

Iron Ore Futures Weekly Report

(Near term: Bullish)

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Market Outlook and Trading Advice:

Iron ore prices were first down and then up, the trend was disturbed by the supply this week. At the beginning of the week, due to the impact of a sharp rise in outbound mining traffic, the market began to have a loose expectation of the subsequent supply of the import mine, and the future price once fell sharply. The market strengthened quickly over the weekend after news reported that Vale's Itabira mine had been sealed off by the local Labor bureau, raising new concerns about the ability of Brazilian mines to make follow-through shipments. But Vale immediately filed for the block to be invalidated, and Vale has not officially announced any further cuts to its annual shipping target so far. From the port inventory change this week, although the amount of arriving port has recovered, the situation of external mine demand is still continuing, the port inventory further declined to 107.8485 million tons this week. The amount of departing port was still above 3 million tons. The rate of blast furnace operation and daily average molten iron output of the steel mill were rising further, but the growth rate was slowing down. The profit of steel mills is further reduced due to the sharp rise in the charging price. The finished steel demand started to fall. The destocking speed slows down. However, the frequent disturbance of the supply side has increased the difficulty of the determination for the iron ore price, and the delivery capacity of the overseas ore has become the main trading logic of the current market. The negative feedback expectation of iron ore price due to the narrowing of finished metal profit before has been completely overturned. On the contrary, the current iron ore price starts to push up the finished metal price from the cost end, and the pricing of iron elements shifts from the demand side to the supply side. Therefore, the traditional ferrous metal industrial chain profit transmission path cannot be used to price the iron ore price temporarily.

Short-term iron ore price driven by capital and sentiment was obvious, the market bullish will be strong, until port inventory does not appear recovery, the rising trend cannot be said to end. In addition, the recent pressure

on the RMB and the gradual recovery of freight have pushed up the arrival cost of imported mines to a certain extent. For trading advice, the upward space has been completely opened, the rise trend will continue in the short term. We recommend the call option to build a bull spread strategy.

1. Iron Ore Market Review

As of May 29, platts 62% Fe was quoted at 100.9 USD per dry ton, up by 4.18% from last week, and the price of imported ore varieties continued to rise generally this week. In terms of Australian ore, driven by a sharp rise in the future price, the premium of medium and high quality Australian ore continued to strengthen this week, with PB fines and JMBF leading the increase. In terms of low quality Australian fines, the increase of FB fines this week is more obvious, and the price difference between SS fines and FB fines was further expanded, mainly due to the current trade volume is tight. The overall price performance of Brazilian mines was still less than Australian mines, IOCJ Carajas was still the most weak varieties of imported mainstream mines, steel mills recent procurement was still mainly concentrated in high quality Australian mines. However, the port inventory of Brazilian mines began to recover this week, and the tradable resources also increased. It is expected that the following port arrival volume will further recover, and the current tight supply situation will be gradually improved. In terms of domestic mines, due to the reasons of the two sessions meeting, the cross-regional purchase of refined fines from Hebei steel mills in Liaoning was blocked. Affected by the traffic, local steel mills in Liaoning province also reduced the purchase amount of domestic mines this week, reducing the usage proportion of domestic mines. Therefore, the price of refined fines was basically stable in northeast China and the demand will improve with the gradual recovery of transportation next week. The supply of refined fines was still relatively tight in Tangshan, coupled with the outstanding cost performance of external mines, which has generated some speculative demand, and the market was willing to support the price. And steel mill respect continues to favor a lump ore, the usage of domestic refined fines continues to drop, so the increasing of refined fines in Tangshan was not much. By contrast, prices have risen by more than 5% this week in Hanxing, with in-plant prices in some areas exceeding those of imported mines. In general, driven by the current high demand, domestic refined fines prices will continue to rise in the short term.

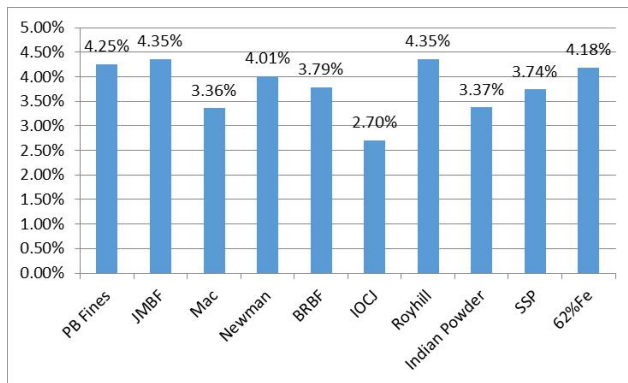


Chart: Up or down of weekly offshore ore prices

Source: Mysteel, Founder CIFCO Futures

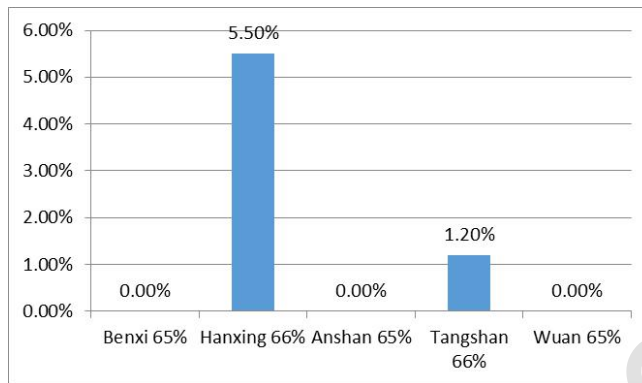


Chart: Up or down of weekly onshore ore prices

	Onshore Ore Prices								
	PB Fines	JMBF	Mac	Newman	BRBF	IOCJ	Royhill	Indian Powder	SSP
2020/5/22	729.0	666.0	715.0	749.0	792.0	889.0	712.0	682.0	588.0
2020/5/29	760.0	695.0	739.0	779.0	822.0	913.0	743.0	705.0	610.0
Weekly Up or Down	31.0	29.0	24.0	30.0	30.0	24.0	31.0	23.0	22.0
	4.25%	4.35%	3.36%	4.01%	3.79%	2.70%	4.35%	3.37%	3.74%

Chart: Weekly offshore ore prices in Rizhao port

Source: Mysteel, Founder CIFCO Futures

	Onshore Ore Prices				
	Benxi 65%	Hanxing 66%	Anshan 65%	Tangshan 66%	Wuan 65%
2020/5/22	640.0	836.0	640.0	669.0	740.0
2020/5/29	640.0	882.0	640.0	677.0	740.0
Weekly Up or Down	0.0	46.0	0.0	8.0	0.0
	0.00%	5.50%	0.00%	1.20%	0.00%

Chart: Weekly onshore ore prices

Source: Mysteel, Founder CIFCO Futures

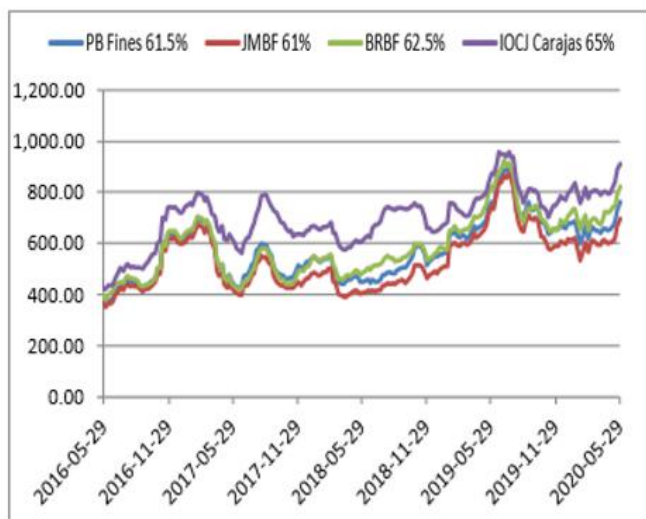


Chart: Medium and high-grade iron ore spot price

Source: Mysteel, Founder CIFCO Futures

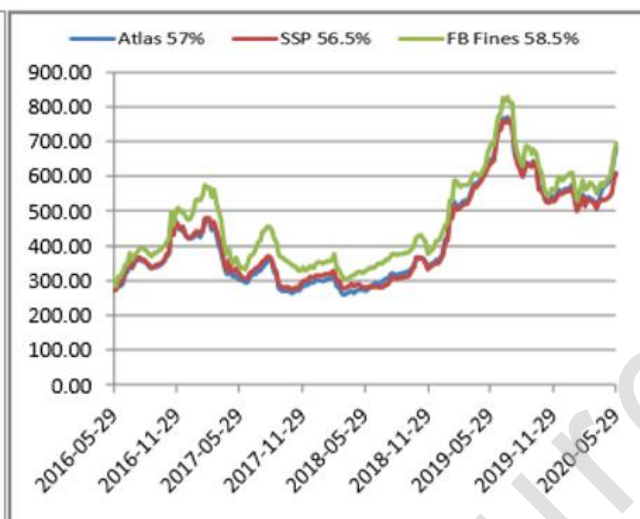


Chart: Low-grade iron ore spot price

In futures market, the prices of contracts in the near and forward months all rose significantly this week. In terms of the trend of each contract, the pattern of near strength and far weakness changed in this week. The cumulative increase of I2101 was the most obvious, and the 9-1 spread began to decline. From the trading volume perspective, the weekly turnover of each contract has been further amplified, among which the increase of 2105 was more obvious. The trading volume increase of i2009 and 2001 was roughly the same, around 16% on average. In terms of trading positions, the 2009 and 2001 increased positions slightly this week, while the 2105 increased positions by more than 120% in the month ahead. In general, the market showed an increase in the trading volume with the ideal momentum and price combination, the market short-term bullish sentiment is still high.

