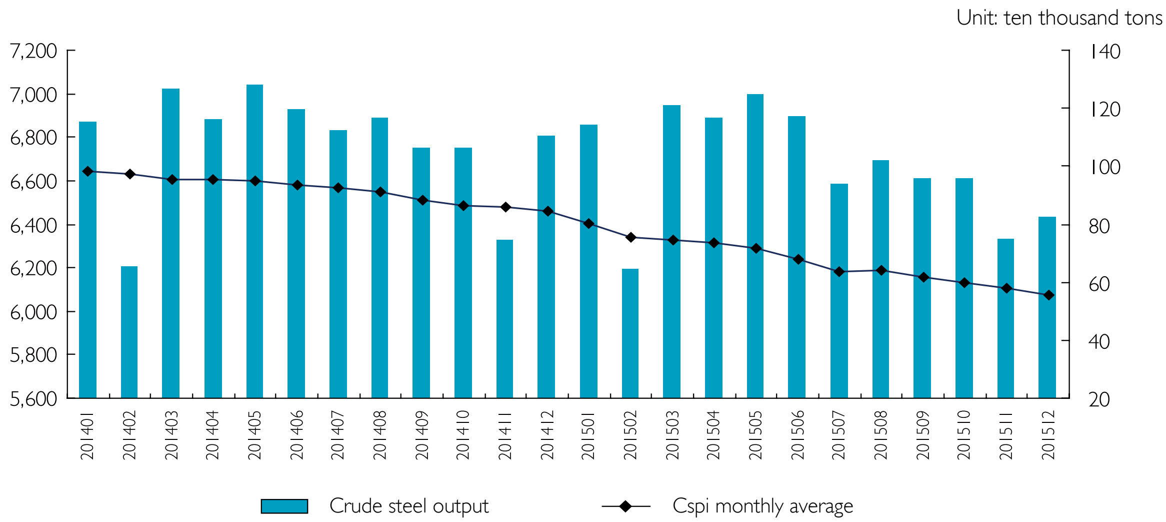
Section IV Management Discussion and Analysis

I. Management Discussion and Analysis

As global economy didn't recover as expected and with greater pressure from domestic economy downturn, downstream steel industries such as construction, machinery and automobile slowed their growth rates in 2015. National crude steel output in 2015 was 804 million tons, down by 2.3% year-on-year, the first annual drop since 1981. Large- and medium- sized steelmakers have even incurred their first loss as a whole since reform and opening up policy, which led the steel industry into a new era of reduction development.

Supply-side structural conflict was further highlighted in 2015, with slumped steel price continuing. CSPI index has fallen by 27.3% month-on-month in 2015. Platts 62% was USD 55.50, down by 42.7% month-on-month on average basis. However, slump in steel price had much more impact on the sales revenue than that of price falling in raw materials on cost, which resulted in another narrowed profit of the Company.



Data resource: wind CSPI: China Steel Price Index (CISA)

The Company has successfully gone through the impact of factors such as continuous depression in downstream market demand, slump in RMB exchange rate and parallel operation of internal production and construction, through boosting synergy between output and sales, leveling up its capabilities of manufacturing key products and safeguarding resources to intensify control on operation capital, reduce cost and enhance efficiency across all systems so as to cope with rigorous external environment. 22.1483 million tons of steel products were sold in 2015, realizing RMB 164.12 billion of gross operating revenue and total profit of RMB 1.85 billion.

II. Main Operation during the Reporting Period

Analysis of main operation during the reporting period is as follows:

(I) Principal business analysis

Analysis of Change in Relevant Items of Profit and Cash Flow Statement

Unit: Million RMB

Items	Amount in the reporting period	Amount over the same period last year	Change ratio (%)
Operating revenue	163,790	187,414	-12.61
Operating cost	149,258	168,931	-11.65
Sales expenses	2,153	2,200	-2.16
Administrative expenses	7,287	7,728	-5.71
Financial expenses	2,393	488	390.57
Net cash flow from operating activities	21,177	28,280	-25.12
Net cash flow from investing activities	-21,676	-18,964	-14.30
Net cash flow from financing activities	-1,119	-9,534	88.26
R&D expenditures	3,449	3,935	-12.35

1. Income and Cost Analysis

(1) Principal business by industry, products and regions

Unit: Million RMB

Principal business by industry						
Industry	Operating revenues	Operating costs	Gross margin	YoY change in revenue	YoY change in cost	YoY Change in gross margin
Steel manufacturing	96,816	88,234	8.86	-19.73	-18.72	Down by 1.1 ppt.
Processing and distribution	140,690	136,188	3.20	-13.74	-14.25	Up by 0.6 ppt.
Information technology	3,938	2,864	27.26	-3.30	-2.31	Down by 0.7 ppt.
E-commerce	20,061	20,036	0.13	32.78	33.25	Down by 0.4 ppt.
Chemical industry	7,627	7,253	4.90	-17.27	-13.66	Down by 4.0 ppt.
Finance	628	306	51.34	1.50	5.17	Down by 1.7 ppt.
Offset between segments	-105,520	-105,348				
Total	164,239	149,531	8.95	-12.58	-11.62	Down by 1.0 ppt.

Principal business by products						
Products	Operating revenue	Operating cost	Gross margin (%)	YoY change in revenue (%)	YoY change in cost (%)	YoY change in gross margin (%)
Cold-rolled carbon steel sheets and coils	41,655	35,695	14.31	-18.91	-18.85	Down by 0.1 ppt.
Hot-rolled carbon steel sheets and coils	22,937	20,259	11.67	-20.40	-17.16	Down by 3.5 ppt.
Steel tubes and pipes	7,450	7,520	-0.94	-18.27	-17.71	Down by 0.7 ppt.
Other steel products	7,691	7,413	3.60	-21.75	-23.73	Up by 2.5 ppt.
Total	79,733	70,888	11.09	-19.57	-18.83	Down by 0.8 ppt.

