买入

龙蟒佰利 (002601.SZ)

中国二氧化钛龙头企业，仍处于增长阶段，首次覆盖评为买入(摘要)

002601.SZ	12个月目标价格: Rmb19.00	股价: Rmb13.89	上涨空间: 36.8%

朱金巧 (分析师)
执业证书编号:S1420518030001
+86(21)2401-8935 | marcus.chu@ghsl.cn
北京高华证券有限责任公司

Initiation

龙蟒佰利在全球二氧化钛(TiO2)市场上处于有利地位。二氧化钛是一种白色颜料，广泛用于涂料、塑料和釉料等。龙蟒佰利是全球第三大二氧化钛供应商，成本处于较低水平而利润率稳定，这将带来产量持续增长、市场份额上升，从而推动公司盈利。我们首次覆盖该股评为买入，12个月目标价格人民币19.0元，上行空间36%。

低成本二氧化钛生产商，拥有原料优势：龙蟒的二氧化钛生产成本接近全球生产曲线的低端，因为公司进行了垂直整合（50%以上的原料来自于公司自有钛矿）、相对同业具有规模优势而且资源回收利用较好。龙蟒处于受益于中国二氧化钛供应潜在整合趋势的有利地位。

强劲的产量增长将推动盈利：公司二氧化钛生产规模不断扩张，从2018年的60万吨增长至目前的86.5万吨，2022年目标为120万吨（主要来自于氯化法钛白粉），将通过内生增长（5月份新增20万吨）和外部并购（6月份收购了一家6万吨氯化法钛白粉生产商）得以实现。我们预计到2021年的产量年均复合增速为20%，而且由于利润率相对稳健，净利润年均复合增速应会达到22%。

估值具吸引力：近期该股下跌后对应的2019/20年预期EV/EBITDA为7.2倍/5.8倍，而我们的目标为7.5倍（我们将之应用于2020-21年预期综合EBITDA均值）。我们认为，随着新增产能投产并在2020/21年开始贡献盈利，该股将出现估值重估。我们看到，龙蟒佰利80%的派息率指引隐含的预期股息收益率为7%。

* 全文翻译随后提供

主要数据

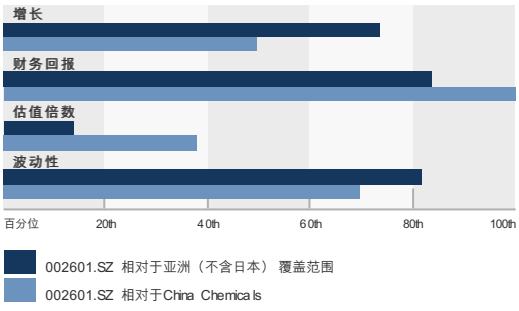
市值: Rmb28.2bn / $4.1bn
企业价值: Rmb32.1bn / $4.6bn
3个月日均成交量: Rmb131.8mn / $19.2mn
中国
China Chemicals
并购概率: 3
租赁是否计入净负债和企业价值: No

预测

	12/18	12/19 E	12/20E	12/21E
主营业务收入 (Rmb mn)	10,440.6	12,293.9	14,814.1	16,937.7
EBITDA (Rmb mn)	3,801.2	4,488.3	5,615.4	6,507.4
每股盈利 (Rmb)	1.12	1.35	1.73	2.04
市盈率 (X)	13.4	10.3	8.0	6.8
市净率 (X)	2.5	2.2	2.0	1.9
股息收益率 (%)	5.0	7.3	10.0	11.7
净负债/EBITDA (X) (剔除租赁)	0.8	0.8	0.6	0.5
CROCI (%)	18.6	18.3	20.6	21.9
自由现金流收益率 (%)	5.1	8.1	11.6	13.8

	3/19	6/19 E	9/19 E	12/19 E
每股盈利 (Rmb)	0.31	0.34	0.36	0.34

要素概要



资料来源：公司数据、高盛研究预测

买入

龙蟒佰利 (002601.SZ)

评级自2019年8月3日

比率和估值

	12/18	12/19 E	12/20E	12/21E
市盈率 (X)	13.4	10.3	8.0	6.8
市净率 (X)	2.5	2.2	2.0	1.9
自由现金流收益率 (%)	5.1	8.1	11.6	13.8
EV/EBITDAR (X)	8.9	7.1	5.7	4.9
EV/EBITDA (X) (剔除租赁)	8.9	7.1	5.7	4.9
CROCI (%)	18.6	18.3	20.6	21.9
净资产回报率 (%)	18.1	21.5	26.1	29.1
净负债/股东权益 (%)	23.2	26.8	25.4	23.0
净负债/权益 (%) (剔除租赁)	23.2	26.8	25.4	23.0
利息保障倍数 (X)	11.2	14.6	18.8	22.3
存货销售天数	61.4	62.7	61.8	63.6
应收账款周转天数	69.8	58.6	58.0	59.4
应付账款周转天数	134.0	142.7	118.1	102.0
杜邦净资产回报率 (%)	18.1	20.5	24.9	27.6
周转率 (X)	0.5	0.6	0.7	0.7
杠杆比率 (X)	1.7	1.6	1.6	1.5
总现金投资，名义（剔除现金）(Rmb)	20,028.2	22,354.0	24,182.0	26,066.4
平均已动用资本 (Rmb)	15,568.4	16,252.3	17,316.8	18,076.1
每股净资产 (Rmb)	6.11	6.45	6.80	7.20

增长率和利润率 (%)

	12/18	12/19 E	12/20E	12/21E
主营业务收入增长率	1.8	17.8	20.5	14.3
EBITDA增长率	(5.8)	18.1	25.1	15.9
每股盈利增长	(8.7)	19.9	28.3	17.8
每股股息增速	37.1	34.1	36.9	17.8
EBIT利润率	27.8	28.5	30.5	31.6
EBITDA利润率	36.4	36.5	37.9	38.4
净利润率	21.9	22.3	23.7	24.5

股价走势图

	3个月	6个月	12个月
绝对	(11.4)%	12.8%	3.3%
相对于沪深300指数	(7.4)%	(2.2)%	(7.0)%

资料来源：公司数据、高盛研究预测、FactSet（股价为2019年8月2日收盘价）

损益表 (Rmb mn)

	12/18	12/19 E	12/20E	12/21E
主营业务收入	10,440.6	12,293.9	14,814.1	16,937.7
主营业务成本	(5,235.3)	(6,121.1)	(7,368.8)	(8,499.0)
销售、一般及管理费用	(1,257.6)	(1,512.2)	(1,644.4)	(1,744.6)
研发费用	–	–	–	–
其它营业收入/(费用)	(146.4)	(172.4)	(185.5)	(186.7)
EBITDA	**3,801.2**	**4,488.3**	**5,615.4**	**6,507.4**
折旧和摊销	(903.7)	(985.5)	(1,091.7)	(1,151.6)
EBIT	**2,897.5**	**3,502.8**	**4,523.7**	**5,355.8**
净利息收入/（支出）	(135.0)	(172.8)	(198.4)	(198.7)
联营公司损益	1.6	1.2	1.2	1.2
税前利润	**2,715.9**	**3,331.1**	**4,326.4**	**5,158.3**
税项拨备	(395.6)	(549.4)	(756.9)	(954.1)
少数股东损益	(34.5)	(41.4)	(53.1)	(62.5)
优先股息	–	–	–	–
非经常性项目前净利润	**2,285.7**	**2,740.3**	**3,516.4**	**4,141.7**
税后非经常性损益	–	–	–	–
非经常性项目后净利润	**2,285.7**	**2,740.3**	**3,516.4**	**4,141.7**
EPS（基本，扣非前）(Rmb)	**1.12**	**1.35**	**1.73**	**2.04**
EPS（摊薄，扣非前）(Rmb)	**1.12**	**1.35**	**1.73**	**2.04**
EPS（基本，扣非后）(Rmb)	**1.12**	**1.35**	**1.73**	**2.04**
EPS（摊薄，扣非后）(Rmb)	**1.12**	**1.35**	**1.73**	**2.04**
每股股息 (Rmb)	0.75	1.01	1.38	1.63
股息支付率 (%)	67.0	75.0	80.0	80.0

资产负债表 (Rmb mn)

	12/18	12/19 E	12/20E	12/21E
现金及等价物	1,684.4	1,043.7	1,038.3	1,172.3
应收账款	1,812.3	2,134.0	2,571.5	2,940.1
存货	1,947.7	2,277.3	2,741.5	3,161.9
其它流动资产	1,023.1	1,023.1	1,023.1	1,023.1
流动资产	**6,467.5**	**6,478.1**	**7,374.4**	**8,297.4**
固定资产净额	7,256.8	7,984.9	8,023.3	8,001.9
无形资产净额	6,232.5	6,102.4	5,972.2	5,842.0
投资总额	63.8	65.0	66.1	67.3
其它长期资产	903.0	903.0	903.0	903.0
资产合计	**20,923.7**	**21,533.3**	**22,339.1**	**23,111.7**
应付账款	2,437.9	2,347.8	2,422.6	2,328.5
短期债务	4,211.4	4,211.4	4,211.4	4,211.4
短期租赁负债	–	–	–	–
其它流动负债	697.9	697.9	697.9	697.9
流动负债	**7,347.1**	**7,257.1**	**7,331.9**	**7,237.7**
长期债务	407.8	407.8	407.8	407.8
长期租赁负债	–	–	–	–
其它长期负债	534.7	508.0	482.6	458.5
长期负债	**942.6**	**915.8**	**890.4**	**866.3**
负债合计	**8,289.7**	**8,172.9**	**8,222.3**	**8,104.0**
优先股	–	–	–	–
普通股权益	12,422.9	13,108.0	13,811.3	14,639.6
少数股东损益	**211.1**	**252.5**	**305.6**	**368.1**
负债及股东权益合计	**20,923.7**	**21,533.3**	**22,339.1**	**23,111.7**
调整后净负债	2,934.8	3,575.5	3,580.8	3,446.9

现金流量表 (Rmb mn)

	12/18	12/19 E	12/20E	12/21E
净利润	2,285.7	2,740.3	3,516.4	4,141.7
折旧及摊销加回	903.7	985.5	1,091.7	1,151.6
少数股东权益加回	34.5	41.4	53.1	62.5
运营资本增减净额	(1,514.2)	(741.3)	(826.8)	(883.2)
其它经营性现金流	321.0	(27.9)	(26.6)	(25.3)
经营活动产生的现金流	**2,030.8**	**2,997.9**	**3,807.8**	**4,447.3**
资本开支	(454.8)	(700.0)	(500.0)	(500.0)
收购	(140.4)	(883.4)	(500.0)	(500.0)
剥离	2.8	–	–	–
其它	–	–	–	–
投资活动产生的现金流	**(592.4)**	**(1,583.4)**	**(1,000.0)**	**(1,000.0)**
偿还租赁负债	–	–	–	–
支付的股息（普通股和优先股）	(2,806.5)	(2,055.2)	(2,813.1)	(3,313.4)
借款增减	277.4	–	–	–
其它融资性现金流	368.0	0.0	0.0	0.0
筹资活动产生的现金流	**(2,161.1)**	**(2,055.2)**	**(2,813.1)**	**(3,313.4)**
总现金流	**(722.7)**	**(640.7)**	**(5.3)**	**133.9**
自由现金流	1,576.0	2,297.9	3,307.8	3,947.3

资料来源：公司数据、高盛研究预测

目录

PM summary

Lomon Billions (Lomon) was listed on the Shenzhen Stock Exchange in 2011, and is specialized in the production and sale of TiO2, with over 30 years of TiO2 operational experience. Lomon is now the third-largest TiO2 producer globally in terms of capacity, and the top producer in China (21% market share) and Asia overall. It was formed by the merger between Henan Billions Chemical and Sichuan Lomon Titanium Industry in October 2016. The company now has 865ktpa of TiO2 capacity (540kt sulfate process; 325kt chloride process), representing c. 9% of global capacity.