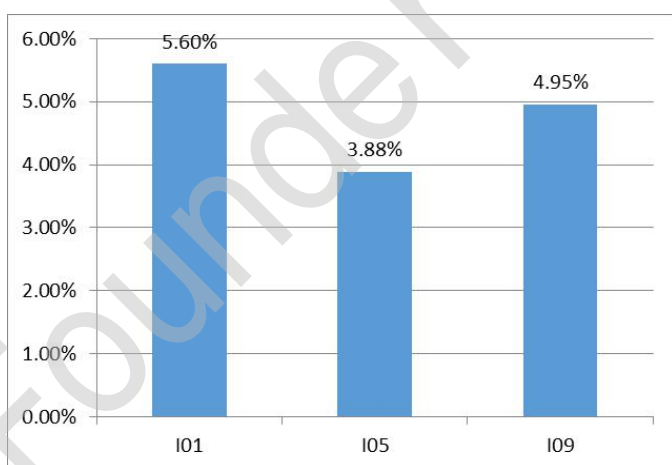


Chart: Up or down of weekly futures prices

Source: Wind, Founder CIFCO Futures

Contract	Open	Close	Settle	Chg	Vol(10,000 bts)	VolChg	Turnover (10,000 RMB)	OI(10,000 bts)	OIChg
I2105	605.5	629	612.5	3.88%	5.4	78.21%	653,504,140.00	1.8574	120.52%
I2009	716.5	752	729	4.95%	702.9	16.18%	100,101,786,540.00	96.99	6.60%
I2101	643	679	661.5	5.60%	45.3	15.99%	5,833,532,740.00	13.9667	8.43%

Chart: Weekly data of iron ore futures

Source: Wind, Founder CIFCO Futures



Chart: Technical chart of i2005

Source: Wind, Founder CIFCO Futures



Chart: Price of contract 05 and price forecast
 Source: Wind, Founder CIFCO Futures

II. Basis and Spread

This week's basis change was very similar to last week, in addition to the main contract price trend is slightly stronger than the spot price, the basis of the forward month contract was showing different degrees of strength. As of May 29, the basis difference of the i2009 was 85.1 RMB/ton, a slight decrease of 1.8 RMB/ton from last week, and the basis difference repair began to slow down. In terms of price difference between varieties, the IOCJ Carajas and PB fines fell slightly by dropping 7 RMB/ton to 153 RMB/ton; The PB fines and JMBF was rising 2 RMB/ton to 65 RMB/ton; The PB fines and SS fines was increasing 9 RMB/ton to 150 RMB/ton. In general, the overflow of PB fines was strong again driven by the future price. As of the end of this week, the 09-01 contract spread was down slightly by 0.5 RMB/ton to 73 RMB/ton and the 1-5 contract spread increased by 12.5 RMB/ton to 50 RMB/ton



Chart: Spread of contract 09 and 01
 Source: Wind, Founder CIFCO Futures

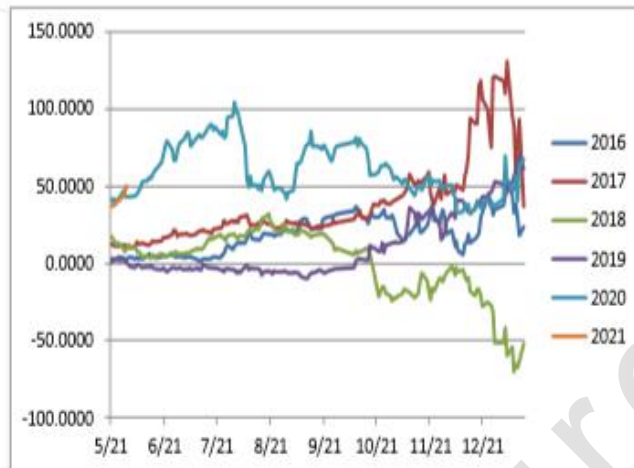


Chart: Spread of contract 05 and 09
 Source: Wind, Founder CIFCO Futures

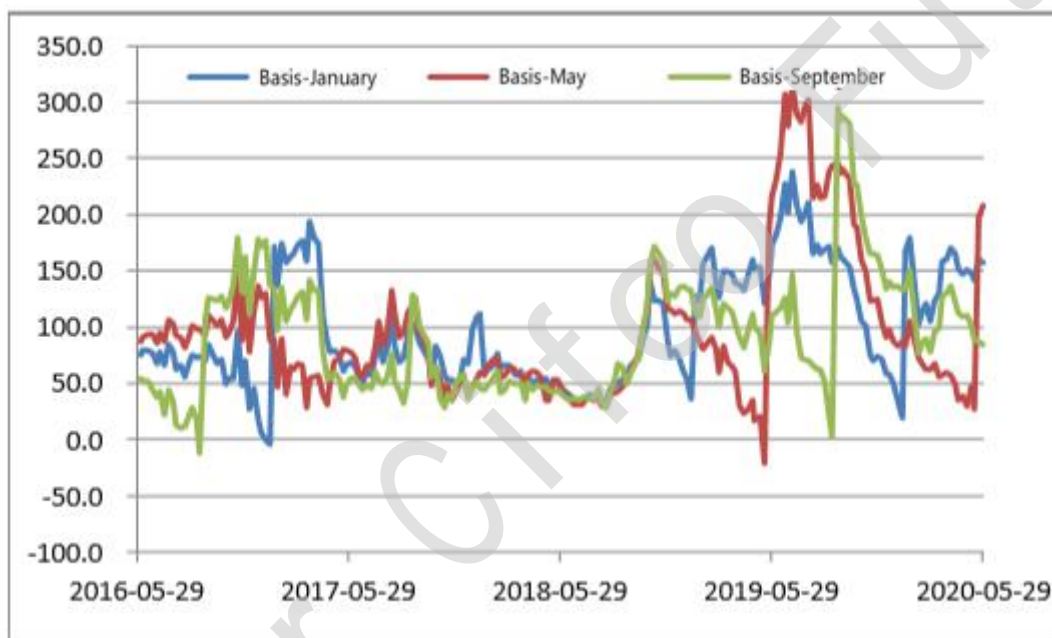


Chart: Basis of spot iron ore (PB fines 61.5%) in Rizhao port
 Source: Wind, Founder CIFCO Futures

III. Shipping Market Review

BDI and BCI fell back again. As of May 28, BDI was at 489, with a decrease of 5 (1.01%). BCI was down 153 (85%). Freight prices fell synchronously this week. As of May 22, the freight from Tubalang to Qingdao was 8.0 USD/ton, with a decrease of 0.1 (1.11%) USD/ton. Freight from western Australia to Qingdao was quoted at 4.0 USD/ton, down 0.8 USD/ton (15.98%).