Principal business by regions						
Regions	Operating revenue	Operating cost	Gross margin (%)	YoY change in revenue (%)	YoY change in cost (%)	YoY change in gross margin (%)
Domestic market	142,711	129,352	9.36	-14.45	-3.12	Down by 1.1 ppt.
Overseas market	21,525	20,179	6.25	2.22	-1.34	Up by 0.2 ppt.

Notes for principal business by industry, products and regions:

Based on the internal organizational structure, the Company is divided into the segments of steel manufacturing, processing and distribution, information technology, e-commerce, chemical industry and finance. The steel manufacturing segment includes all steel manufacturing units; the processing and distribution segment includes the trading units such as Baosteel international and overseas companies; the information technology segment offers the business of Baosight Software; the e-commerce segment includes Ouyeel and other units; the chemical industry segment offers the business of Chemical Company; the finance segment offers the business of Finance Co.

Due to slump in steel price, continuous depressed demand in downstream industries and other factors, gross margin in principal products of the Company has sharply fallen in 2015 year-on-year. However, gross margin in other steel products has gained great growth year-on-year, mainly because the Company earned more profit in steel billet and wire rod compared to that in 2014.

(2) Analysis on output and sales

Unit: ten thousand tons

Principal products	Output	Sales volume	Stock	YoY change in output (%)	YoY change in sales volume (%)	YoY change in stock (%)
Cold-rolled carbon steel sheets and coils	946	945	123	-0.5	-2.7	12.6
Hot-rolled carbon steel sheets and coils	889	884	44	11.3	8.1	15.3
Steel tubes and pipes	164	161	25	10.8	0.5	17.5
Other steel products	232	225	20	-6.7	-3.6	2.1
Total	2,230	2,215	211	3.9	1.5	12.6

Note: 1. Output in steel products in the year of 2015 did not include those from trial production of Zhanjiang Steel;
2. Output and sales volume in the year of 2015 included the 1.646 million tons of carbon steel products sold to BNA, but did not include the 1.990 million tons of cold-rolled carbon steel products produced and sold by BNA.

The Company exported 2.623 million tons of steel products in 2015, 276,000 tons more year-on-year. Exports by regions are as follows:

Regions	Ration in 2015 (%)	Ration in 2014 (%)
East Asia and Australia	23.26	30.60
Europe and Africa	23.94	17.90
America	14.37	20.30
Southeast Asia and South Asia	38.43	31.20
Total	100.00	100.00

Notes: double-high products accounted for 60% of total export volume in 2015.

(3) Cost analysis

Unit: RMB Million

By Industry							
Industry	Items	Amount in the period	Ratio in overall cost (%)	Amount in the same period last year	Ratio in overall cost (%)	Change of amount in this period from the previous period (%)	Notes
Iron & steel manufacturing	Fuel and raw materials	52,591	63.7	70,695	70.9	-18.1	
	Others	29,974	36.3	29,057	29.1	0.9	
	Total	82,565	100	99,753	100	-17.2	

Note: Only the cost of the iron & steel manufacturing was included. Costs of other sectors such as the processing and distribution, information technology, e-commerce, chemical industry and financial units were not included.

(4) Fulfillment of signed major sales contract as of the reporting period

Signed major sales contract have been fulfilled as agreed in the reporting period

(5) Major customers

In 2015, the Company's sales revenue from the top five customers was RMB 19.63 billion, making up 11.98% of its total operating revenue.

(6) Major suppliers

In 2015, the Company's procurement from the top five suppliers was RMB 14.40 billion, making up 41.2% of its annual procurement volume.

2. Expenses

(1) Sales expenses and administrative expenses

Unit: RMB Million

Items	Amount in the period	Amount in the same period last year	Change ratio (%)
Sales expense	2,153	2,200	-2.2
Administrative expense	7,287	7,728	-5.7

(2) Financial expenses

Unit: RMB Million

Items	Amount in the period	Amount in the same period last year	Change ratio (%)
Interest incomes	-561	-1,057	-46.9
Interest expenditures	1,206	1,412	-14.6
Gains and losses from currency exchange	1685	89	1798.7
Others	62	44	41.9
Total	2,393	488	390.6

Note: Financial expense increased by RMB 1.90 billion year-on-year mainly due to the effect of gains and losses from currency exchange. Central bank adjusted RMB central parity regime in August, 2015, which resulted in rapid depreciation of RMB against USD, with annual depreciation up to 6.1%. According to annual exchange rate risk management proposal, the Company adopted foreign currency debt conversion, resulting in RMB 1.69 billion exchange loss. 0.4 % appreciation of RMB against USD central parity in 2014 resulted in RMB 90 million exchange losses, which meant RMB 1.6 billion increase in financial expense year-on-year. Meanwhile, annual interest income decreased by RMB 500 million year-on-year, mainly because the principal of long-term receivable from the Group was dropping year by year with several fall of interest rate in 2015.

3. R&D expenditures

(1) R&D expenditures

Unit: RMB Million

Expensing of R&D expenditures	3,449
Capitalizing of R&D expenditures	-
Total R&D expenditures	3,449
Ratio of total R&D expenditures to operating revenue (%))	2.11
R&D staff number (people)	1,105
Ratio of R&D staff to total employees numbers (%)	2.90
Ratio of R&D expenditures expensing	-

Notes: The Company continued its premium product strategy featured by technical leadership, with ultra high strength medium manganese steel and other 4 new products realizing world premiere. Multiple scientific achievements won "science and technology progress award" of the state, Shanghai and metallurgical industry, among which, Development and Application of Pickling & Tandem Cold Mill Process Technology for High Grade Non-oriented Silicon Steel and other two achievements won the first prize of Metallurgical Science and Technology Progress Award , and R&D on X65 & X70 Pipeline for South Sea Liwan Project and other two achievements won the second prize of Shanghai Science and Technology Progress Award.