Balanced TiO2 outlook: TiO2 contributed 89% of Lomon's gross profit in 2018, and its share price has had a 0.7 correlation with TiO2 prices since listing in 2011. We see TiO2 supply rising, though new capacity will be partly offset by some smaller sulfate TiO2 firms in China exiting the business. China demand looks flat this year, and should normalize from next year, back to 3%/3% growth in 2020/2021E. Costs should be stable, with only modest inflation risks (we expect gradual increases in ilmenite prices). Thus, while TiO2 prices may be volatile over the short term, we expect them to be relatively stable over our forecast period.

Cost leadership to help consolidate market: Lomon is the third-largest TiO2 producer globally. Its ASPs are above Chinese peers, given its high-quality output and stable production— and with its focus on chloride TiO2 product specialization and differentiation, we see upside for Lomon's chloride TiO2 ASP over time. After multiple years of consolidation and integration, Lomon has moved down the cost curve compared with peers. We attribute its better cost structure to: 1) better plant integration through recycling of by-products; 2) scale benefits vs. smaller Chinese sulfate producers; and 3) supply of titanium from its own mines (at >50%). This enables it to earn higher margins vs. peers; it is just behind Chemours, the global leader.

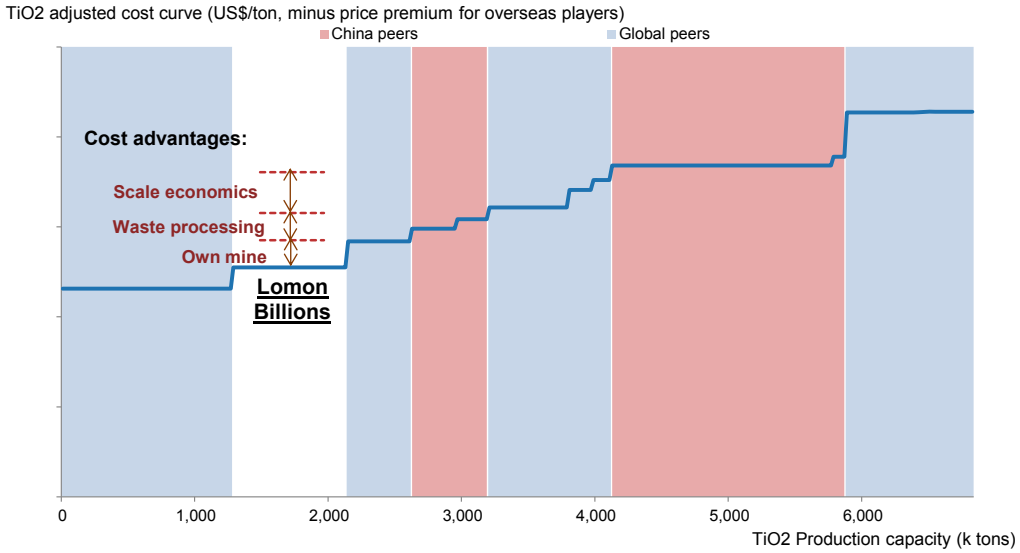
Positive on volume growth potential: After ramping up the 200kt phase 2 chloride unit in Henan and the 60kt chloride unit in Yunnan (just acquired), Lomon said it will start re-configuring its existing 60kt phase 1 chloride unit in Henan (to 100kt) and might start a new greenfield project (100-200kt), potentially in Henan/Sichuan/Yunnan. As well as organic growth, Lomon has mentioned its interest in looking for acquisition targets, given that some existing smaller TiO2 producers are interested in exiting the market. This is in line with its target of growing capacity from 600kt (2018) to 1,150kt within three years. Lomon is also investing vertically by acquiring titanium mines (upstream feedstock) and investing in high-end titanium sponge and titanium alloys (downstream applications).

Financials/valuation: We forecast revenue and EBITDA CAGRs of 18% and 20%, respectively, during 2018-2021E, mainly driven by 20% sales volume CAGR with almost flattish price forecast, supporting 8% free cashflow yield and 7% dividend yield (at 75% payout) in 2019E. We apply 7.5X EV/EBITDA (average since 2016) on 2020-2021 blended average EBITDA to derive a 12-month price target of Rmb19.0, which implies 36% upside.

Catalysts: We believe the stock should re-rate as Lomon’s new capacity growth is delivered and starts contributing to earnings in 2020/21E. Any news on supply consolidation would be positive for Lomon given its leading position (both in capacity and quality) in China. Removal of the overhang related to the upcoming free-float increase (in September) might also be a near-term catalyst.

Key risks: Lower-than-expected TiO2 prices; worse-than-expected utilisation at new chloride plants; insufficient feedstock supply for chloride TiO2; regulatory changes on environmental regulations; operational risks; increased free float increase; and forex risks.

图表 1: We estimate Lomon Billions is at the low end of the cost curve

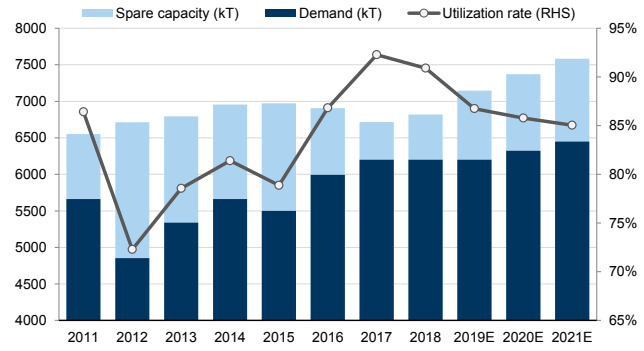


资料来源：公司数据, 高华证券研究

What is TiO2 and how is it made? Titanium dioxide (TiO2) is a white pigment, widely used in paints, plastics, paper making, printing inks, etc. There are two main production technologies: sulfate process (mainly in China) and chloride process (mainly outside China). The sulfate process uses ilmenite (a common iron-titanium oxide) as the major feedstock, plus sulfuric acid. The chloride process uses rutile or purer ore (higher titanium concentration) as the major feedstock, plus chlorine gas. Rutile TiO2 has better weatherability and opacity, making it more suitable for outdoor coatings, plastics, advanced paper coatings, etc. The biggest customers are paint and coatings firms, such as PPG, Nippon Paint and Akzo Nobel.

Our thesis in charts

图表 2: Global utilization to decline further but staying above 85% level
Global TiO2 demand and supply



资料来源：TZMI, Gao Hua Securities Research

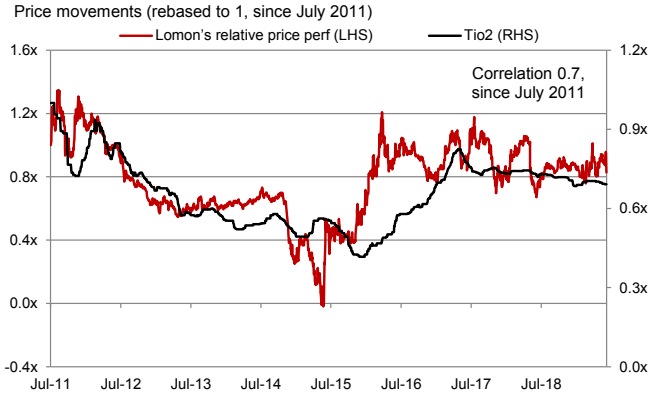
图表 3: China planned capacity additions

Project	Technology	Guided time	Capacity (tons)	Remarks
Yibin Tianyuan	Chloride	Jan-19	50,000	Commissioned
Yibin Tianyuan	Chloride	Jun-19	50,000	Delayed
Lomon Billions	Chloride	May-19	100,000	Commissioned
Lomon Billions	Chloride	1H19	100,000	Commissioned
Shengwei Fujin	Chloride	1H19	60,000	Delayed
Jinhai Titanium	Sulfate	End-2019	100,000	
Jinhai Titanium	Chloride	1Q20	60,000	Likely delay
Pangang	Chloride	End-2019	60,000	Likely delay
Feiyang	Sulfate	2020	100,000	Likely delay
Xianghai	Chloride	2021	60,000	

Note: The sulfate TiO2 plants listed above were approved before the ban was announced.