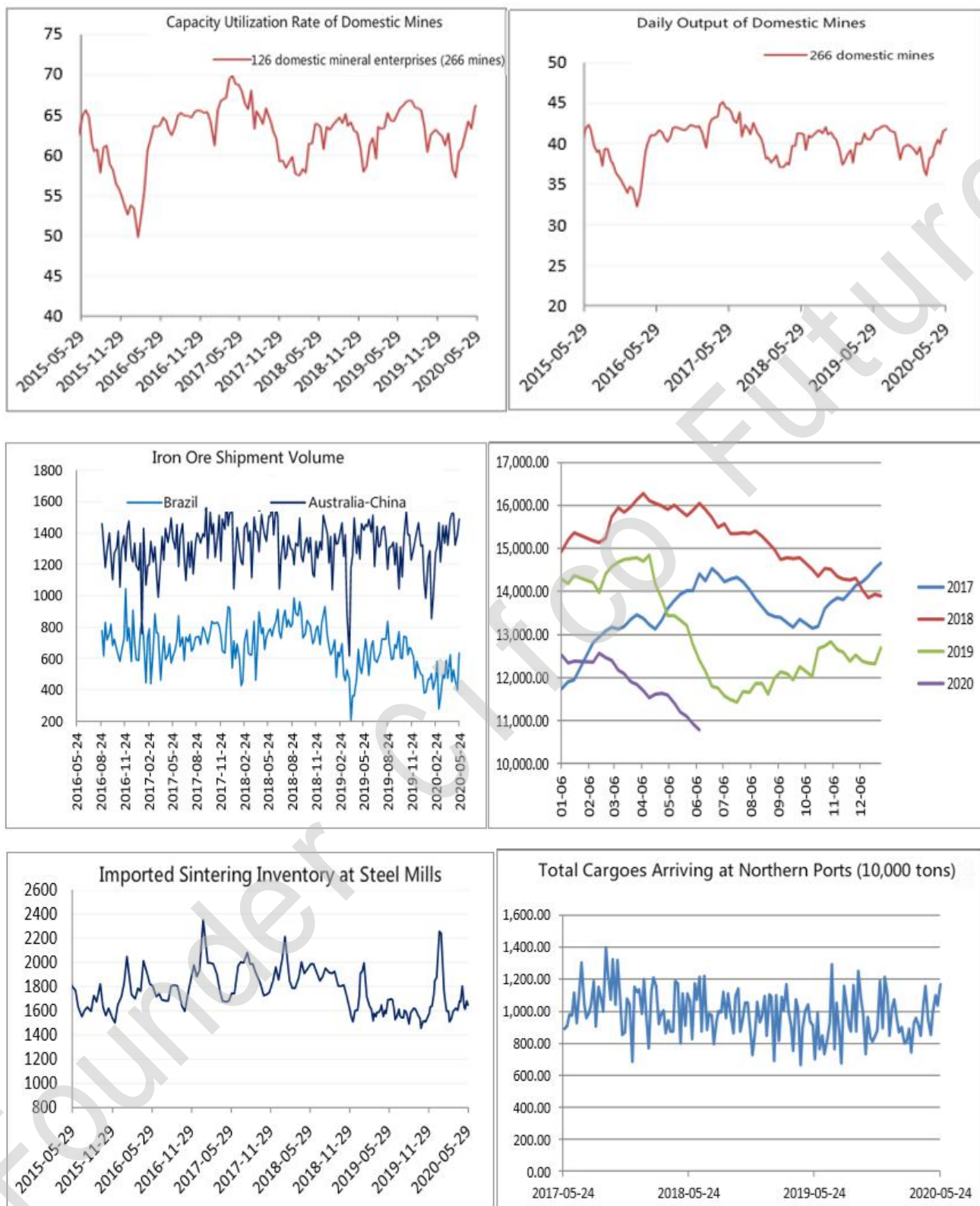


Source: Wind, Founder CIFCO Futures

IV. Supply

The supply of domestic mines continued to rise this week. The latest data (May 29) showed that the operating rate of 126 mining enterprises in China was 66.19% in the current period, up 0.42% from the previous period. The average daily output of domestic mines was 417,600 tons in the latest period, up 26,000 tons/day in the previous period. In terms of foreign mining, the shipment volume of Australian mine started to rise as expected with the end of maintenance. The volume of this period increased by 1.416 million tons, returning to the top of 17 million tons. Among them, the volume of shipment to China was 14.913 million tons, increasing by 957,000 tons on a month-on-month basis. The recovery in Brazilian mine shipments was even more pronounced, rising sharply by 2.4 million tons to 6.342 million tons. A total of 23.639 million tons Australian mines was shipped, a significant increase of 3.816 million tons from the previous month. But towards the end of the week, there were renewed expectations of a contraction in shipments from Brazilian mines, and changes in actual capacity should be watched closely. But towards the end of the week, there were renewed expectations of a contraction in shipments from Brazilian mines, and changes in actual capacity should be watched closely. As of May 29, the imported mine inventory of 45 ports in China was 107.8485 million tons, down again by 1.4123 million tons. The inventory of Australia mine was 61.0128 million tons, down by 20.072 million tons. The inventory of Brazil mines was 21.9342 million tons, up by 35,700 tons. The inventory of trade mine was 52.076 million tons, down by 1.004 million tons and the pellet increased by 589,400 tons to 7.1594 million tons. The lump mine increased by 183,400 tons to 20.9837 million tons and the refined fines increased by 113,500 tons to 6.6554 million tons. In terms of the inventory of steel mills, the

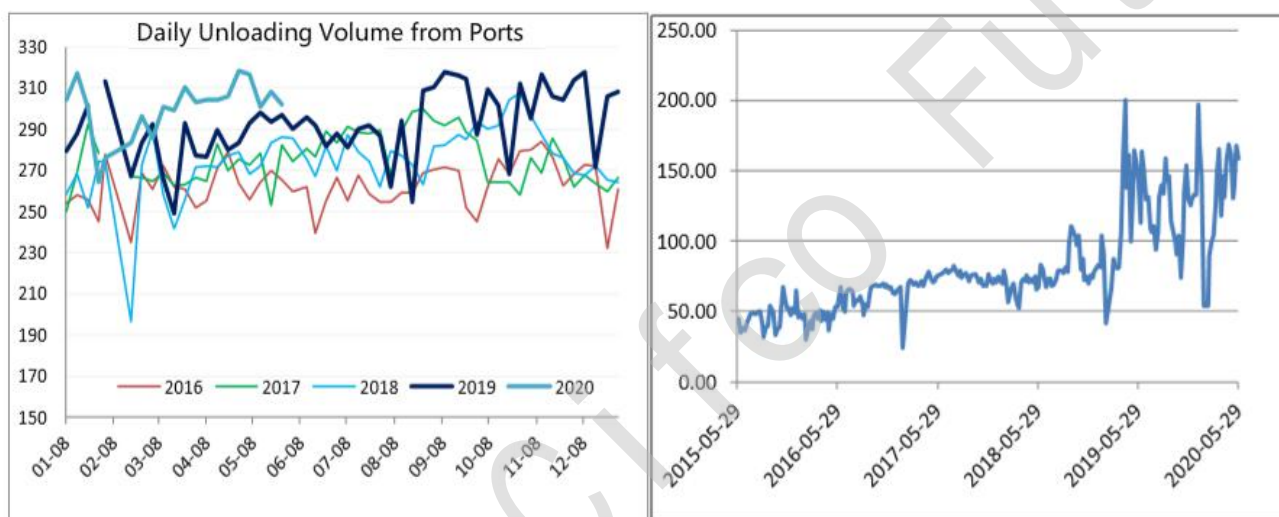
total inventory of imported sintering fines of 64 sample steel mills was 16.5012 million tons with a weekly decrease of 287,300 tons.



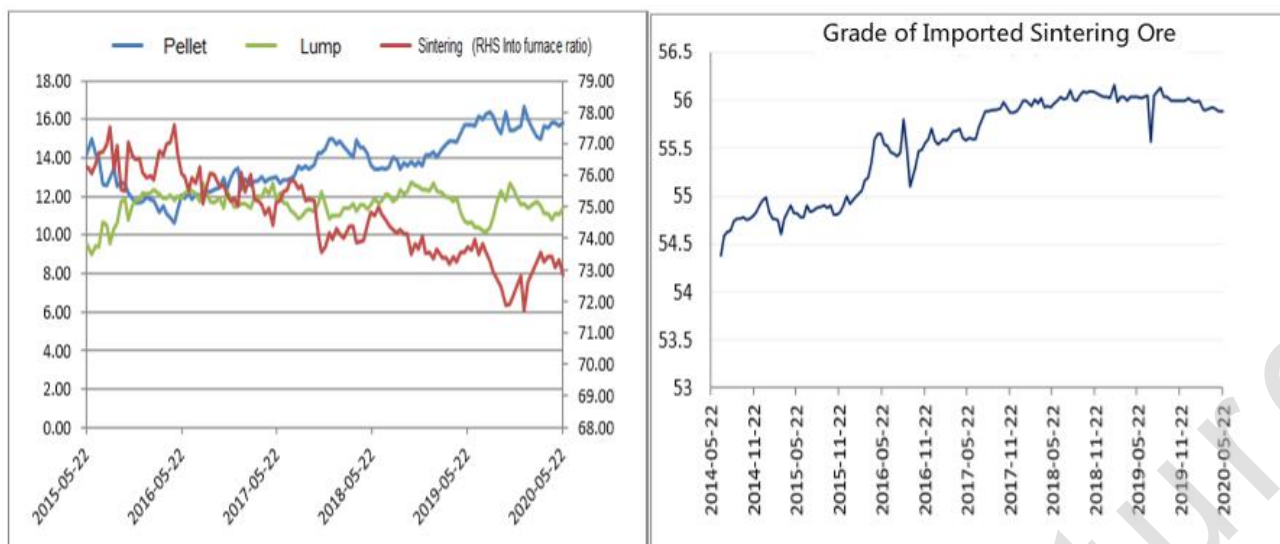
Source: Wind, Founder CIFCO Futures

V. Demand

The latest phase (May 22) steel mill sinter ore into the furnace grade was 55.89%, increasing by 0.01%. The ratio of pellets, sinter and lumps ore into furnace was 15.79%, 72.84% and 11.37% compared with 15.63%, 73.32% and 11.04% respectively in the previous period. Due to the increase in the furnace price, the profit margin of the long-process steel mills was narrowed recently, and the steel mills increased the use of lumps with higher cost performance, which was especially obvious in Tangshan area. The average daily departing port volume fell by 62,000 tons to 3.019,400 tons, but remained at a high level. The average daily spot trading volume of ports also dropped slightly from last week, but it is still relatively strong. It broke through 2.3 million tons in the middle of the week, and the average value was 1,596,600 tons/day, down 87,000 tons/day.