4. Cash flow

In 2015, the cash and cash equivalents decreased by RMB 2.18 billion, among which, the net cash inflow arising from operating activities was RMB 21.18 billion, the net cash outflow arising from investing activities was RMB 21.68 billion, the net cash outflow arising from financing activities was RMB 1.12 billion, and the net cash outflow arising from the effect of fluctuation in exchange rate was RMB 560 million. Without considering the impact of the Finance Co., the cash and cash equivalents decreased by RMB 3.35 billion, among which, the net cash inflow arising from operating activities was RMB 17.80 billion, the net cash outflow arising from investing activities was RMB 20.00 billion, the net cash outflow arising from financing activities was RMB 580 million, and the net cash outflow arising from the effect of fluctuation in exchange rate was RMB 570 million.

Unit: RMB Million

Items	2015		2014		Variation year on year	
	Including Finance Co.	Excluding Finance Co.	Including Finance Co.	Excluding Finance Co.	Including Finance Co.	Excluding Finance Co.
Net cash flow arising from operating activities	21,177	17,801	28,280	28,618	-7,104	-10,817
Net cash flow arising from investing activities	-21,676	-20,003	-18,964	-18,765	-2,712	-1,238
Net cash flow arising from financing activities	-1,119	-580	-9,534	-9,289	8,415	8,709
Effect of fluctuation in exchange rate on cash	-564	-571	-90	-90	-474	-481
Net increase in cash and cash equivalents	-2,182	-3,353	-308	473	-1,875	-3,826

Without regard to the impact of Finance Co., the net cash inflow arising from operating activities was RMB 17.80 billion, RMB 10.82 billion less than RMB 28.62 billion at the same period last year. This is mainly caused by the following factors:

(1). The net profit this year was RMB 870 million, RMB 5.05 billion less than RMB 5.92 billion at the same period last year.

(2). The allowances for assets impairment this year was RMB 1.39 billion, RMB 910 million more than RMB 480 million at the same period last year.

(3). Loss from the disposal of fixed assets, intangible assets and other long-term assets was RMB 540 million, with an income of RMB 50 million at the same period last year, representing an increased cash flow of RMB 590 million.

(4). Financial expenses were RMB 2.47 billion, RMB 1.90 billion more cash flow than RMB 560 million at the same period last year.

(5). Income from investment was RMB 1.19 billion, RMB 860 million less cash flow than RMB 340 million at the same period last year.

(6). Depreciation and amortization, gains and losses from changes in fair value, deferred income tax assets and others increased the cash flow by RMB 200 million compared to that at the same period last year.

(7). Inventory was RMB 2.81 billion less than that at the beginning of the year, with a loss of RMB 4.28 billion at the same period last year, representing an decreased cash flow of RMB 1.47 billion year-on-year.

(8). Operational receivable and payable items decreased the cash flow by RMB 100 million this year, with an increase of RMB 6.94 billion at the same period last year, representing an decreased cash flow of RMB 7.04 billion year-on-year.

Without regard to the impact of Finance Co., the net cash outflow arising from investing activities was RMB 20.00 billion, RMB 1.24 billion more than the RMB 18.77 billion at the same period last year. This is mainly caused by the following factors:

(1). Cash for purchasing fixed assets, intangible assets and long-term assets was RMB 23.97 billion, with RMB 2.37 billion more cash outflow than the RMB 21.60 billion at same period last year, mainly due to more expense on Zhanjiang Project construction.

(2). Net cash inflow arising from other investing activities was RMB 3.97 billion, RMB 1.13 billion cash flow more than the RMB 2.83 billion at the same period last year.

Unit: RMB Million

Items (without regard to Finance Co.)	2015	2014	YoY change
Cash inflow arising from investing activities	23,053	6,360	16,693
Cash outflow arising from investing activities	43,055	25,125	17,930
Net cash flow arising from investing activities	-20,003	-18,765	-1,238

Without regard to the impact of Finance Co., the net cash outflow arising from financing activities was RMB 580 million, RMB 8.71 billion less than the RMB 9.29 billion at the same period last year. Details are as follow:

Unit: RMB Million

Items (without regard to Finance Co.)	2015	2014	YoY change
Impact of change in financing scale on flow	3,986	-6,015	10,001
Cash paid for distribution of dividends and profits or repayment of interest	-4,966	-3,486	-1,480
Cash paid for repurchase of stocks	0	-188	188
Cash received from investors	1,900	310	1,590
Other cash related to financing activities	-1,500	89	-1,589
Net cash flow arising from financing activities	-580	-9,289	8,709

(II) Notes for major changes in profit due to non-principal business

√ Applicable ☐ Not applicable

Financial expenses increased by RMB 1.90 billion year-on-year mainly due to the impact of loss from foreign exchange. The second exchange rate reform in 2015 resulted in rapid depreciation of RMB against USD, with annual depreciation up to 6.12%. According to annual exchange rate risk management proposal, the Company adopted foreign currency debt conversion, resulting in RMB 1.69 billion exchange loss. 0.36 % appreciation of RMB against USD central parity in 2014 resulted in RMB 90 million exchange losses, which meant RMB 1.6 billion increase in financial expense year-on-year.

Assets impairment loss was RMB 1.487 billion in 2015, up by RMB 1.012 billion year-on-year, among which: provision for inventory falling price reserves increased by RMB 479 million and non-current assets impairment loss such as fixed assets increased by RMB 417 million.