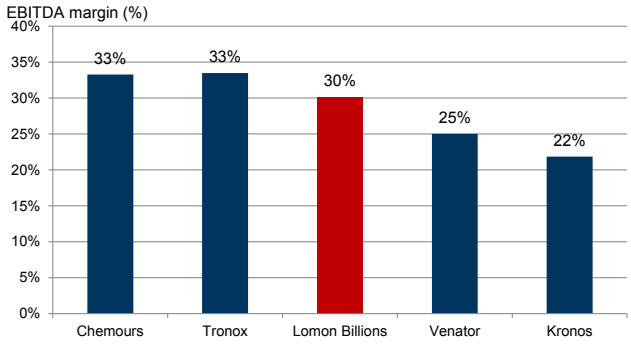
资料来源：Baiinfo, Gao Hua Securities Research

图表 4: Lomon’s share price tracks closely with TiO2 prices



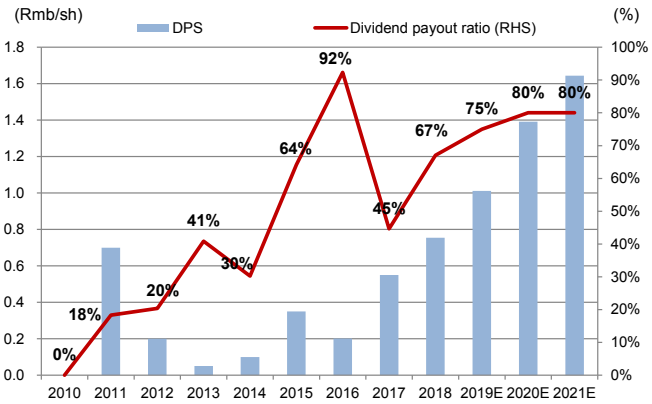
资料来源：Datastream, 万得

图表 5: Lomon’s TiO2 EBITDA margin (2018) comes third vs. global peers



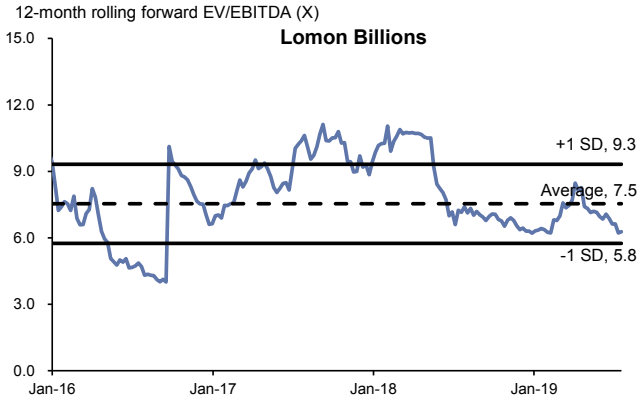
资料来源：公司数据

图表 6: Lomon: Generous dividend payouts



资料来源：公司数据, 高华证券研究

图表 7: Lomon: Trading below the historical average EV/EBITDA



资料来源：公司数据, Datastream, Gao Hua Securities Research

TiO2 market outlook: supply / demand broadly balanced

Overall, we see Ti02 supply rising, though new capacity will be partly offset by some smaller firms who are using sulfate technology exiting the business. Demand looks flat this year, and should normalize from next year, back to 3%/3% growth in 2020/2021E. Costs should be stable, with only modest inflation risks (we expect gradual increases in ilmenite prices). Thus while prices may be volatile over the short term, we expect them to be relatively stable over our forecast period.

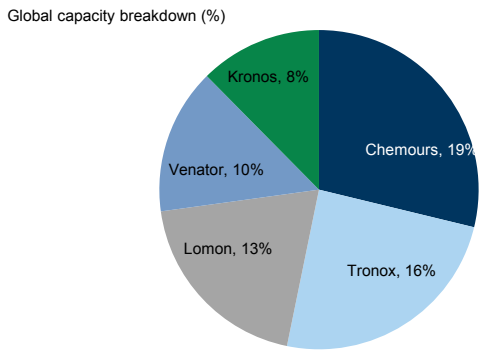
Supply — China is adding new TiO2 supplies

There are a number of new plants planned to come online this year and next year in China. Most are chloride TiO2 units, since China has banned new project approvals for sulfate TiO2 plants. However, delays to chloride TiO2 plant commission times and ramp-up schedules have been common in the past. New-comers have tended to build smaller plants first for testing, before making further larger investments. Moreover, there have been multiple failures at companies looking to set up chloride TiO2 plants (which is relatively new technology in China). We forecast China's TiO2 capacity will grow by 250/100/100ktpa in 2019/2020/2021E.

About 10% of China's capacity has per-unit capacity below 50kt and over 10 years of operations. This portion of supply, in our view, is subject to closure, as we see the tightening of emissions standards (particularly for solid waste and waste acid disposal), which smaller operations might find difficult or uneconomic to meet.

Outside of China, some global TiO2 producers have mentioned targets for de-bottlenecking — for instance, Chemours said it targets to increase its capacity by 10% by 2021.

图表 8: Market is concentrated - top-five global players contribute 66% of global capacity
Global capacity breakdown (%), 2018



资料来源：公司数据, Gao Hua Securities Research

图表 9: China planned capacity additions

Project	Technology	Guided time	Capacity (tons)	Remarks
Yibin Tianyuan	Chloride	Jan-19	50,000	Commissioned
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Pangang	Chloride	End-2019	60,000	Likely delay
Feiyang	Sulfate	2020	100,000	Likely delay
Xianghai	Chloride	2021	60,000	

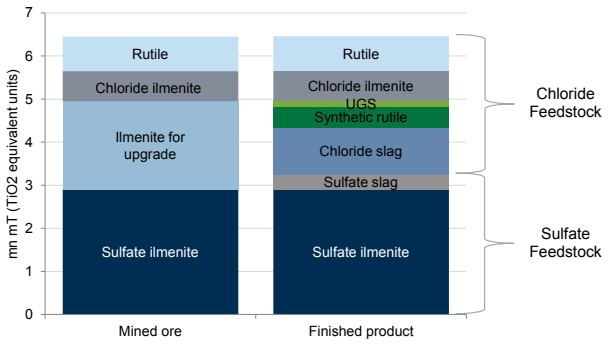
Note: The sulfate TiO2 plants listed above were approved before the ban on new approvals.

资料来源：Baiinfo, Gao Hua Securities Research

Since most of China's titanium reserves are in the form of ilmenite (lower grade and cheaper titanium ores) instead of rutile (higher concentration), China has so far focused

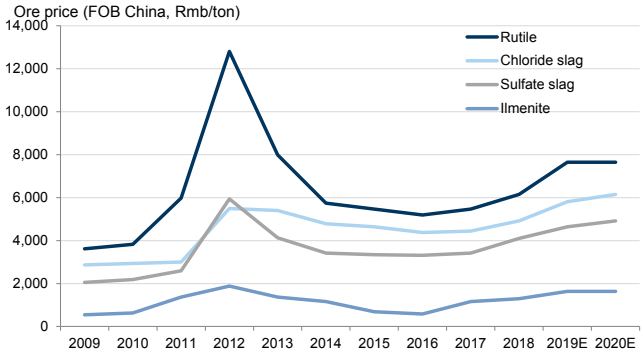
on the TiO2 sulfate production process (it now accounts for c.90% of China's capacity). There are only a few chloride-process TiO2 plants operating in China, with only two (at Lomon Billions and Jinzhou Titanium) running at normal utilisation rates. The others are either in production suspension or running at low utilization.

图表 10: Ore volumes (in TiO2 units) for finished pigment feedstock products



资料来源：公司数据, 高盛全球投资研究

图表 11: Rutile (higher concentration) has the highest price

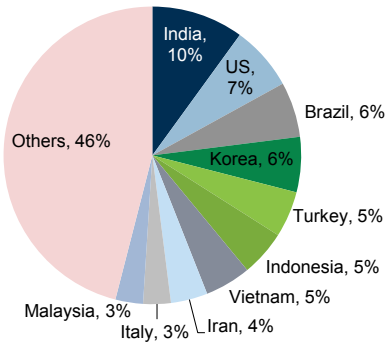


资料来源：VNTR, TZMI

Demand — stable, pending further recovery

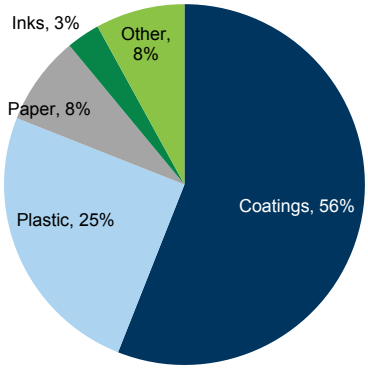
Most TiO2 is used in paints and coating materials, and demand is therefore highly dependent on the property cycle and coating demand. Globally, we assume TiO2 demand will see a c.2% CAGR over 2019-21E, tracking slightly lower than global GDP growth (GSe: 3% in the same period). For China, we assume TiO2 demand for 2019 to be flat yoy, to account for the year-to-date weak TiO2 demand and lower property GFA sold vs. last year. We forecast demand growth could normalize from next year, back to 3%/3% growth in 2020/2021E, c. 3% below our China GDP forecasts.

图表 12: China's TiO2 is exported to a wide range of countries
China TiO2 exports by country (2018)



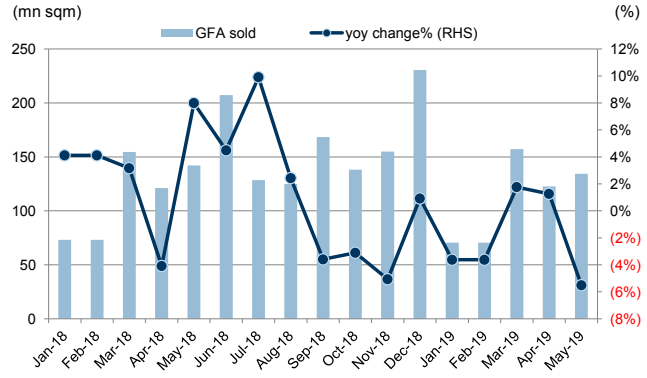
资料来源：Baiinfo

图表 13: China TiO2 production mainly used for coating and plastic applications
China TiO2 downstream applications (as of 2017)



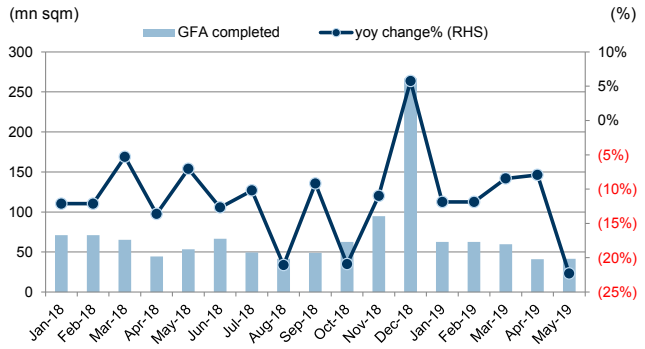
资料来源：公司数据

图表 14: Property segment in China a key driver, given paint demand. Recent monthly GFA sales data still weak
China residential property GFA sold