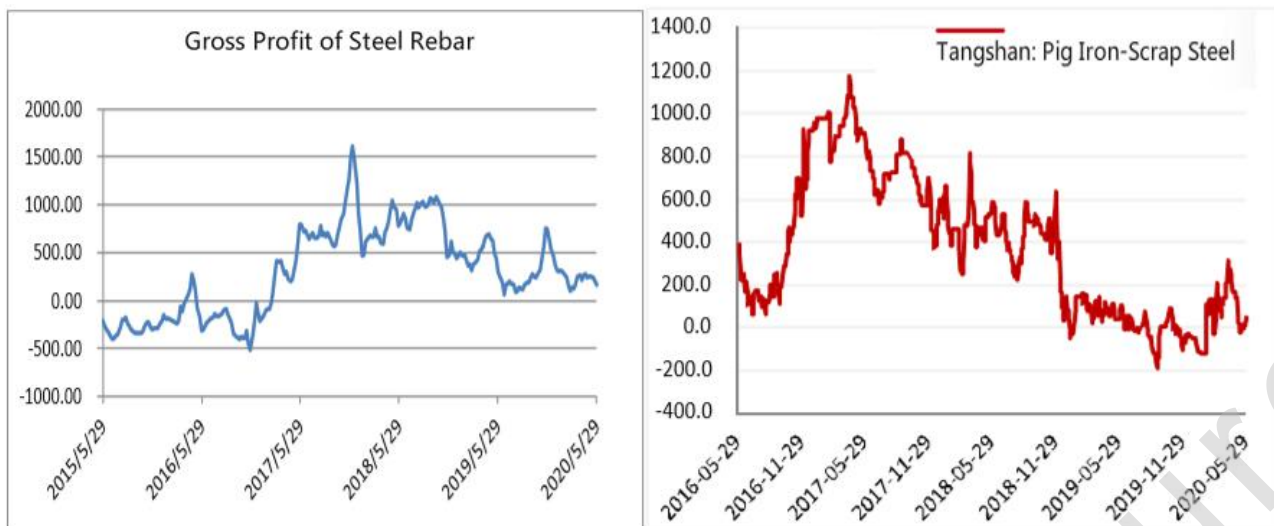


Source: Wind, Founder CIFCO Futures



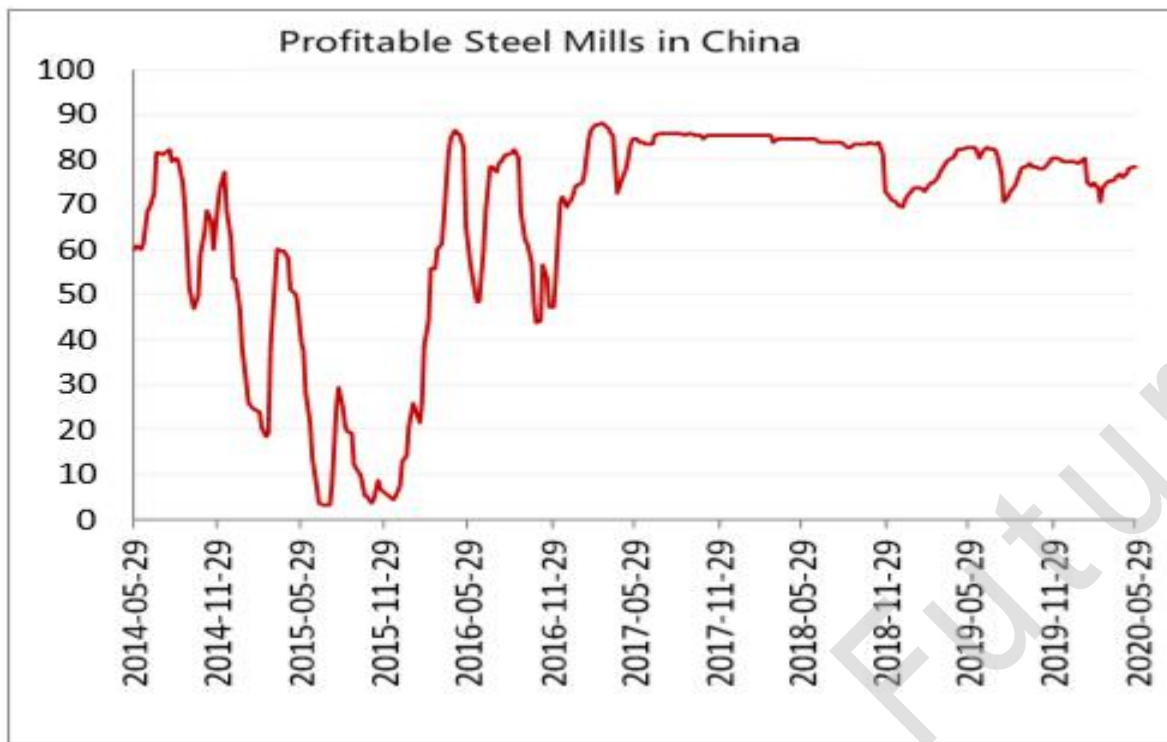
Source: Mysteel, Founder CIFCO Futures

The finished steel price was weakened this week, some steel prices have become loose and the rise in the furnace material price further squeezed the profit margin of the long-process steel mills. The rebar steel profit per ton fell to below 200 RMB/ton. At present, the inventory of finished material was still high and the output is still on the rise. With the approaching of the rainy season in south China, finished material consumption will gradually enter the low season. There was still room for further decline in the profit level of the long-process steel mills. Scrap steel prices remained stable this week, and short-process mills' willingness to produce increased again as prices for some types of steel continued to strengthen. The average operating rate of 71 electric arc furnace steel mills nationwide was increased of 3.13% to 70.13%. The weekly crude steel output of short-process steel plants rose slightly by 2.44%. In general, the growth rate of electric furnace output has recovered to a high level, although there is still a certain gap compared with the same period last year, but in the case of a relatively strong scrap price in the short term, the room for further growth will be limited. The increase in the cost of molten iron was still larger than the scrap steel. The price difference between pig iron and scrap steel further widening the spread. The proportion of profitable steel mills in China was 78.53%.



Source: Wind, Founder CIFCO Futures

The operating rate of blast furnace in 163 steel mills nationwide was 70.44%, up 0.14% from last week. The steel demand began to show signs of weakening, the finished steel destocking began to slow down. The destocking range of more than 1 million tons for the social inventory and for the factory inventory was basically at the same level as last week. However, the production enthusiasm of steel mills is still high, and the output is further recovering. The five major steel production rose by 79,500 tons, among which the weekly output of rebar steel has approached 4 million tons, which continues to refresh the highest value of the same period in history. The average daily production of molten iron continued to rise this week, increased by 11,500 tons to 2.4324 million tons. The daily consumption of imported ore was further increased by steel mills. However, due to the rapid increase of iron ore price, the purchase of steel mills was still based on demand and the willingness to actively replenish stock was not strong. The imported sintering inventory of 64 sample steel mills was decreased of 287,300 tons to 16.5012 million tons. In general, the price of some steel began to loosen because of the decline of finished steel's demand. However, due to the lag in the transmission of the price to the output, the high output of the steel plant is still continuing, but it has gradually approached the peak of the peak season, and the room for further improvement on the demand side of iron ore will gradually narrow down. Overall, the high output of steel mills will continue in the short term, however, the production of molten iron has gradually approached the peak, so the room for further improvement in iron ore demand may be limited.