(III) Analysis of assets and liabilities

Assets and Liabilities

Unit: RMB Million

Items	Amount at the end of the reporting period	Ratio against total assets(%)	Amount at the end of last reporting period	Ratio against total assets(%)	YoY ratio change (%)	Notes
Current assets	69,903	29.86	74,386	32.53	-6.03	
Cash and cash equivalents	7,817	3.34	12,104	5.29	-35.42	
Inventory	23,516	10.04	26,815	11.73	-12.30	
Receivables	17,351	7.41	19,271	8.43	-9.97	
Non-current assets	164,220	70.14	154,267	67.47	6.45	
Including: Fixed assets	91,068	38.90	82,897	36.25	9.86	
Construction-in-progress	33,628	14.36	26,759	11.70	25.67	
Long-term equity investment	5,010	2.14	4,963	2.17	0.95	
Total assets	234,123	100.00	228,653	100.00	2.39	
Current liabilities	91,860	39.24	89,254	39.03	2.92	
Including: Short-term borrowings	27,111	11.58	31,480	13.77	-13.88	
Non-current liabilities due within one year	208	0.09	7,442	3.25	-97.20	The Company optimized financing method and increased its low-cost direct financing
Other current liabilities	10,057	4.30	0			RMB 10 billion short-term financing coupon has been issued this year.
Non-current liabilities	20,117	8.59	15,193	6.64	32.41	
Long-term borrowings	9,111	3.89	9,936	4.35	-8.31	
Notes payables	8,747	3.74	3,024	1.32	189.26	The Company issued RMB 2 billion medium-term notes and RMB 500 million Euro bonds.
Long-term payables	82.59	0.04	89.29	0.04	-7.51	
Total liabilities	111,977	47.83	104,448	45.68	7.21	
Shareholders' equity	122,146	52.17	124,205	54.32	-1.66	
Total Liabilities and shareholders' equity	234,123	100.00	228,653	100.00	2.39	

(IV) Analysis on operating information among steel industry

Steel manufacturing and sales by processing process

√ Applicable ☐ Not applicable

Unit: RMB Million

Type by processing process	Output (tons)		Sales volume (tons)		Operating revenue		Operating cost		Gross margin (%)	
	This year	Last year	This year	Last year	This year	Last year	This year	Last year	This year	Last year
Cold rolled steel	9,456,127	9,502,256	9,445,106	9,703,616	41,655	51,369	35,695	43,989	14.3	14.4
Hot rolled steel	8,888,578	7,988,384	8,839,070	8,174,432	22,937	28,816	20,259	24,456	11.7	15.1
Others	3,279,873	3,244,438	3,271,513	3,384,453	13,054	16,498	12,923	16,355	1.0	0.9

Note: Above table only indicates self-manufactured and sold steel, excluding steel billets.

1. Steel manufacturing and sales by finished product form

√ Applicable ☐ Not applicable

Unit: RMB Million

Type by finished product form	Output (tons)		Sales volume (tons)		Operating revenue		Operating cost		Gross margin (%)	
	This year	Last year	This year	Last year	This year	Last year	This year	Last year	This year	Last year
Sheet and strip	19,500,501	18,755,364	19,454,468	19,155,682	68,163	85,156	59,689	73,565	12.4	13.6
Tubes and pipes	1,637,311	1,477,499	1,611,194	1,602,816	7,450	9,116	7,520	9,139	-0.9	-0.2
Others	486,766	502,215	490,026	504,003	2,033	2,411	1,668	2,095	17.9	13.1

Note: Above table only indicates self-manufactured and sold steel, excluding steel billets.

2. Steel sales by sales channels

√ Applicable ☐ Not applicable

Unit: RMB Million

By sales channels	Operating revenue		Accounting for total operating revenue(%)	
	This year	Last year	This year	Last year
Online	122,807	147,631	74.8	78.6
Offline	18,728	14,590	11.4	7.8

Note: Online sales volume refers to those settled by Ouyeel E-commerce (steel transaction center) owned by the Company, including those from self-manufactured, Group trading and social trading; Offline sales volume refers to those other than online sales volume.

3. Manufacturing and sales of special steel products

☐ Applicable √ Not applicable

4. Supply of iron ore

√ Applicable ☐ Not applicable

Unit: RMB Million

Source of supply	Supply (tons)		Amount paid	
	This year	Last year	This year	Last year
Domestic purchase	2,420,000	4,010,000	792	2,190
Import	34,460,000	30,580,000	14,296	22,491

(V) Investment analysis

1 . Equity investment outside Baosteel

(1) Major equity investment

In 2015, the Company spent RMB 4.85 billion in equity investment, RMB 4.53 billion less than that in last year, down by 48.3%. See the following table for main investment:

Unit: RMB Million

Name of investee	Main business	Direct or indirect shareholding of Baosteel	Actual capital contribution from Baosteel
Ouyeel Commerce Co., Ltd	E-commerce	51%	1,224
Shanghai Ouyeel Logistics Co., Ltd	E-commerce	100%	550
Shanghai Ouyeel Financial Information Service Co., Ltd	E-commerce	90%	270
Shanghai Ouyeel Material Technology Co., Ltd	E-commerce	90%	90
Shanghai Ouyeel Data Technology Co., Ltd	E-commerce	100%	50
Shanghai Baosight Software Co., Ltd.	Software	55.50%	655
Baosteel Group Finance Co., Ltd.	Finance	62.1%	186
PetroChina Pipeline Co., Ltd.	Gas transportation	3.52%	8,644
PetroChina Northwest United Pipeline Company Limited	Gas transportation	0	-8,000
Total			3,668

Note: These were based on capital contribution from the Company in equity investment project in that year.

(2) Major non-equity investment

The Company spent RMB 23.81 billion in fixed asset investment in 2015, among which: RMB 16.65 billion for Zhanjiang Steel project.

1) Fund raising projects

None.

2) Non-fundraising projects

(1)Completed projects having been put into operation

Revamping of Cold Rolling Plant 2030 unit continuous galvanizing line of directly affiliated plants and departments: In order to optimize the structure of hot-dip galvanized products and enhance the competitiveness of Baosteel's hot-dip galvanized products , the existing 1# continuous galvanizing line of Cold Rolling Plant 2030 unit was revamped for upgrading, the project started hot load test on Nov. 30.

Phase I coke oven overhaul revamping project of directly affiliated plants and departments: to achieve the technical upgrade of the coke oven and improve the energy-saving and environmental-protection level of the coke oven, the existing 4×50-hole 6M coke oven was dismantled and the 4×50-hole 7M coke oven was constructed. The designed annual output was 2.47 million tons of cokes. The 1A1B and 2A2B of the coke oven started to produce coke on May 17 and September 15 respectively ahead of schedule. The Phase II 4×50-hole 6M coke oven is being dismantled now, and the total batteries of coke oven will be reduced from 12 to 10. The total production capacity of the coke oven remains unchanged.