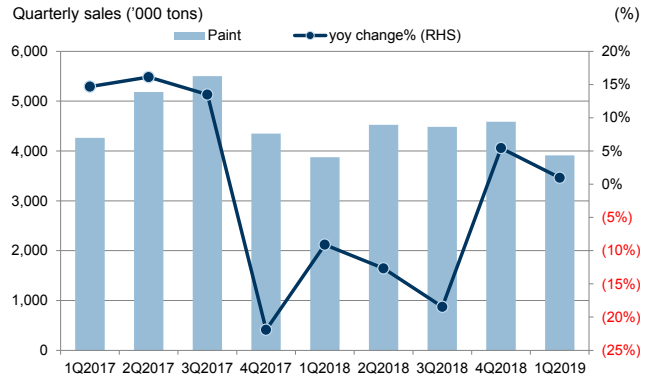
资料来源：国家统计局, 万得

图表 15: Latest China residential GFA completed data was also weak



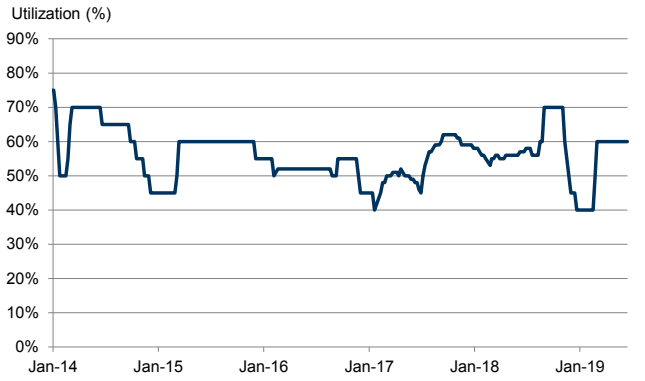
资料来源：国家统计局, 万得

图表 16: Quarterly sales data for paint in China are about flat yoy



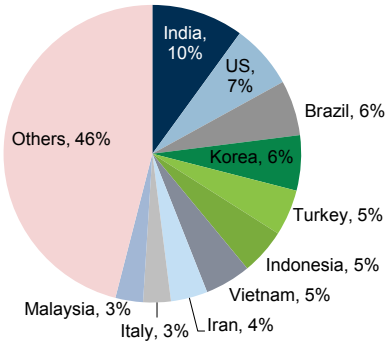
资料来源：国家统计局

图表 17: China paint plants' utilization at historical average levels



资料来源：Oilchem

图表 18: China's TiO2 is exported to a wide range of countries
China TiO2 exports by country (2018)

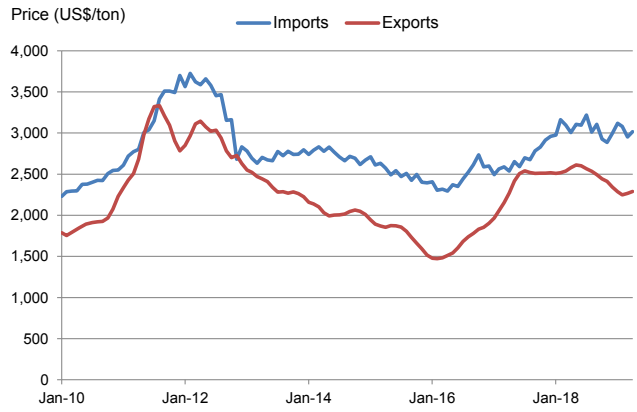


资料来源：Baiinfo

图表 19: China still importing high-end TiO2 but starting to export its excess capacity around the region

资料来源：China Customs, 万得

图表 20: Imported TiO2 is priced higher than domestic products exports



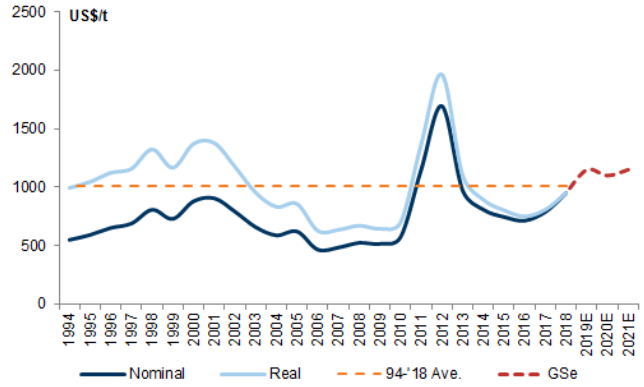
资料来源：China Customs, 万得

Costs — under control

Titanium ore (mainly ilmenite) accounts for about 15% of Lomon’s TiO2’s production costs (the rest being energy costs and other raw materials). There have been no material changes in global titanium ore prices in recent years (at roughly US$150-200/ton). Hence, the cost structure at Lomon remains fairly stable for both chloride and sulfate TiO2. According to Lomon, they are able to control the cost of making sulfate TiO2 at around Rmb12-13k/ton, with chloride TiO2 generally Rmb1-2k more expensive, i.e. at Rmb13k-14k/ton.

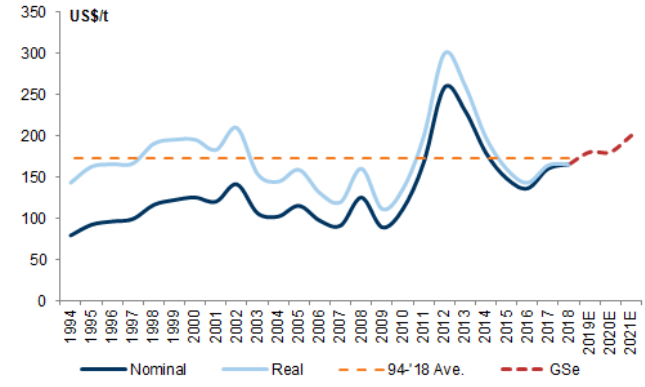
Our Australia resources analyst Paul Young expects prices for titanium ores (both rutile and ilmenite) to go up modestly in 2020/2021E. Rutile refers to high-concentration titanium ores (95-97%), feedstock for chloride TiO2 plants. Ilmenite has a low concentration of TiO2 (50-60%), and is feedstock for sulfate TiO2 plants. Lomon mainly imports chloride slag for the chloride TiO2 unit if there are insufficient supplies domestically in China. Paul Young forecasts a gradual increase in ilmenite prices, at US$180/180/200/ton for 2019/2020/2021E.

图表 21: We forecast a modest increase in rutile prices
Historic rutile prices (FOB Australia) and GSe forecasts



资料来源：TZMI, Asian Metal and data compiled by Goldman Sachs Global Investment Research

图表 22: Similar trend for chloride ilmenite prices
Historic chloride Ilmenite prices (FOB Australia) and GSe forecasts



资料来源：TZMI, Asian Metal and data compiled by Goldman Sachs Global Investment Research

Prices — China outlook remains challenging in near term

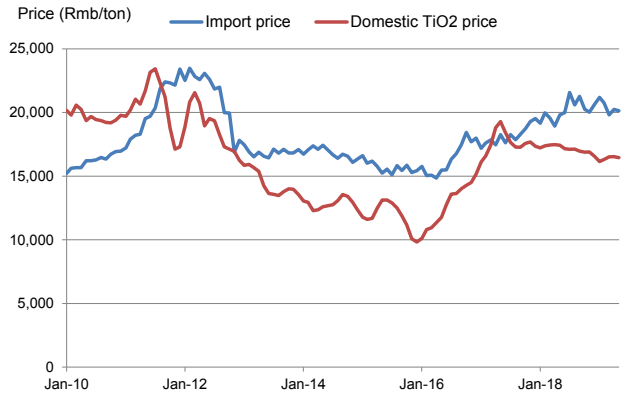
China’s domestic TiO2 prices have fallen by 8% year-to-date, from c. Rmb17,000/ton at the start of the year to c. Rmb15,300/ton now. There was some demand recovery in March, but sentiment shifted quickly and inventory re-stocking appeared to be temporary only. The weak demand in 2Q (consistent with the broader economic slowdown and property completions) caused China TiO2 prices to fall.

We expect the 2H19 outlook to remain challenging given additional supply from new plants and still-sluggish demand growth. On the supply side, we will see new TiO2 supply coming from Lomon Billions’ new 200kt chloride unit, which has started to ramp up production (and will account for c. 80kt incremental supply in 2019 based on the company’s guidance of c.40% utilization). Based on our recent channel checks with the corporates, inventory for TiO2 is slightly higher than normal, and we have not yet seen any signals of demand recovery or a repeat of the restocking that we saw in March this year.

A potential boost in price might occur around September this year due to a seasonal pick-up in demand (with seasonally better economic activities in areas such as property and infrastructure).

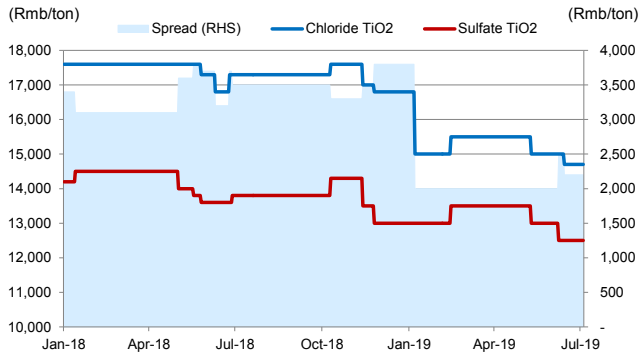
For the rest of this year, we expect volatility in prices, with the slighter weaker supply/demand outlook set against a seasonally stronger September — but overall we expect relatively stable prices over our forecast period.