Output (10,000 tons)	Steel Rebar	Wire Rod	Hot Rolling	Cold Rolling	Medium Plate
2020.05.22	391.56	155.59	308.21	71.41	137.05
2020.05.29	394.01	161.12	307.75	69.73	139.16
Weekly Up or Down	2.45	5.53	-0.46	-1.68	2.11

Source: Mysteel, Founder CIFCO Futures

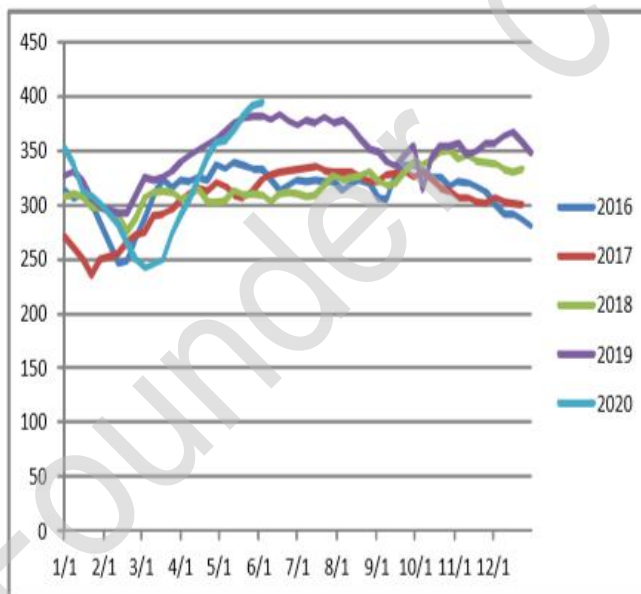


Chart: Weekly output of steel rebar (10,000 tons)



Chart: Weekly output of wire rod (10,000 tons)

Source: Mysteel, Founder CIFCO Futures

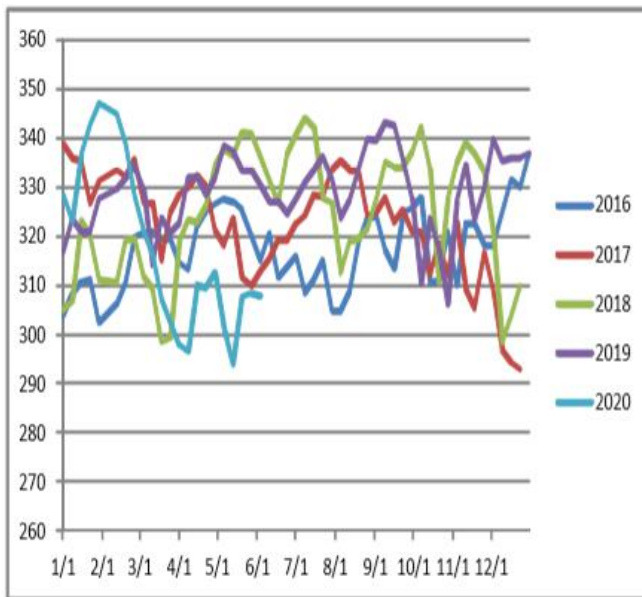


Chart: Weekly output of hot rolling (10,000 tons)

Source: Mysteel, Founder CIFCO Futures

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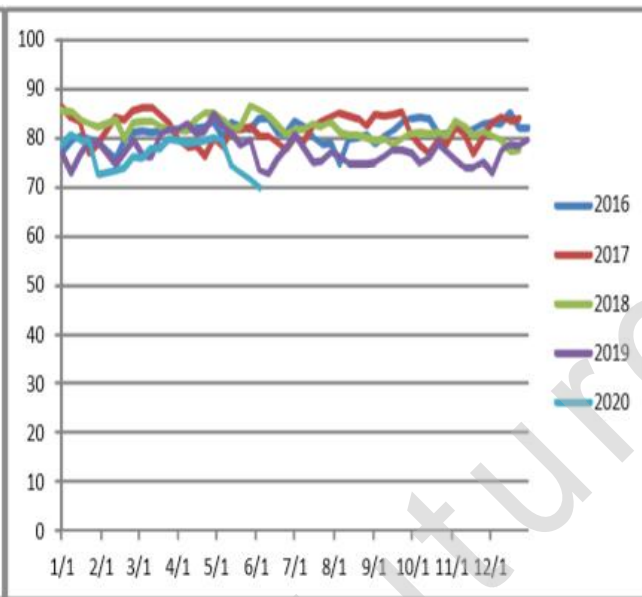


Chart: Weekly output of cold rolling (10,000 tons)

Source: Mysteel, Founder CIFCO Futures

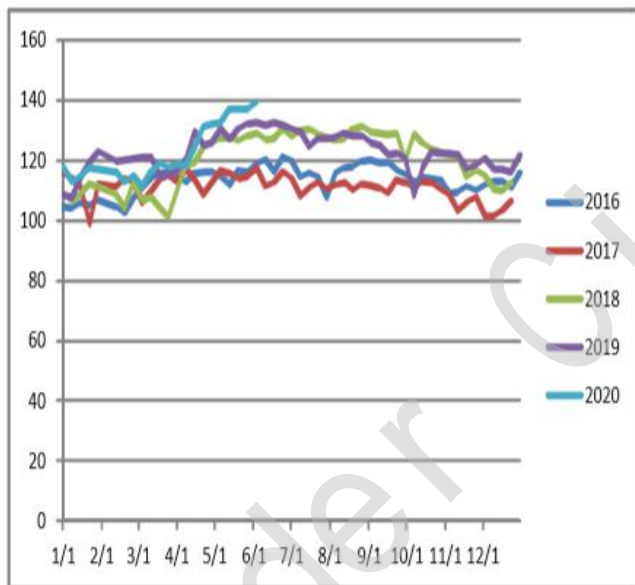


Chart: Weekly output of steel plate (10,000 tons)

Source: Mysteel, Founder CIFCO Futures

Output (10,000 tons)	Steel Rebar	Hot Rolling	Medium Plate	Wire Rod	Cold Rolling
2020.05.22	836.64	291	98.64	250.62	130.5
2020.05.29	802.73	282.38	99.64	234.87	128.25
Weekly Up or Down	-33.91	-8.62	1	-15.75	-2.25

Chart: Social inventory (10,000 tons)