(2)Project under continued construction

Zhanjiang Iron & Steel project: to implement the national Plan for Adjustment and Revitalization of Iron & Steel Industry and achieve the strategic adjustment of the steel industry in Guangdong and Shanghai, the production lines for iron-making, steel-making, hot rolling, cold rolling and others are constructed in Donghai Island, Zhanjiang, Guangdong. The designed annual output was 8.23 million tons of pig iron, 8.928 million tons of liquid steel, 8.749 million tons of continuously cast slabs and 6.89 million tons of steel products. The project is scheduled to be completed and put into operation by September, 2016. At present, No.1 blast furnace system of Zhanjiang Steel was ignited and started hot load test on September 25 ahead of schedule, 1# and 2# converters of steel-making plant started hot load test on September 27, hot rolling plant started hot load test on December 15, cold rolling pickling and tandem cold mill line has started overall sequence test, No.2 blast furnace system entered the stage of equipment installation comprehensively.

(3)Newly-started project

Strip-to-silo change of coal yard E and F: In order to further improve the coal yard area environment, reduce unorganized dust emission, and decrease material loss, strip-to-silo change of coal yard E and F has been conducted. The project will be completed and put into operation in December 2017.

C-type enclosed revamping of Phase-I and Phase-II ore yard OC, OD strip. In order to further improve the regional environment of raw material ore yard, reduce unorganized dust emission, and decrease material loss and charging moisture content, enclosed revamping of raw material OC, OD strip has been conducted, and raw material yard will realize full automatic operation after the revamping. The project will be completed and put into operation in June, 2016.

Enclosed revamping of Phase-I and Phase-II blending yard BA & BB and auxiliary material yard OA & OB. In order to tackle dust-raising from material and material loss at blending yard BA & BB and auxiliary material yard OA & OB, and reduce environmental pollution of materials on surroundings, such enclosed revamping has been conducted. The project is scheduled to be put into operation in June, 2017.

(3) Financial assets measured by fair value

Unit: RMB Million

Items	At the end of 2014	At the end of 2015	Purchases in the period	Sales in the period	Change in fair value
Financial assets at fair value included in current profit or loss	181	873	8,814	8,131	9
Available-for-sale financial assets	1,499	1,331	582	544	-155
Total	1,679	2,204	9,396	8,675	-146

(VI) Sales of major assets and equity

None.

(VII) Analysis on major holding and joint stock companies

1. Shanghai Meishan Iron & Steel Co., Ltd.

By the end of 2015, the Company had 77.0% shareholding of Shanghai Meishan Iron & Steel Co., Ltd. With a registered capital of RMB 7.08 billion, Meishan Steel specializes in black metal metallurgy, rolling processing and sales. By the end of 2015, it had a total asset of RMB 29.38 billion and a net asset of RMB 9.42 billion, and achieved a net profit of RMB -1.72 billion for the year of 2015.

2. Baosteel Zhanjiang Iron & Steel Co., Ltd.

By the end of 2015, the Company had 90% shareholding of Baosteel Zhanjiang Iron & Steel Co., Ltd. With a registered capital of RMB 20 billion, Zhanjiang Steel specializes in black metal metallurgy, rolling processing and sales. Currently, it is under construction. By the end of 2015, it had a total asset of RMB 51.46 billion and a net asset of RMB 18.57 billion, and reported a net profit of RMB -320 million for the year of 2015.

3. Baosteel-NSC/Arcelor Automotive Steel Sheets Co., Ltd.

By the end of 2015, the Company owned 50% equity of Baosteel-NSC/Arcelor Automotive Steel Sheets Co., Ltd. (BNA). With a registered capital of RMB 3 billion, BNA is mainly engaged in the manufacturing and sales of cold-rolled steel sheets and galvanized steel sheets for automobile and automotive parts and other services related to such businesses. By the end of 2015, BNA had a total asset of RMB 5.12 billion and a net asset of RMB 3.42 billion, and achieved a net profit of RMB 196 million for the year of 2015.

4. Yantai Lubao Steel Pipe Co., Ltd.

By the end of 2015, the Company owned 100% of Yantai Lubao Steel Pipe Co., Ltd. With a registered capital of RMB 500 million, Lubao Steel Pipe is mainly engaged in the processing and sales of seamless steel pipe. Its major products include structural seamless steel pipe, low/medium pressure boiler seamless pipe, seamless pipelines for transportation of fluids, hydraulic seamless pipe, high pressure boiler seamless pipe, seamless pipe for oil pipelines, geological drillings, oil pipelines, oxygen canisters, and so on. By the end of 2015, Lubao Steel Pipe had a total asset of RMB 870 million and a net asset of RMB 650 million, and reported a net profit of RMB -170 million for the year of 2015.

5. Baosteel Huangshi Coated and Galvanized Sheet Co., Ltd.

By the end of 2015, the Company owned 58.5% of Baosteel Huangshi Coated and Galvanized Sheet Co., Ltd. (Huangshi). With a registered capital of RMB 150 million, Huangshi specializes in the production and sales of cold-rolled sheets, aluminum coated steel sheets, color-coated steel sheets and related coated steel products. By the end of 2015, Huangshi had a total asset of RMB 810 million and a net asset of RMB 380 million, and achieved a net profit of RMB 20 million for the year of 2015.

6. Shanghai Baosteel International Economic & Trading Co., Ltd.

By the end of 2015, the Company had a full shareholding of Shanghai Baosteel International Economic & Trading Co., Ltd. (Baosteel International). With a registered capital of RMB 2.25 billion, Baosteel International is mainly engaged in independent and agency imports and exports of goods and technology approved by the government, the imports of steel and scrap steel, processing with imported materials and the "three-plus-one" trading-mix. By the end of 2015, Baosteel International had a total asset of RMB 36.90 billion and a net asset of RMB 14.07 billion, and achieved a net profit of RMB 1.32 billion for the year of 2015.