图表 23: Overseas TiO2 prices are more resilient than China prices



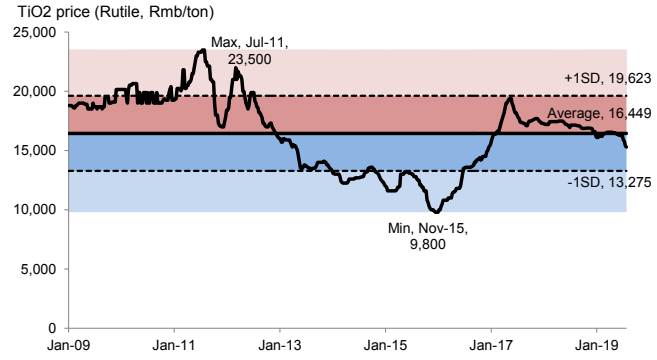
资料来源：China Customs, 万得

图表 24: Chloride TiO2 pricing at a premium vs. Sulfate TiO2



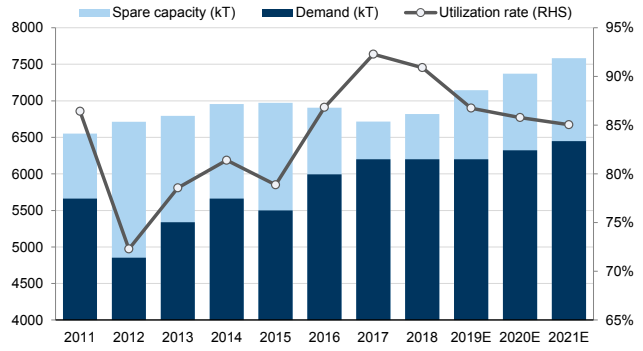
资料来源：Baiinfo

图表 25: Current TiO2 prices are below the long-term average



资料来源：万得

图表 26: Global utilization to decline further but staying above 85% level
Global TiO2 demand and supply



资料来源：TZMI, Gao Hua Securities Research

图表 27: We forecast a gradual pick-up in utilization starting 2019
China TiO2 demand / supply model

China demand / supply											
ktpa	**2011**	**2012**	**2013**	**2014**	**2015**	**2016**	**2017**	**2018**	**2019E**	**2020E**	**2021E**
Capacity	**2,620**	**2,850**	**3,100**	**3,400**	**3,470**	**3,570**	**3,500**	**3,620**	**3,870**	**3,970**	**4,070**
yoy change		230	250	300	70	100	-70	120	250	100	100
yoy change (%)		9%	9%	10%	2%	3%	-2%	3%	7%	3%	3%
Production	**1,812**	**1,890**	**2,050**	**2,466**	**2,320**	**2,597**	**2,870**	**2,954**	**3,059**	**3,169**	**3,256**
yoy change		78	160	416	-146	277	273	84	105	110	87
Utilization (%)	69%	66%	66%	73%	67%	73%	82%	82%	79%	80%	80%
Imports	229	163	194	216	204	200	215	198	188	186	184
Exports	398	385	403	552	538	717	830	908	1,003	1,044	1,059
Net exports	**170**	**222**	**209**	**337**	**334**	**517**	**615**	**711**	**816**	**858**	**876**
Apparent demand	**1,642**	**1,669**	**1,841**	**2,129**	**1,986**	**2,080**	**2,255**	**2,244**	**2,244**	**2,311**	**2,380**
yoy change (%)		2%	10%	16%	-7%	5%	8%	0%	0%	3%	3%

Note: Apparent demand = production - net exports

资料来源：Baiinfo, 公司数据, 万得, 高华证券研究

Lomon’s cost leadership helps boost market share

Lomon is a leading global operator in Ti02, with a high-end client base. Its ASPs are above Chinese peers, given its high-quality output — and with its focus on chloride TiO2 product specialization and differentiation, we see upside for Lomon’s chloride TiO2 ASP over time. After multiple years of consolidation and integration, Lomon has moved down the cost curve compared with peers. This enables it to earn higher margins vs. peers; it is just behind Chemours, the global leader.

Lomon was listed on the Shenzhen Stock Exchange in 2011, and is specialized in the production and sale of TiO2, with over 30 years of TiO2 operational experience — we note TiO2 accounted for 84% of revenue and 89% of gross profit in FY18. It was formed by the merger between Henan Billions Chemical and Sichuan Lomon Titanium Industry in October 2016.

Capacity: Lomon is now the third-largest TiO2 producer globally in terms of capacity, and the top producer in China (21% market share) and Asia overall. It has four main production hubs: Henan Jiaozuo, Sichuan Deyang, Hubei Xiangyang and Yunnan Xinli (Lomon acquired 98.39% of Yunnan Xinli in June 2019). The company now has 865ktpa of TiO2 capacity (540kt sulfate process; 325kt chloride process), representing c. 9% of global capacity.

Lomon owns an ilmenite mine in Sichuan and titanium smelters to supply >50% of the feedstock for its TiO2 production, with the rest coming mainly from other parts of China, Australia and Africa.

图表 28: Lomon’s capacity summary

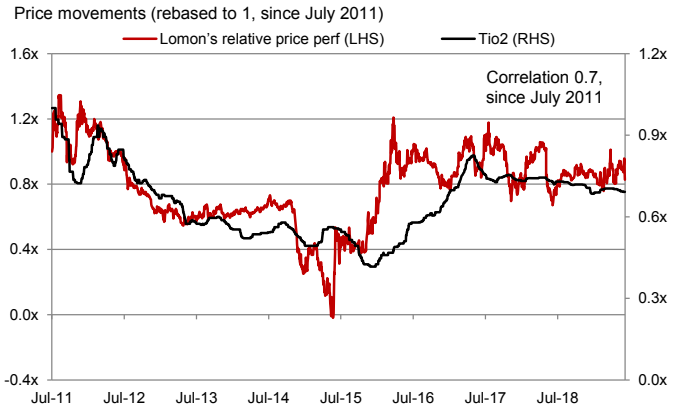
Plant	Province	Product	Capacity (ktpa)	New capacity (ktpa)	Ownership (%)	Comments
Jiaozuo	Henan	Sulfate TiO2	200		100%	
Jiaozuo	Henan	Chloride TiO2	65+200		100%	Phase 2 started production in May 2019
Deyang	Sichuan	Sulfate TiO2	220		100%	
Xiangyang	Hubei	Sulfate TiO2	120		100%	
Lufeng	Yunnan	Chloride TiO2	60		98%	Acquired in June 2019 Suspended now
Lufeng	Yunnan	Titanium Sponge	10		98%	Acquired in June 2019 Suspended now
Jiaozuo	Henan	Titanium Sponge	0	30	100%	
Jiaozuo	Henan	Titanium slag and synthetic rutile	300		100%	
Panzhihua	Sichuan	Ilmenite	800		100%	
Panzhihua	Sichuan	Iron ore concentrate	3,000		100%	
Panzhihua	Sichuan	Ilmenite upgrade project	0	500 (Chloride slag 300)	100%	Under construction
Wuding	Yunnan	Titanium slag	80		98%	Acquired in June 2019
Wuding	Yunnan	Ilmenite mine	250		98%	Acquired in June 2019

资料来源：公司数据, Gao Hua Securities Research

For the newly acquired Yunnan Xinli TiO2 plant, it could take some time (easily over six months) to re-start the production process for a stable supply of chloride TiO2. That

plant has suspended production previously due to economic and technology issues (unstable production and low utilization). Lomon will apply their successful operational experience in Henan phase 1 unit to this Yunnan unit.

图表 29: Lomon’s share price tracks closely with TiO2 prices

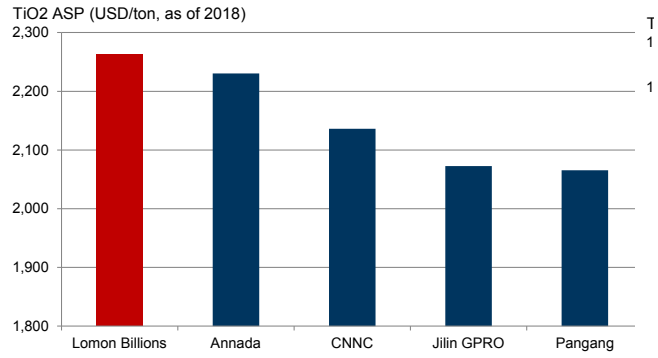


资料来源：Datastream, 万得

Competitive ASP vs. Chinese peers: Lomon has delivered consistent and stable TiO2 supplies, and counts the world’s major paint companies among its clients. For instance, PPG, a leading global paint and coatings company, announced in November 2018 an expanded multi-year TiO2 supply agreement with Lomon to take additional TiO2 volumes (both chloride and sulfate).

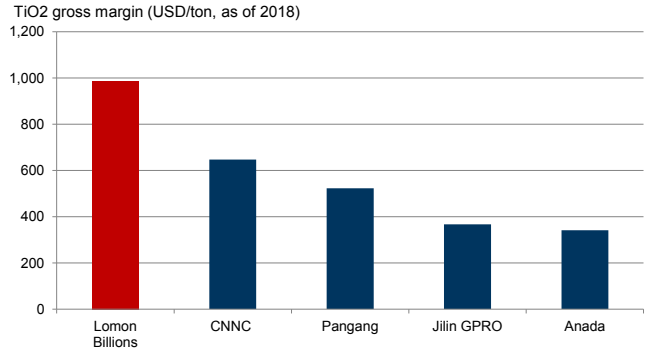
The ASP of Lomon’s TiO2 is generally higher than at Chinese peers. Its chloride TiO2 has an ASP about Rmb1000-2000/ton more than its sulfate TiO2. But those prices are still c.20% below imported prices, given the differentials in quality. We believe as Lomon continues to focus on chloride TiO2 product specialization and differentiation (more products and more customers), there is upside for its chloride TiO2 ASP over time.

图表 30: Higher Lomon ASP compared to local peers, given its higher quality



资料来源：公司数据

图表 31: Lomon can deliver high gross margins, mainly due to costs advantage



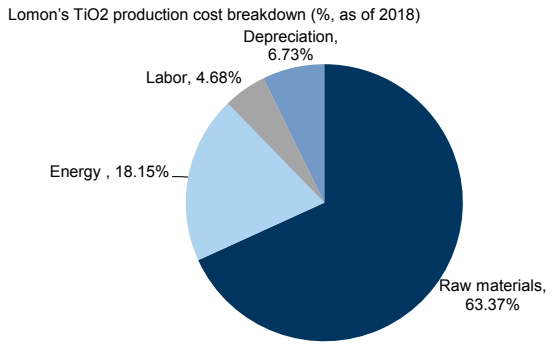
资料来源：公司数据

Staying low on the cost curve: After multiple years of consolidation and integration, Lomon has moved down the cost curve compared with peers. This enables it to earn higher margins vs. peers; just behind Chemours and Tronox, the global TiO2 leader. Based on the reported gross profit margin, Lomon ranks just behind among global

peers. We note that even in a tough TiO2 cycle e.g. over 2013-14, Lomon Billions (pre-merger) still achieved gross margins of about 22%.