Source: Mysteel, Founder CIFCO Futures

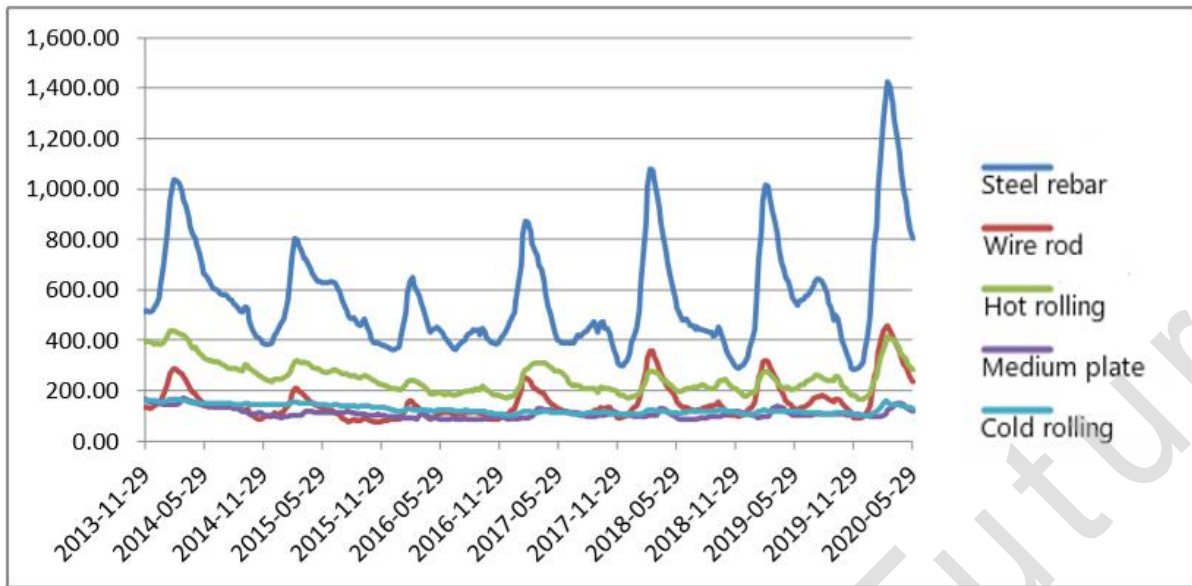


Chart: Weekly social inventory of five steel products

Source: Wind, Founder CIFCO Futures

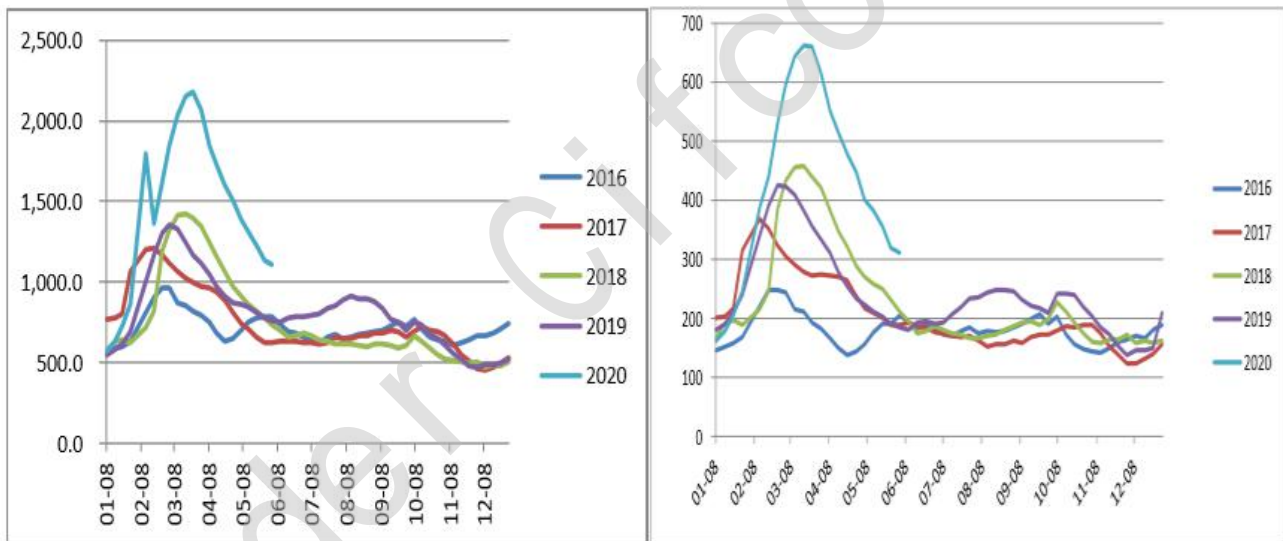


Chart: Total inventory of steel rebar (10,000 tons)

Chart: Total inventory of wire rod (10,000 tons)

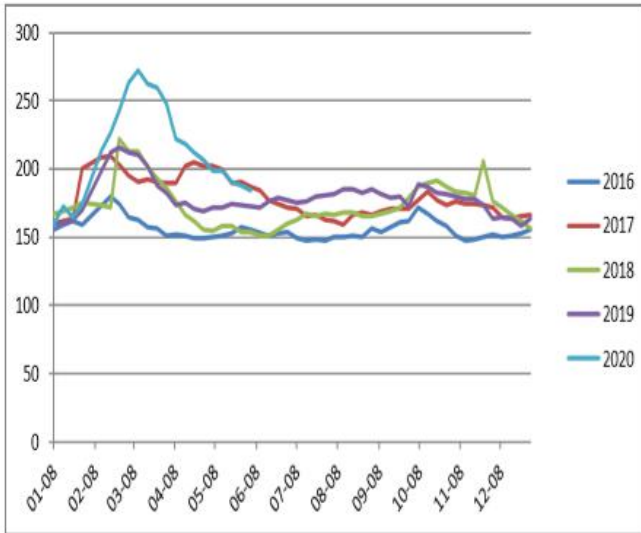


Chart: Total inventory of steel plate (10,000 tons)

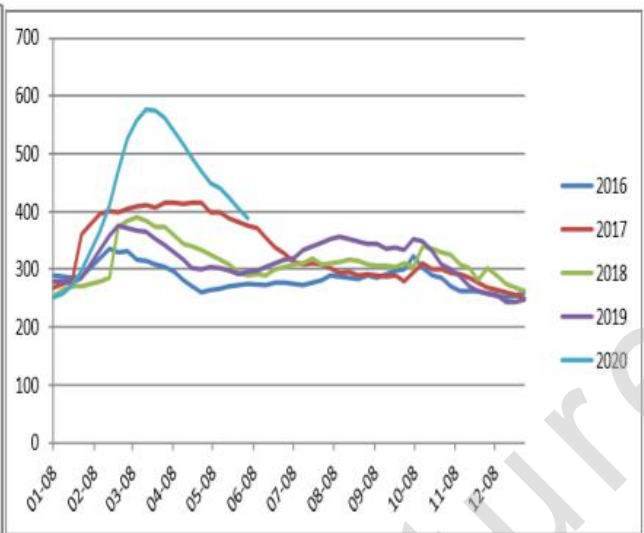
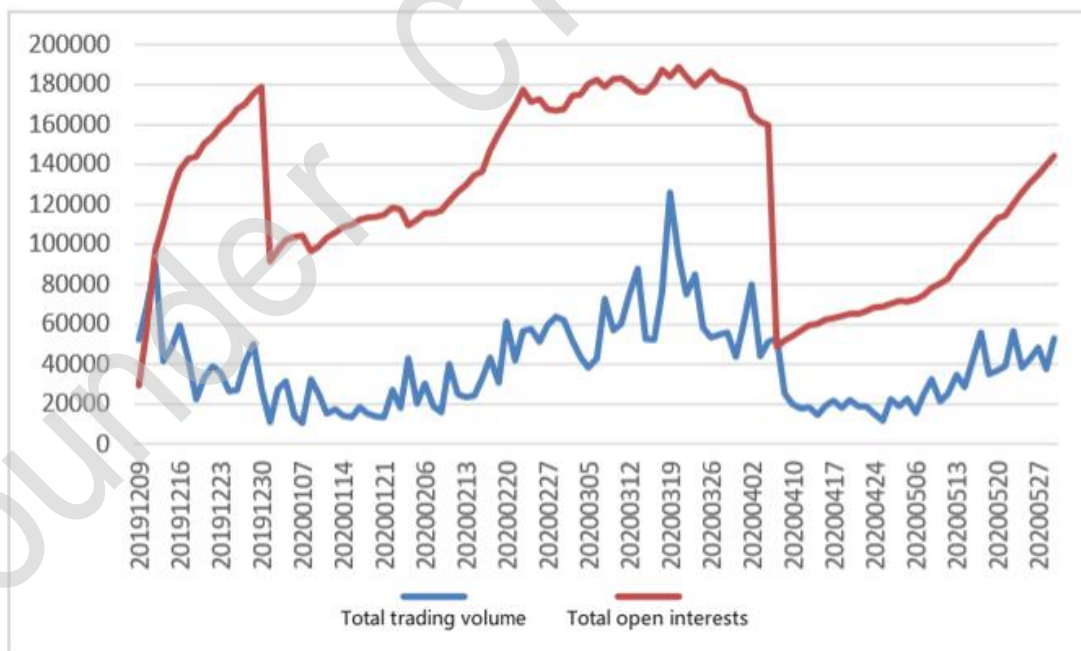


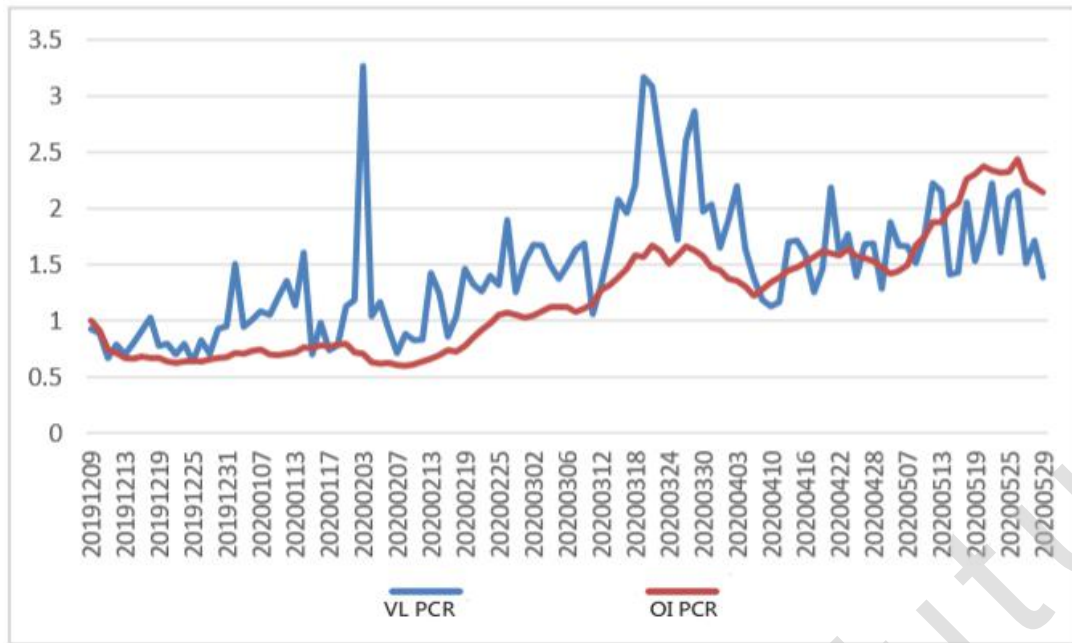
Chart: Total inventory of hot rolling (10,000 tons)

VI. Iron Ore Options

6.1 Options trading and open interest analysis

The daily average trading volume of iron ore options were 43,907 lots, up 742 lots from last week and the daily average open interest were 135,238 lots, up 23,177 lots compared with last week. The put-call ratio of the daily average trading volume was 1.77, down 0.07 and the average daily open interest was 2.27, up 0.05 from the previous week.