7. Shanghai Baosight Software Co., Ltd.

By the end of 2015, the Company owned 55.5% of Shanghai Baosight Software Co., Ltd. (Baosight). With a registered capital of RMB 390 million, Baosight is mainly engaged in the research, design, development, manufacturing and integration of computer, automation, network communication systems and software & hardware products. Baosight issued 27,493,010 non-public A-shares in Oct, 2015. Baosteel subscribed 15,258,621 shares as per its shareholding of 55.50% and contributed RMB 655 million. By the end of 2015, Baosight had a total asset of RMB 6.38 billion and a net asset of RMB 3.97 billion, and achieved a net profit of RMB 330 million for the year of 2015.

8. Shanghai Baosteel Chemical Co., Ltd.

By the end of 2015, the Company had a full shareholding of Shanghai Baosteel Chemical Co., Ltd. (Baosteel Chemical). With a registered capital of RMB 2.11 billion, Baosteel Chemical is mainly engaged in the production and sales of raw chemical materials and products, "four techniques" services in chemical industry, and import and export activities of self-manufactured products. By the end of 2015, Baosteel Chemical had a total asset of RMB 4.99 billion and a net asset of RMB 3.68 billion, and achieved a net profit of RMB 7.14 million for the year of 2015.

9. Baosteel Nantong Iron & Steel Co., Ltd.

By the end of 2015, the Company had 95.8% of Nantong Iron & Steel. With a registered capital of RMB 620 million, Nantong Iron & Steel is mainly engaged in the production and sales of deformed steel bars, round steel bars, structural steel, semi-finished steel products (such as billet steel and steel ingot, etc.), as well as other iron & steel products and by-products. By the end of 2015, Nantong Iron & Steel had a total asset of RMB 710 million (with about 66.93 ha. of industrial land) and a net asset of RMB -1.39 billion, and reported a net profit of RMB -570 million for the year of 2015. Baosteel Nantong Iron & Steel Co., Ltd. has been operating economically since April 2014, and entering into shut-down and asset disposal since Oct., 2015.

10. Baosteel Group Finance Co., Ltd.

By the end of 2015, the Company had 62.1% of Baosteel Group Finance Co., Ltd. (Finance Co.). With a registered capital of RMB 1.4 billion, Finance Co. is mainly engaged in absorbing deposits from member entities, providing loans to them, conducting internal financial transfers and relevant settlements between them, helping them in entrusted loan and investment, and engaged in deposits from or to other financial institutions. Finance Co. increased its registered capital through dividend distribution and capital increment with annual retained earnings of RMB 300 million, among which: Baosteel contributed RMB 186.3 million more as per its shareholding of 62.10%. By the end of 2015, Finance Co. had a total asset of RMB 14.32 billion and a net asset of RMB 1.88 billion, and achieved a net profit of RMB 130 million for the year of 2015.

11. Yantai Baosteel Pipe Co., Ltd.

By the end of 2015, the Company owned 80% of Yantai Baosteel Pipe Co., Ltd., with the rest 20% owned by Lubao Steel Pipe. With a registered capital of RMB 4 billion, Yantai Baosteel Pipe is mainly engaged in manufacturing, processing and sales of steel pipe, matching products and by-products, while providing technical consultation, storage, shipping, importing and exporting services of steel pipe rolling technology. By the end of 2015, Yantai Baosteel Pipe had a total asset of RMB 3.86 billion and a net asset of RMB 1.38 billion, and reported a net profit of RMB -440 million for the year of 2015.

12. Ouyeel Commerce Co., Ltd.

As of the end of 2015, the Company and the subsidiary Baosteel International have owned 51% equity of Ouyeel Commerce (the Company holding 8.67%). With registered capital of RMB 2.4 billion, the Company is mainly engaged in technical consultation, technology development, technology services, technology transfer within the field of e-commerce, industrial investment, investment management, equity investment management, investment consultation, economic information consultation, enterprise management consultation, domestic trade (except special approval), import and export business of goods and technology, etc.. In Feb. 2015, the Company, Baosteel International and Baosteel Group jointly set up Ouyeel Commerce, of which, the Company and Baosteel International subscribed 51% with their 100% stock equity in Bsteel Online Co., Ltd as RMB 1.02 billion; Baosteel Group contributed RMB 980 million, holding 49%. In Nov. 2015, Ouyeel Commerce issued additional shares worth RMB 400 million, of which, RMB 34.68 million from the Company and RMB 169.32 million from Baosteel International, with RMB 204 million in total. Ouyeel Commerce increased its registered capital to RMB 2.4 billion after this. As of the end of 2015, Ouyeel Commerce's total assets have reached RMB 3.96 billion, net asset reached RMB 1.71 billion, and net profit reached RMB -160 million in the year.

13. Overseas Companies

By the end of 2015, the Company had overseas subsidiary companies in countries and regions such as U.S.A., Japan, Germany, Singapore, and Hong Kong China. These overseas subsidiaries extended the Company's sales and purchase networks, and played a critical role in enhancing the Company's international competitiveness.

III. Discussion and Analysis of the Board of Directors on the Company's Future Development

(I) Industrial competition pattern and development trend

There is still much uncertainty for global economy in 2016. USA economy is very likely to recover due to its domestic consumption and great increase in investment; with insufficient recovery in Europe economy, uncertainty in Euro and Brexit worsen the economic stability; Japan faces challenges in the short term with slowed growth and downward pressure on inflation; emerging market economy has no evident signs of recovery. Therefore, basic tone for Chinese economy is de-capacity, de-stocking, de-leveraging, cost reduction and complementing weak links.

Opportunities come with challenges as 2016 is the first year of China's thirteenth five-year planning. On one hand, overall opening policy, including "One Belt, One Road" construction, linkage of land-sea and home-aboard, opening of East and West China, facilitates to speed up the globalization of Chinese manufacturing, which results in more direct or indirect Chinese steel products export and reduce Chinese capacity to some extent. On the other hand, China is entering into new normal, which means supply and demand at long-term slow growth rate and fierce competition in steel industry with oversupply difficult to overcome. According to CISA, as estimated by 9% growth rate in fixed asset investment in 2016, steel apparent consumption in 2016 will be further reduced to 660-670 million tons while domestic crude steel output to 750-760 million tons. (Notes: Data of steel apparent consumption and domestic crude steel output in 2016 is from www.glinfo.com.)