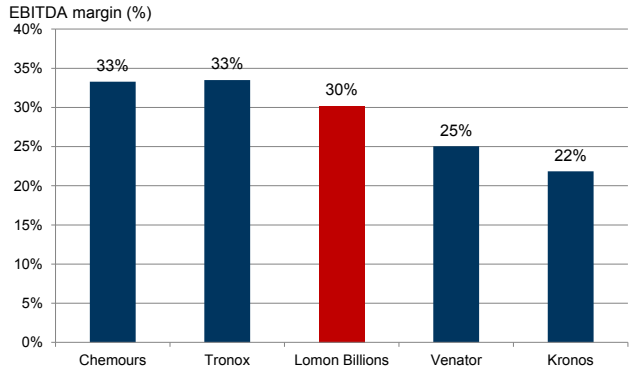
We attribute its better cost structure to: 1) better plant integration through recycling of by-products; 2) scale benefits vs. smaller Chinese sulfate producers; and 3) supply of titanium from its own mines (at 50%). For instance, the recycled waste acid produced from the sulfate TiO2 production process can be resold to neighboring plants (other competitors might need to pay for firms to handle their waste acid). There are some costs that Lomon find difficult to manage down, including energy costs such as electricity, natural gas and steam. These account for about 18% of its total TiO2 production costs.

图表 32: Raw materials the largest production cost of TiO2
TiO2 production cost breakdown, 2018



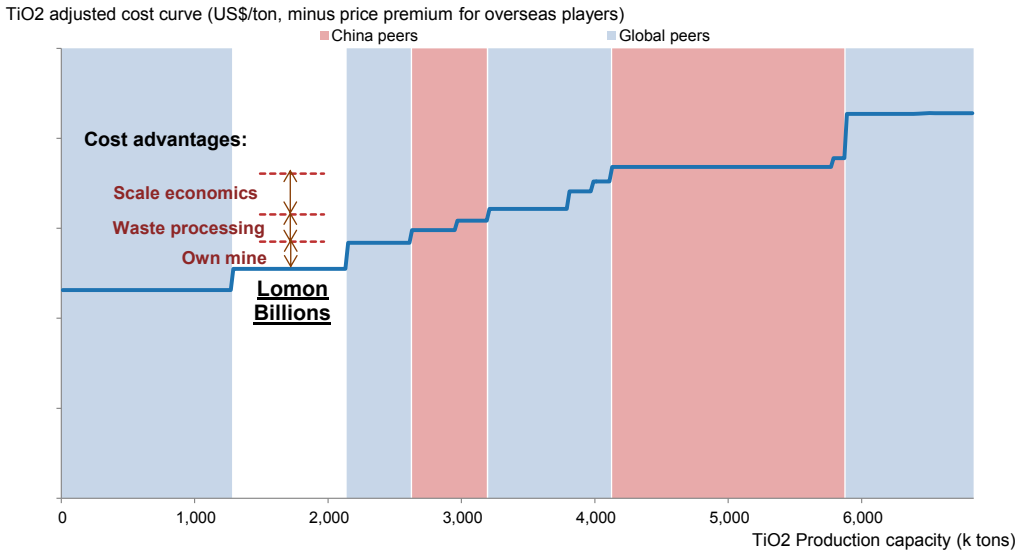
资料来源：Baiinfo

图表 33: Lomon’s TiO2 EBITDA margin (2018) comes third vs. global peers



资料来源：公司数据

图表 34: Lomon Billions is at the low end of the cost curve
TiO2 adjusted cost curve, latest



资料来源：公司数据, Gao Hua Securities Research.

Growth potential through consolidation and integration

Lomon is taking market share, given its low cost base. It is growing its own capacity, and also in the market for consolidation opportunities. It is also looking to own more of its feedstock, while also diversifying its applications.

Organic growth to gain market share

Lomon has delivered strong operational performance at its phase 1 Henan chloride TiO2 plant (running at c.100% utilization in 2017/2018). The chloride pigments have earned a good reputation, according to the company, among global leading paint and coating customers including PPG and Nippon Paint.

Lomon commissioned the phase 2 chloride plant (200ktpa) in May 2019 and targets to ramp up utilization in 2019/2020 (achieving 80kt production in 2019). Lomon's success in developing and operating chloride TiO2 technology (not new to the global players) helps it gain market share and first-mover advantage in China.

This could accelerate the phase-out of the China sub-scale sulfate TiO2 plants that were built over 10 years ago (some are already at their break-even level due to scale and cost constraints). According to our channel checks with the local TiO2 suppliers, there are companies interested in exiting the market due to the more challenging competitive environment and stricter environmental regulations.

Inorganic growth for market consolidation

Lomon has mentioned their interest in looking for acquisition targets, given that some existing TiO2 producers are interested in exiting the market. On the chloride side, Lomon has already completed the acquisition of Yunnan Xinli in June this year, adding 60kt of chloride TiO2 capacity to its asset portfolio. The company is also looking at opportunities globally. On the sulfate side, Lomon mentioned that it could be difficult to acquire existing players unless there is high certainty of being able to run the plant without risks of being shut down. For instance, emissions have to comply with the solid waste and waste acid disposal regulations.

A lot to achieve in 2020

In order to achieve its production targets in line with guidance, Lomon needs to ramp up its new Henan phase 2 200kt chloride TiO2 unit and the acquired Yunnan 60kt chloride TiO2 unit in 2H19 and 1H20. The company is also planning to debottleneck the existing Henan phase 1 60kt chloride TiO2 unit to 100kt and build new production sites totalling capacity of 200kt of chloride TiO2. They have assessed the coastal areas for their new production sites but found it still more economical to be close to the feedstock sources instead. As such, if they were to expand, it would likely to be in Sichuan or Yunnan areas, where most of China's titanium ore is located.

Owning more of its feedstock

Lomon owns some titanium ore assets in Sichuan, with annual production of 800ktpa. The company has been actively looking to buy titanium ore assets globally to provide feedstock for its TiO2 plants. Lomon is focused on its feedstock bottlenecks (most China resources are low-grade ilmenite) by converting ilmenite to titanium slag / synthetic rutile. Having its own mines and converters can minimize feedstock cost volatility and expand gross margin by about Rmb1000-2000/ton. Lomon targets to commission its new 30ktpa ilmenite-to-titanium-slag converter in 2021E.

Diversifying applications

We think Lomon’ s expansion into titanium sponge and titanium alloy is a rational move, but not an easy one (announced in May 2019). The move looks rational because it helps diversify the downstream applications to offer more flexibility in the production planning process. However, the titanium alloy market (medium to low end) is full of titanium mine players, and margins are low.

We think the market for high-end titanium alloy (e.g. used in aerospace industries) is where the opportunities / margins are — but this also presents further difficulties for new entrants, due to the need for R&D and lengthy end-market verification processes. It is likely a longer-term revenue growth driver for Lomon, in our view.

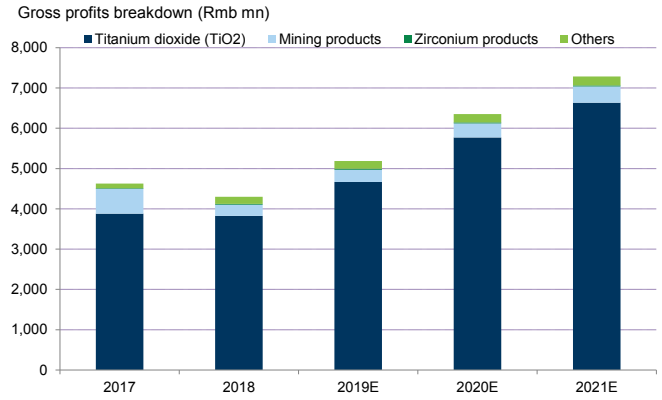
Financials and valuations

Income statement

Growth: We forecast Lomon will post revenue and EBITDA CAGRs of 18% and 20%, respectively, during 2019-2021E, mainly driven by the 20% sales volume CAGR after commissioning the new TiO2 units.

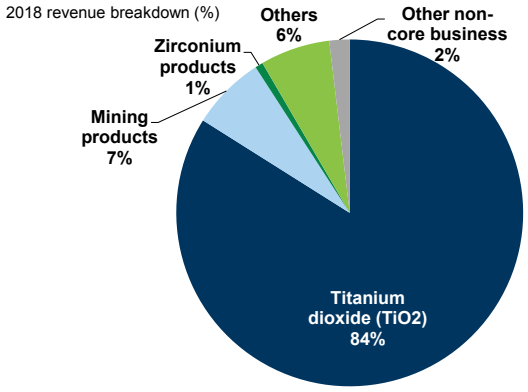
Margins: We expect the TiO2 market to be largely balanced, with utilization improving slightly in 2020E and 2021E (based on the China TiO2 supply / demand outlook). Hence, we forecast the company should maintain its EBIT margin at c.30% during 2019-2021E.

图表 35: We expect Lomon’s earnings to grow along with its production



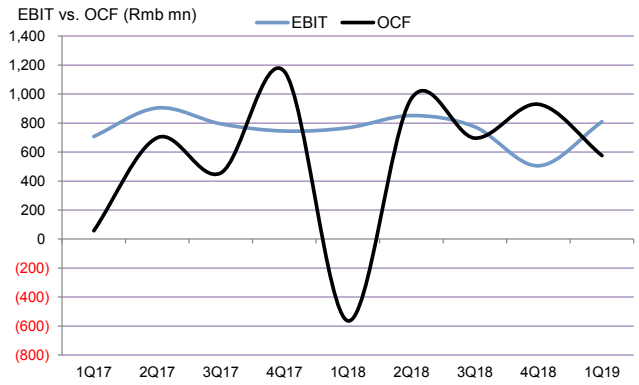
资料来源：公司数据, 高华证券研究

图表 36: TiO2 contributes a majority of Lomon’s revenue



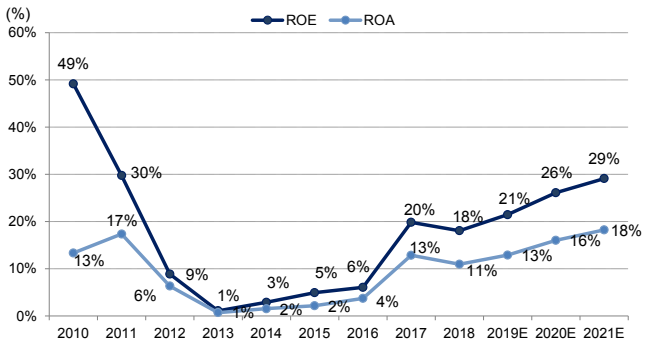
资料来源：公司数据, 高华证券研究

图表 37: Generally stable quarterly EBIT trend; OCF is more volatile, but no clear trend of seasonality



资料来源：公司数据, Gao Hua Securities Research

图表 38: We forecast Lomon’s return profile will further improve



资料来源：公司数据, Gao Hua Securities Research.