6.2 Volatility analysis

The implied volatility of iron ore options declined this week, with the weighted daily implied volatility of 38.08%, down 2.08% from the previous week.

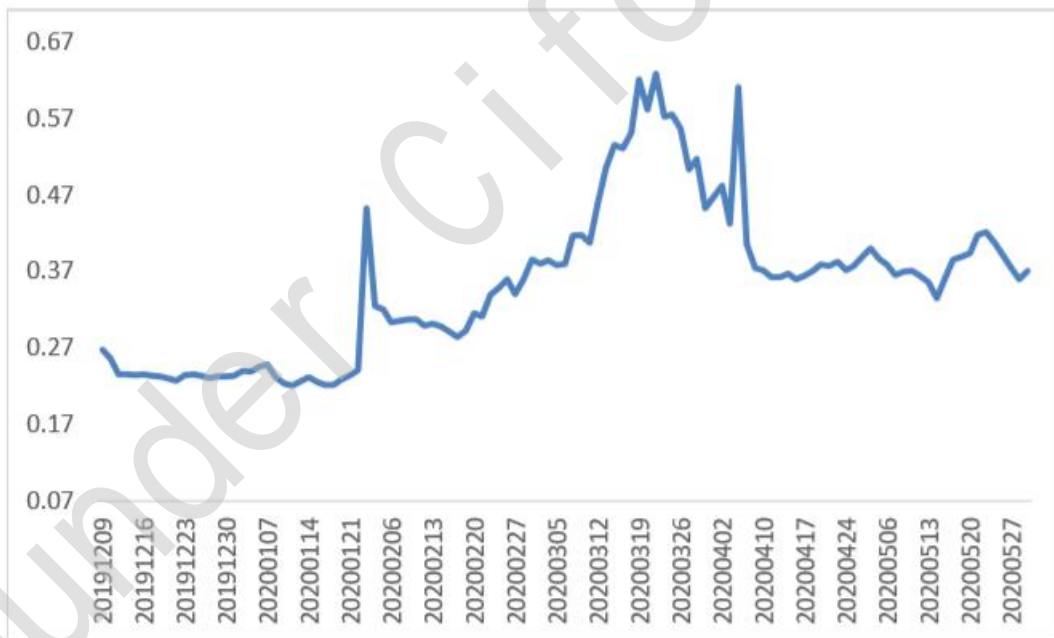


Chart: Implied volatility of iron ore options

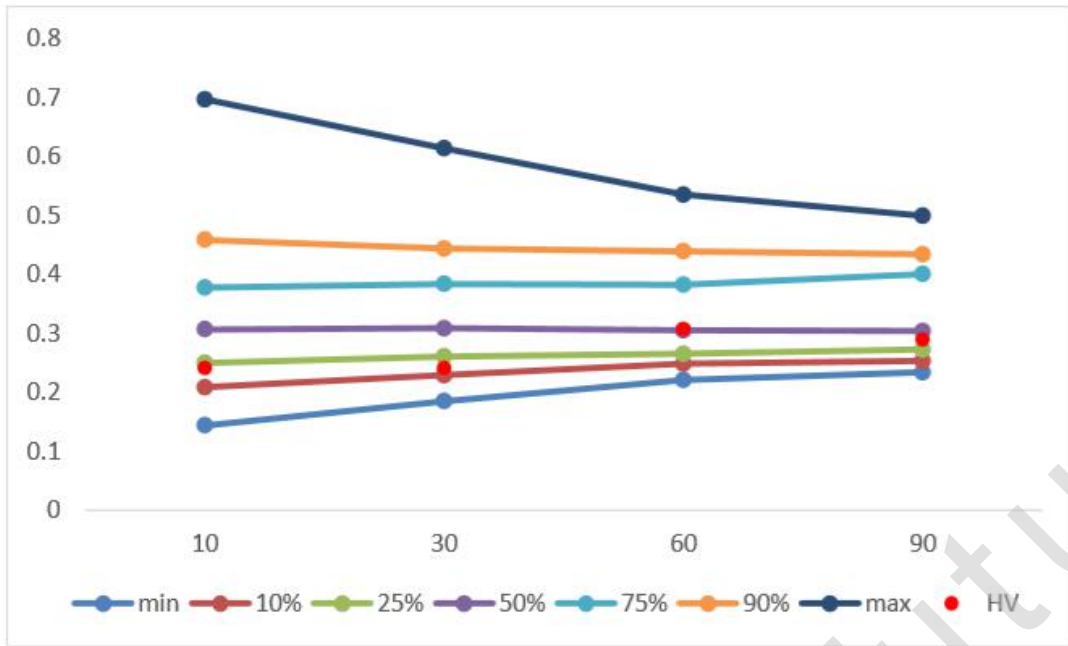


Chart: Volatility cones of iron ore options

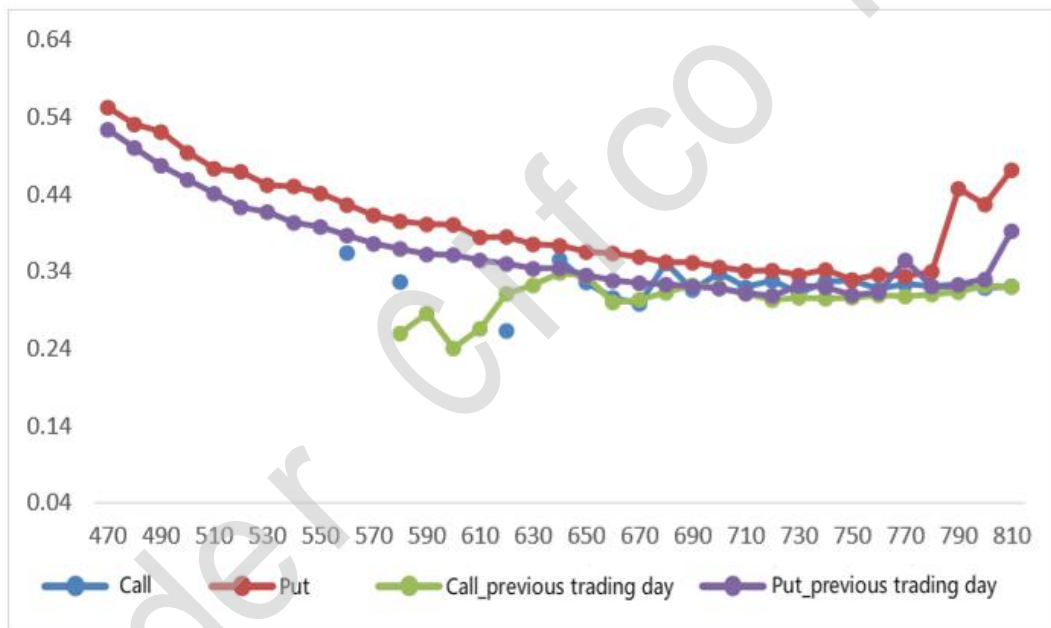


Chart: Implied volatility of nearby contract

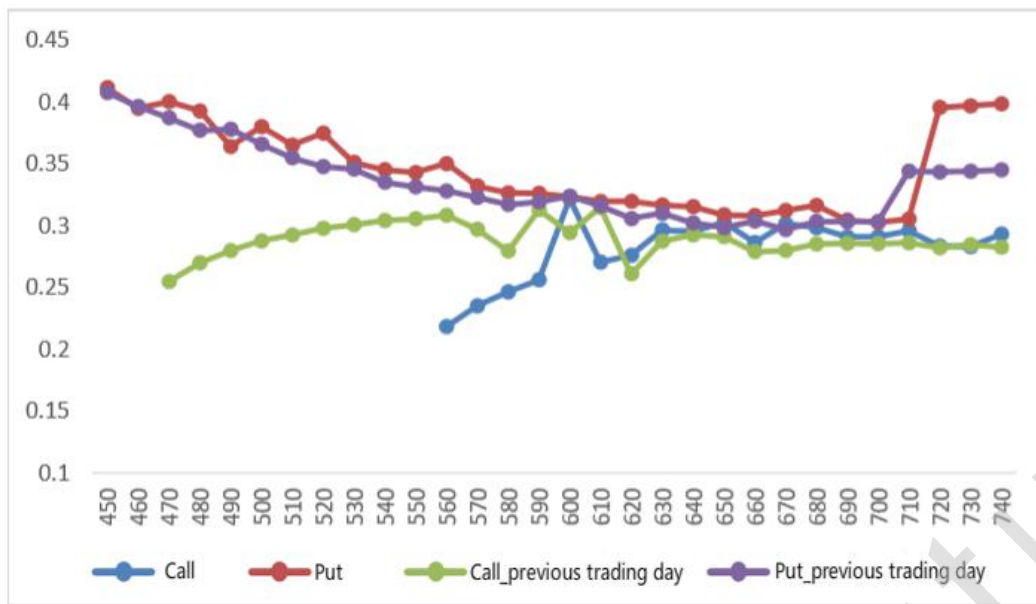


Chart: Implied volatility of forward contract

6.3 Options strategy

The implied volatility of iron ore options has returned to the normal level after the recent gradual decline. The recent rapid upward movement of iron ore futures has further increased the divergence in the market, and the subsequent volatility may rise again, which can be used to construct a long straddle strategy. The future prices are expected to remain strong in early June, and there is still room for further upside, so we think a bull spread strategy can be used.