With accelerated advance of supply-side reform, continuous enforcement of new environmental protection law, continued shrinkage of steel demand from downstream industries, serious overcapacity in steel industry and deteriorated profit of steelmakers, the steel industry is bound to intensify its effort and speed in the following reform: shut down "zombie " steelmakers and eliminate outdated capacity; merge and restructure and optimize structural adjustment; dig up domestic potentiality and reduce cost in every aspect; equally emphasize on innovation in technologies and management, gear up differential competition in products and service and constantly promote operating efficiency.

(II) Development strategies

The Company takes "Creativity Changes Life" as its mission, "Integrity and Synergy" as its core value, "becoming a leader of steel technology, best practitioner of eco-friendly enterprise and model company combining common development of employees and enterprise" as the vision and "becoming the most competitive steel company and the most valuable listed company across the world" as a strategic target.

Facing the "winter" of steel industry, the Company adopts the development strategy of "One Body Two Wings". Through innovation in systems and mechanism and organization and synergy across areas, the Company shall attempt to hold its technical leadership, facilitate cost and competitiveness improvement, conduct pilot wisdom manufacturing, manipulate urban steel mill development and build new competitive advantages and sustainable development ability.

1. Implement cost reduction, enhance cost improving ability

Through all staff,all aspects and all processes cost reduction ,by means of technical cost reduction, administrative cost reduction and synergetic cost reduction, solve the problem of the company's high cost system, strive to be in the leading position of the peers in cost level.

2. Improve product competitiveness, remain market leadership

With customer oriented, aiming at development of six strategic products (automotive steel, silicon steel, steel for energy and pipeline, high-grade thin sheet, high-grade heavy plates and tin plates), focusing on revitalizing stock assets and internal development, through focused resource allocation, initiatives in R&D, manufacturing, marketing, service and other aspect, the Company is expected to improve its overall product competitiveness, thus remaining its leadership in domestic market.

3. Continue technical leadership and build three manufacturing base for premium steel products

Shanghai base is based upon the domestic market and aimed at the global market, positioning itself as R&D center for the Company's technical development and operation promotion and manufacturing center of high-end and cutting-edge products, featuring the production of high value added products with high technology content and high market share, and serving as the base for premium high-end sheets and steel pipe and bars. The Meishan Steel base stations itself in the East China market, coordinates with the Shanghai base, acts as the base for hot-rolled, pickling, tin plate premium products and gradually delivers the same quality as Shanghai factories. The Zhanjiang Steel base radiates to the Southeast Asia market with its center in the South China, with stable manufacturing capability and rapid production of premium products at low cost, and will be built into the worldwide most efficient carbon sheet factory.

4. Pilot wisdom manufacturing to build new advantage

With idea and method application of Industry 4.0, utilizing Internet, Internet of Things, intelligent manufacturing and robot technology, the Company will realize wisdom manufacturing, build wisdom manufacturing system integrating intelligent equipment, intelligent factories and wisdom operation to facilitate its competitiveness in cost, quality and service and become a front-runner in wisdom manufacturing of domestic steelmakers.

5. Build model urban steel mill and fuse urban and capacity development

Build an upgraded green factory through energy reduction and environmental protection technology as well as equipment upgrade, waste heat and clean energy utilization and development in cutting-edge technologies; Build urban model steel mill based on ecological harmony through development on urban energy and carbon reduction service, waste disposal and ecological products.

(III) Operational plan

1. Development strategies in early stages and the progress of operational plan in the reporting period

Compared to annual operational plan, total operating revenue in 2015 was RMB 29.846 billion less, of which, RMB 19.701 billion less from plain carbon steel and RMB 10.473 billion less from steel trading, mainly due to integrated impact of decline in sales price, variety structure and drop in sales volume. Hence, profit per ton wasn't listed in global top 3.

2. Operational goal and plan as well as work of priority in 2016

In 2016, The Company will continue to stick to the general operational principle of "one body with two wings, three-place coordination, seeking development through innovation and reform, differentiated competition, cost improvement, and creating good performance through lean operation", aim at cost reduction and rigid landing and endeavor to achieve the following operating objectives: "50% market share of cold rolled automotive sheet, RMB 4 billion of cost reduction from all aspects, RMB 10 billion cash inflow resulting from operating activities, 3.8% up in labor efficiency of regular staff and the best performance among domestic peers", thus keeping the best business performance.

The Company plans in 2016 to produce 26.79 million tons of iron and 27.11 million tons of steel and sell 23.44 million tons of steel products, with RMB 160.4 billion of gross revenue and RMB 149.1 billion of operating cost. The operating management is expected to specify all measures for the work of priority, benefit from innovation reform and unconventional methods for implementation safeguard and endeavor to present a better business result based on ensuring stable business performance year-on-year.

Guided by the Company's overall operational principle and goal in 2016, and in line with the requirements of the planning as well as the Group Corporation, the Company will focus on the following work:

(1) Push forward the development of new products and keep differentiation in competitive advantage.

Revolve around six strategic products, enhance the planning and R&D of new products with technical leadership; pay attention to manufacturing stability of new products and low-cost process development to further reduce manufacturing cost of varieties such as super ultra-high strength automotive steel, hot-rolled high-strength steel and steel for pipes & tubes.

(2) Build efficient and low-cost manufacturing bases with multi-base coordination.

Reinforce multi-base coordination, through optimizing variety management and division, complement each other among three bases and maximize the Company's overall profit

(3) Ensure a stable energy system with more efforts on environmental governance

Level up energy system's capabilities on coping with changes and adjustments of major operation lines through control over emission of coal gas and oxygen; acquire maximum benefit from improvements in carbon asset management. With well-organized ecological afforestation construction in plants, 300 thousand sq. m. of afforestation and 12 afforestation projects in plants are scheduled in 2016. Continue environmental renovation project in raw material plot for iron making.