Balance sheet

Gearing: Lomon Billions has a solid balance sheet, with what we see as healthy leverage (c. 20% net debt to equity). We forecast a gradual decline in gearing as the cash returns start to improve and capex stabilizes at Rmb1bn pa in 2020/2021E.

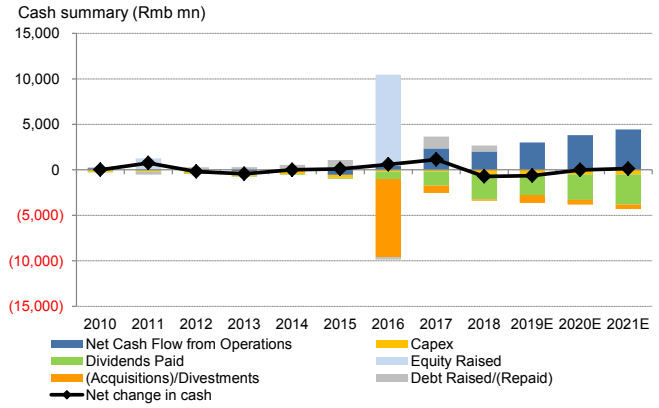
ROE: We expect a gradual pick-up in ROE to factor in the commissioning of new projects in 2019 and a generally higher utilisation for TiO2 plants.

Cashflow statement

Capex: We forecast Lomon’s capex at Rmb1.5bn in 2019E (to include the acquisition of the Yunnan chloride TiO2 business in June) and then to stay at Rmb1bn pa during 2020-21E to fund new chloride TiO2 plants.

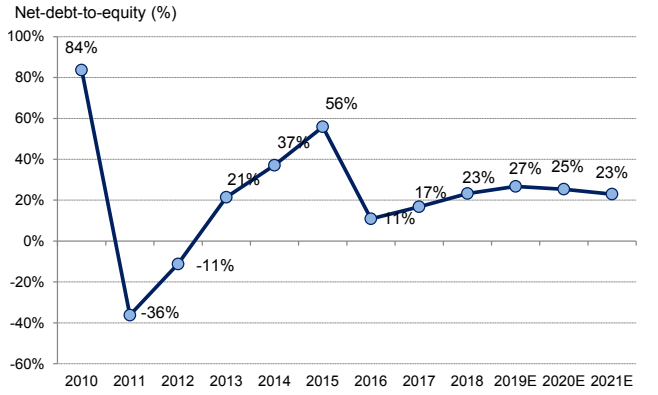
Dividend: We forecast Lomon’s strong cashflow profile and balance sheet should be supportive for its c. 80% dividend payout, as per guidance. This gives yields much higher than most firms in the chemicals space. We also think the high payout is a function of the difficulties faced by the industry in getting new spending plans approved, considering the stringent environment regulations.

图表 39: Cashflow generated is enough to fund dividends and capex



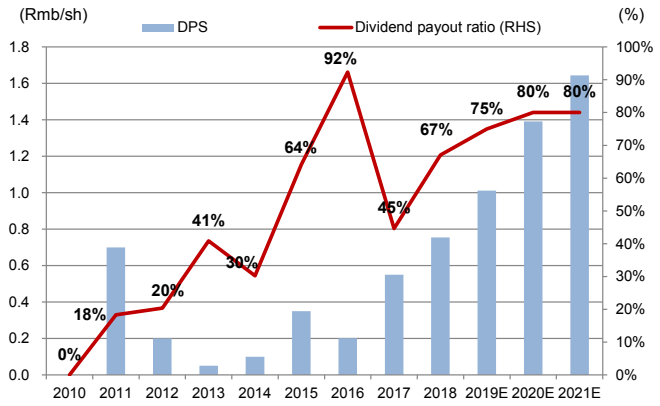
资料来源：公司数据, Gao Hua Securities Research

图表 40: Healthy leverage



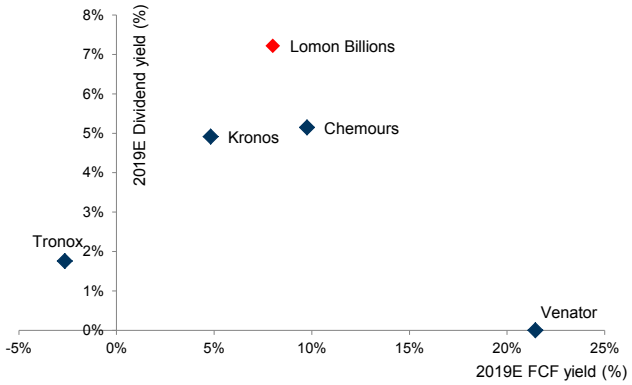
资料来源：公司数据, 高华证券研究

图表 41: Generous dividend payouts



资料来源：公司数据, 高华证券研究

图表 42: Competitive FCF and dividend yields



Note: Tronox and Kronos numbers are based on Bloomberg consensus

资料来源：高盛全球投资研究, 高华证券研究, 彭博

图表 43: Lomon Billions: summary financials

Profit model (Rmb mn)	12/18	12/19E	12/20E	12/21E
Total revenue	10,440.6	12,293.9	14,814.1	16,937.7
Cost of goods sold	(5,235.3)	(6,121.1)	(7,368.8)	(8,499.0)
SG&A	(1,257.6)	(1,512.2)	(1,644.4)	(1,744.6)
R&D	--	--	--	--
Other operating profit/(expense)	(146.4)	(172.4)	(185.5)	(186.7)
EBITDA	3,801.2	4,488.3	5,615.4	6,507.4
Depreciation & amortization	(903.7)	(985.5)	(1,091.7)	(1,151.6)
EBIT	2,897.5	3,502.8	4,523.7	5,355.8
Interest income	122.9	67.4	41.7	41.5
Interest expense	(257.9)	(240.2)	(240.2)	(240.2)
Income/(loss) from uncons. subs.	1.6	1.2	1.2	1.2
Others	(48.2)	0.0	0.0	0.0
Pretax profits	2,715.9	3,331.1	4,326.4	5,158.3
Income tax	(395.6)	(549.4)	(756.9)	(954.1)
Minorities	(34.5)	(41.4)	(53.1)	(62.5)
Net income pre-preferred dividends	2,285.7	2,740.3	3,516.4	4,141.7
Preferred dividends	--	--	--	--
Net income (pre-exceptionals)	2,285.7	2,740.3	3,516.4	4,141.7
Post-tax exceptionals	--	--	--	--
Net income	2,285.7	2,740.3	3,516.4	4,141.7
EPS (basic, pre-except) (Rmb)	1.12	1.35	1.73	2.04
EPS (basic, post-except) (Rmb)	1.12	1.35	1.73	2.04
EPS (diluted, post-except) (Rmb)	1.12	1.35	1.73	2.04
DPS (Rmb)	0.75	1.01	1.38	1.63
Dividend payout ratio (%)	67.0	75.0	80.0	80.0
Free cash flow yield (%)	5.1	8.0	11.5	13.7

Growth & margins (%)	12/18	12/19E	12/20E	12/21E
Sales growth	1.8	17.8	20.5	14.3
EBITDA growth	(5.8)	18.1	25.1	15.9
EBIT growth	(8.0)	20.9	29.1	18.4
Net income growth	(8.7)	19.9	28.3	17.8
EPS growth	(8.7)	19.9	28.3	17.8
Gross margin	49.9	50.2	50.3	49.8
EBITDA margin	36.4	36.5	37.9	38.4
EBIT margin	27.8	28.5	30.5	31.6

Cash flow statement (Rmb mn)	12/18	12/19E	12/20E	12/21E
Net income pre-preferred dividends	2,285.7	2,740.3	3,516.4	4,141.7
D&A add-back	903.7	985.5	1,091.7	1,151.6
Minorities interests add-back	34.5	41.4	53.1	62.5
Net (inc)/dec working capital	(1,514.2)	(741.3)	(826.8)	(883.2)
Other operating cash flow	321.0	(27.9)	(26.6)	(25.3)
Cash flow from operations	2,030.8	2,997.9	3,807.8	4,447.3
Capital expenditures	(454.8)	(700.0)	(500.0)	(500.0)
Acquisitions	(140.4)	(883.4)	(500.0)	(500.0)
Divestitures	2.8	--	--	--
Others	--	--	--	--
Cash flow from investments	(592.4)	(1,583.4)	(1,000.0)	(1,000.0)
Dividends paid (common & pref)	(2,806.5)	(2,055.2)	(2,813.1)	(3,313.4)
Inc/(dec) in debt	277.4	--	--	--
Common stock issuance (repurchase)	4.5	--	--	--
Other financing cash flows	363.5	--	--	--
Cash flow from financing	(2,161.1)	(2,055.2)	(2,813.1)	(3,313.4)
Total cash flow	(722.7)	(640.7)	(5.3)	133.9

Balance sheet (Rmb mn)	12/18	12/19E	12/20E	12/21E
Cash & equivalents	1,684.4	1,043.7	1,038.3	1,172.3
Accounts receivable	1,812.3	2,134.0	2,571.5	2,940.1
Inventory	1,947.7	2,277.3	2,741.5	3,161.9
Other current assets	1,023.1	1,023.1	1,023.1	1,023.1
Total current assets	6,467.5	6,478.1	7,374.4	8,297.4
Net PP&E	7,256.8	7,984.9	8,023.3	8,001.9
Net intangibles	6,232.5	6,102.4	5,972.2	5,842.0
Total investments	63.8	65.0	66.1	67.3
Other long-term assets	903.0	903.0	903.0	903.0
Total assets	20,923.7	21,533.3	22,339.1	23,111.7
Accounts payable	2,437.9	2,347.8	2,422.6	2,328.5
Short-term debt	4,211.4	4,211.4	4,211.4	4,211.4
Other current liabilities	697.9	697.9	697.9	697.9
Total current liabilities	7,347.1	7,257.1	7,331.9	7,237.7
Long-term debt	407.8	407.8	407.8	407.8
Other long-term liabilities	534.7	508.0	482.6	458.5
Total long-term liabilities	942.6	915.8	890.4	866.3
Total liabilities	8,289.7	8,172.9	8,222.3	8,104.0
Preferred shares	--	--	--	--
Total common equity	12,422.9	13,108.0	13,811.3	14,639.6
Minority interest	211.1	252.5	305.6	368.1
Total liabilities & equity	20,923.7	21,533.3	22,339.1	23,111.7
BVPS (Rmb)	6.11	6.45	6.80	7.20

Note: Last actual year may include reported and estimated data.