I. Sell strangle options

买卖	名称	手数	价格类型	价格	买价	卖价	IV	Delta	Gamma	Vega	Theta	合约乘数
买	铁矿石期权2009-C-750	1	卖价	39.9	37.6	39.9	32.08%	0.5184	0.0031	1.2758	-0.3799	100
买	铁矿石期权2009-P-750	1	卖价	50.0	45.1	50.0	35.06%	-0.4794	0.0031	1.2758	-0.3798	100

田加入标的 田保存策略

最大收益: +∞ 最大亏损: -8,990.00

总Delta: 3.9856 总Gamma: 0.6094 总Vega: 256.9942 总Theta: -75.4853

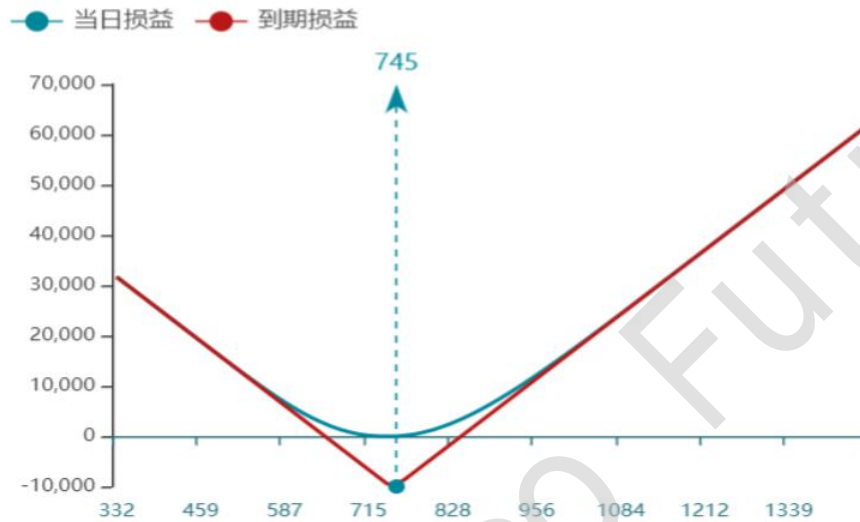


Chart: Break-even balance

II. Sell put options

买卖	名称	手数	价格类型	价格	买价	卖价	IV	Delta	Gamma	Vega	Theta	合约乘数
买	铁矿石期权2009-C-740	1	卖价	45.0	44.1	45.0	32.93%	0.5488	0.0031	1.2673	-0.3772	100
卖	铁矿石期权2009-C-770	1	买价	30.9	30.9	31.4	32.66%	0.4580	0.0031	1.2926	-0.3794	100

田保存策略

最大收益: 1,590.00 最大亏损: -1,410.00

总Delta: 8.9999 总Gamma: -0.0013 总Vega: -2.5550 总Theta: 0.2249

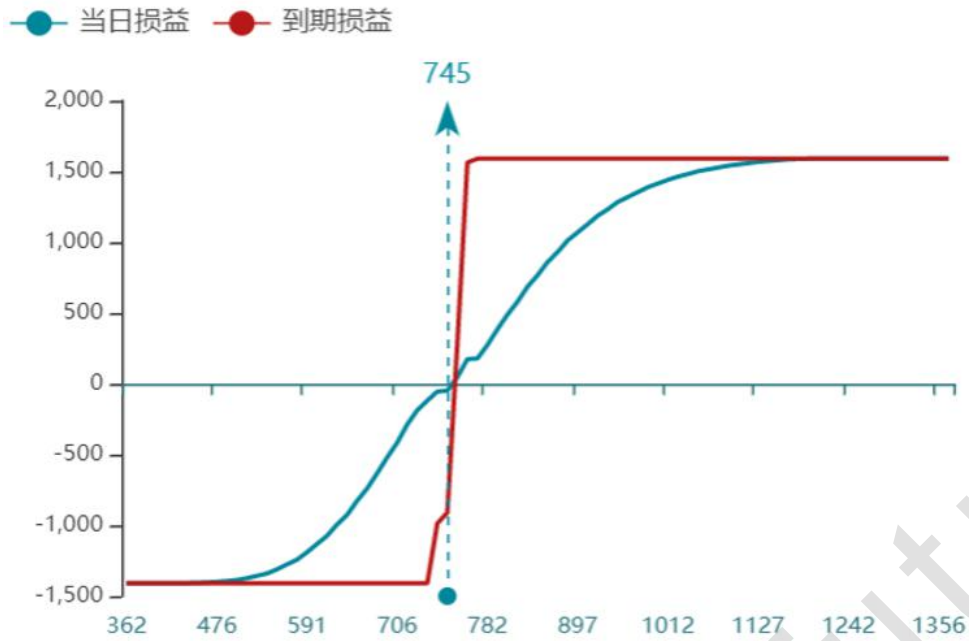


Chart: Break-even balance

VII. Open interests of top futures firms

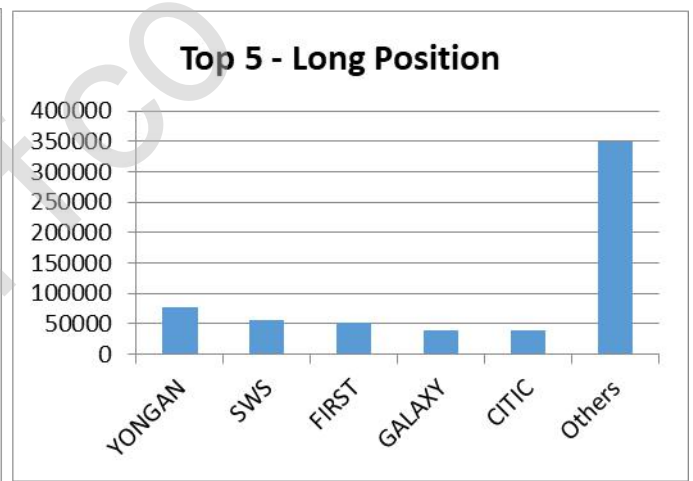


Chart: Top 5 of short positions

Chart: Top 5 of long positions

Source: Wind, Research Institute of Founder CIFCO Futures

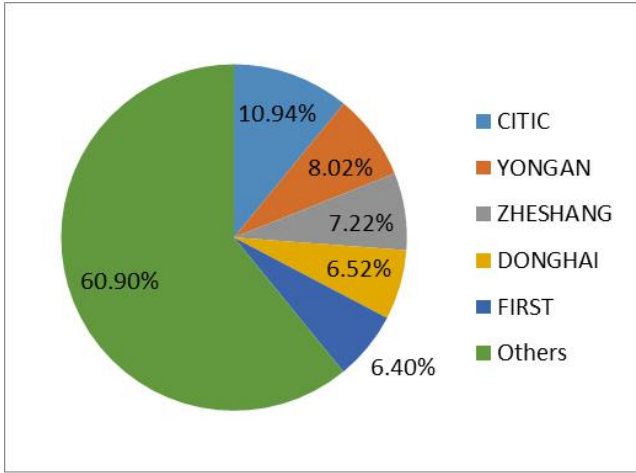


Chart: Short positions proportion

Source: Wind, Research Institute of Founder CIFCO Futures

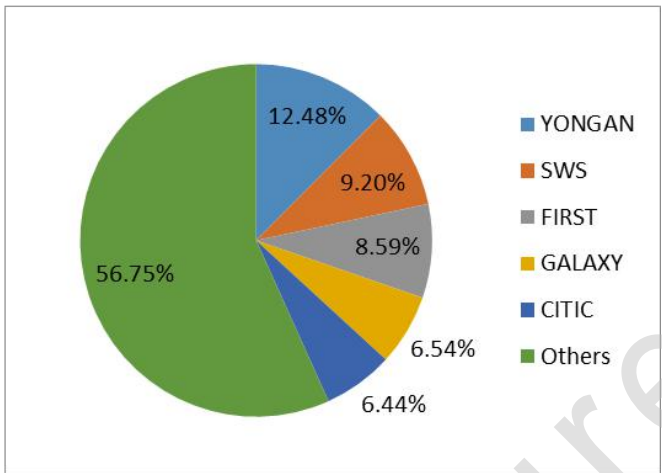


Chart: Long positions proportion

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FIND FOUNDER, FIND FUTURES

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