(4) Dig up users' demand with innovated marketing mode

Endeavor to realize annual sales objectives with innovated marketing mode and varied marketing schemes; Revolving around Zhanjiang steel products, expand regional market, explore customized sales schemes for users to ensure output-sales balance for all production lines of Zhanjiang Steel as well as maximum sales value of spot goods; Through EVI and service mode, extend technical service impact of automotive sheet and enhance automotive sheet product value.

(5) Reduce cost as special program in terms of every staff, every aspect and every process.

Give a strong push to company-wide "cost-side reform" and systematically reduce cost by expense reduction, efficiency promotion, technical cost reduction and economic operation; organize all work based on contributing cash flow and optimize occupancy efficiency of operating capital; revolve around consistent manufacturing techs, focus on specification expansion, cost reduction and stable manufacturing. Realize low-cost manufacturing from design to production.

(6) Intensify reform and revitalize teams

Optimize management system, reduce staff allocation and constantly advance efficiency improvement; reinforce remuneration distribution reform and ensure remuneration mode matches production and organization form. Strengthen key staff management; ensure leader teams are always ready for work with enthusiasm and passion.

(7) Speed up Zhanjiang Steel's transform from construction to operation.

Zhanjiang Steel project is scheduled to be put into operation in 2016. With cost-driven based production lines, the Company will endeavor to find ways to improve cost, boost cost competitiveness, ensuring control over operating loss.

(8) Initiatively conduct pilot wisdom manufacturing program.

Conduct 15 unmanned programs of equipment automation such as operation automation in front of No.3 blast furnace, carry forward 1580 hot rolling intelligent workshop project, ensure some projects would be put into operation in the year; boost comprehensive interactive response, jointly establish shared wisdom marketing platform and support internet-oriented marketing mode transform; intensify online purchasing pattern and conduct transformation construction of procurement supply platform featuring "Internet+Purchasing".

(9) Advance implementation of new planning

New planning still takes "becoming the most competitive steel company and the most valuable listed company across the world" as a strategic target and focuses on developing the Company towards "cost transform, technical leadership, service comes first, wisdom manufacturing and urban steel mill".

3. Operational plan of the Company in 2016 does not constitute a commitment of the performance to investors who are kindly reminded of the risk in it.

4. Capital demand for maintaining the existing business and finishing investment project under construction, resource, cost and use of investment capital involved in operational plan

The Company's 2016 budget contains RMB 14.159 billion for fixed asset investment, including scheduled RMB 6.319 billion for Zhanjiang Steel project. Other fixed asset investment involve continued E&F strip-to-silo construction, continued No.3 sintering project overhaul and continued closed transformation of Phase-I and Phase-II material blending yard and auxiliary material yard, enclosed transformation in ore material yard and integrated transformation of ultra-clean emission in power plant.

(IV) Possible risks

1. The Company's overall risk and relevant countermeasures

Zhanjiang Steel project realized the leap-over from construction to trial production. 2015 was the last year for construction and Zhanjiang project has been ready for operation. Engineering construction and production preparation have entered into the last critical stage. The Company utilized all resources and allowed key staff to play significant roles in engineering construction and production preparation, with control pattern of "One plant for another, one department for another". Zhanjiang Steel strived to ensure a complete engineering construction, a systemic production preparation, independent staff and coordination among departments for successful systemic hot load trial run of No.1 blast furnace in "Sep. 2015". Zhanjiang Steel is planned to be put into full operation in 2016. It is necessary to keep an eye on independent working and operation ability of its staff as well as staff turnover risk, to control production cost; with a severe market, the Company shall pay close attention to product certification, product expansion and decision on the timing of putting No.2 blast furnace into operation.

Intensify control over environmental protection risk. New environmental protection law has taken effect since 2015. With stricter requirements on environmental protection and energy conservation & emission reduction from the government and community, the Company paid close attention to changes in relevant standards of laws and regulations on environmental protection, properly interpreted, compared and incorporated or transformed them in the Company's relevant systems and management rules. Meanwhile, the Company reduced or eliminated environmental protection risk through such measures as self-inspection on compliance, hidden danger elimination, risk warning, advance of environmental protection program and supervision on environmental protection. All departments initiatively coordinated and communicated with each other to respond to the consecutive and frequent supervision from local environmental protection authorities. Regularly prepared and released supervision report on environmental protection risk and according to risk level and type properly alerted and warned the risk, monitored and tracked the early warning in a professional way, which gave a result of overall controlled environmental protection risk.

The Company has steadily and consecutively improved its energy management system with technical index performance of production keeping cutting-edge. Pollution emission indexes of relevant units were lower than allowed value of local governments; through boosting the implementation of major environmental protection programs, the Company effectively controlled pollution emission, overfulfilled the emission reduction goal given by Shanghai municipality for "the twelfth five-year", with 26% and 23% more of SO2 and NOx emission reduction than expected; environment and afforestation in plants have been improved constantly, so has solid waste management.

Enhance control over exchange rate. Pay close attention to exchange rate and interest rate risk, energetically respond to unexpected market changes, explore foreign exchange financing under the lock-in of exchange rate risk, and expand channels for low-interest rate financing. Central bank adjusted RMB central parity regime in August, 2015, which resulted in rapid depreciation of RMB against USD. In strict compliance with annual exchange rate risk management proposal, the Company adopted foreign currency debt conversion to get exchange rate risk for financing under control according to the knock-out principle of "foreign exchange financing interest rate plus exchange rate lock-in cost" no more than RMB financing cost. With the background of RMB going global, RMB exchange rate in 2016 may still depreciate. The Company shall further perfect risk control strategies, establish currency conversion emergency plans for financing and reduce exchange rate risk exposure to maximum extent as well as losses from foreign exchange.

Economic and social development would be under high pressure in 2016, especially structural reform, illustrated by five missions, namely de-capacity, de-stocking, de-leveraging, cost reduction and complementing weak links. New normal in economic development would be a basic tone for Chinese economy next decade.