Source: Company data, Goldman Sachs Research estimates.

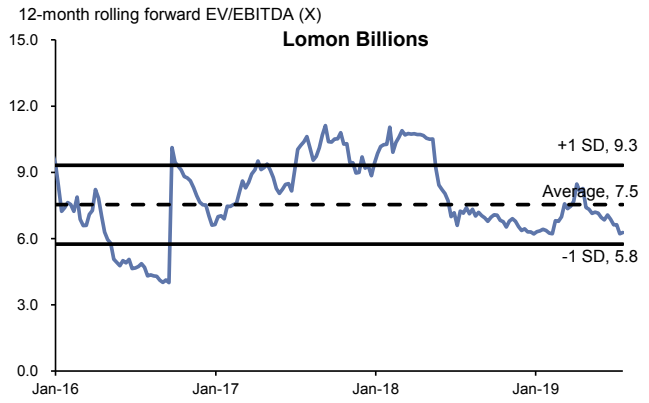
Valuations

Our 12-month price target of Rmb19.0 is based on 7.5X forward EV/EBITDA (applied to a simple average of 2020E/21E EBITDA), discounted back by one year at 10% (our estimate of Lomon’s WACC). We use EV/EBITDA as our primary valuation methodology as we think it is a better way to value the cash-generating ability for established chemicals companies, consistent with our global and regional methodology.

Our target multiple of 7.5X is consistent with the average EV/EBITDA since 2016, the year of the merger between Lomon and Billions. We apply the average multiple as we note the current TiO2 price is at the median level since 2016.

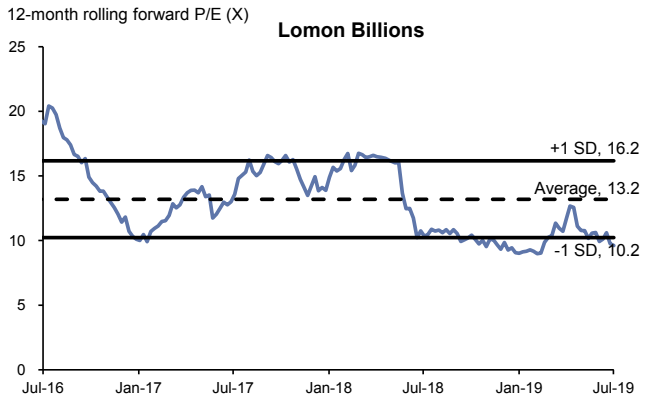
The stock is trading below average EV/EBITDA, P/E and P/B levels since 2016, in our view partly because the market lacks confidence Lomon can successfully ramp up their new chloride TiO2 capacity on time. There are also concerns around the property market recovery signals in recent months based on GFA sold data points.

图表 44: Lomon is trading below the historical average EV/EBITDA



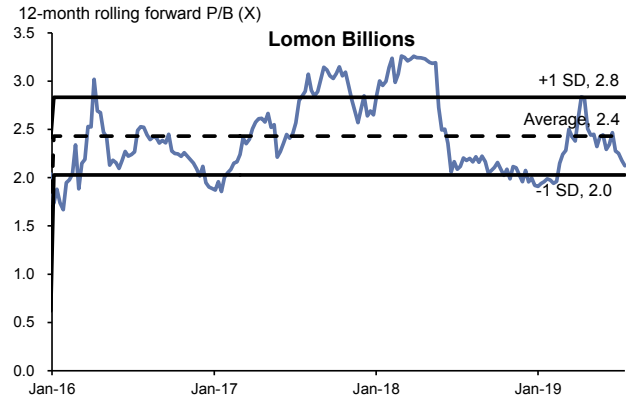
资料来源：公司数据, Datastream, Gao Hua Securities Research

图表 45: Lomon is trading below the historical average P/E



资料来源：公司数据, Datastream, 高华证券研究

图表 46: Lomon is trading below the historical average P/B



资料来源：公司数据, Datastream, Gao Hua Securities Research

图表 47: Lomon’s valuation summary

Valuation

	2019E	2020E	2021E
EBITDA (Rmb mn)	4,488	5,615	6,507
Blended 20-21E EBITDA		6,061	
Target EV/EBITDA multiple (x)		**7.5**	
Implied EV (Nominal)		45,460	
Implied EV (Discounted)		41,328	
Net debt / (cash) (as of end-2018)		2,935	
Minority interest (as of end-2018)		211	
Equity value (Rmb mn)		38,604	
Number of shares (mn)		2,032	
Target price (Rmb/sh)		**19.00**	

资料来源：公司数据, 高华证券研究

图表 48: Lomon’s local and global peers comparison

Company	Ticker	Rating	Price 1-Aug-2019		12-month target price	Market cap (US$ bn)	Avg. daily trading vol (3-m, US$mn)	EPS yoy change (%)		P/E (X)			EV/EBITDA (X)			P/B (X)	Net-debt-to-equity (%)	FCF yield (%)			Dividend yield (%)		
								2019E	2020E	2019E	2020E	2021E	2019E	2020E	2021E	2019E	2019E	2019E	2020E	2021E	2019E	2020E	2021E
China Chemical																							
Lomon Billions	002601.SZ	Buy	CNY	14.02	19.00	4.1	20	20	28	10	8	7	7.2	5.8	5.0	2.2	27	8.0	11.5	13.7	7.2	9.9	11.6
Hengli Petrochemical	600346.SS	Buy	CNY	12.27	15.36	12.6	22	131	57	11	7	6	9.0	6.3	4.9	2.6	199	(15.2)	(0.5)	10.4	1.7	2.1	2.6
TongKun Group	601233.SS	Neutral	CNY	13.20	14.80	3.5	39	20	51	9	6	6	5.9	5.1	4.7	1.3	33	3.9	5.8	7.2	1.1	2.4	2.7
Sinopec Shanghai (A)	600688.SS	Neutral	CNY	4.73	4.70	7.4	5	(22)	13	13	11	12	7.3	6.3	6.4	1.6	(32)	5.4	8.5	7.7	4.4	5.0	5.0
Sinopec Shanghai (H)	0338.HK	Neutral	HKD	2.72	3.40	3.8	5	(22)	13	6	6	6	2.8	2.3	2.2	0.8	(32)	10.7	16.7	15.1	8.7	9.9	9.9
Rongsheng Petro Chemical	002493.SZ	Sell	CNY	11.69	10.30	10.7	9	135	82	19	11	8	15.2	6.9	5.9	3.1	196	(33.7)	1.4	2.6	1.3	1.9	2.4
Average (A-share listed)							**17**			**12**	**8**	**7**	**7.9**	**5.5**	**4.9**	**1.9**	**65**	**(3.5)**	**7.2**	**9.4**	**4.1**	**5.2**	**5.7**
Global peers																							
Chemours	CC	Neutral	USD	18.16	26.00	3.1	70	(34)	16	5	4	4	5.1	4.8	4.7	1.9	211	10.4	18.2	21.3	5.5	5.8	5.8
Venator Materials	VNTR	Neutral	USD	3.54	5.50	0.4	4	(71)	47	5	4	3	4.1	3.8	3.5	0.4	59	24.3	(11.4)	0.6	0.0	0.0	0.0
Average							**37**			**5**	**4**	**4**	**4.6**	**4.3**	**4.1**	**1.2**	**135**	**17.3**	**3.4**	**10.9**	**2.7**	**2.9**	**2.9**

资料来源：Datastream, 高盛全球投资研究, Gao Hua Securities Research

Key risk factors

TiO2 prices (-/+): Lower- / higher-than-expected TiO2 prices due to supply / demand dynamics are large risk factors. A key downside risk is weaker-than-expected TiO2 demand (driven mainly by the property cycle). Upside risks would include slower-than-expected ramp of new China TiO2 supplies, and further supply consolidation due to stringent environmental controls.

图表 49: EPS sensitivity to TiO2 prices
3% change in TiO2 price results in c.3% change in EPS

		Lomon Billions EPS		
		2019E	2020E	2021E
TiO2 price (Rmb/ton)	-1000 (-7% change)	1.26	1.62	1.91
	vs. Base case	*-7%*	*-6%*	*-6%*
	-500 (-3% change)	1.30	1.67	1.97
	vs. Base case	*-3%*	*-3%*	*-3%*
	Base case	**1.35**	**1.73**	**2.04**
	+500 (+3% change)	1.39	1.79	2.10
	vs. Base case	*3%*	*3%*	*3%*
	+1000 (+7% change)	1.44	1.84	2.17
	vs. Base case	*7%*	*6%*	*6%*

资料来源：Gao Hua Securities Research

Worse-than-expected utilisation at new chloride plants (-): Lomon’s new chloride capacity additions might face potential delays and production issues, which are very common in China, given that the chloride technology is still relatively new. Lomon’s generally conservative corporate operational management in terms of safety and project planning could mean the ramp-up of capacity additions may be slower than expected.

Insufficient feedstock supplies for chloride TiO2 (-): Chloride TiO2 requires high-concentration titanium ores as feedstock. Lomon is building a new ilmenite-to-titanium-slag conversion unit, to be completed in 2021, that will help supply the required feedstock for its chloride TiO2 plant. Any delay in project commissioning could mean Lomon has to source its feedstock from external suppliers for a longer period.

Regulatory changes (-): The TiO2 production process is highly polluting. For instance, sulfate TiO2 produces a large amount of sulfuric acid, which is converted into solid waste for disposal. Any changes to government policy preferences on new supplies of TiO2 or future supply consolidation (particularly in the sulfate TiO2 segment) will be critical in the demand / supply balance. Based on the recent rounds of government supervisions across provinces on plant emissions, we saw no pull-back in government moves to be more environmentally friendly.

Operational risks (-): The chemicals industry is a high-risk business, handling lots of toxic and explosive materials. There are occasionally accidents / explosions that could lead to plant suspensions or result in compensation payouts. More frequent supervision on Chinese chemicals plants to monitor emissions and safety would also count as potential risks.

Free float increase (-): The company’s core shareholders (introduced back in 2016, post the merger) will see their lock-up period expire on September 20, 2019. The free float (including major shareholders) will increase by about 1,322mn shares, out of a total outstanding of 2,032mn shares. We believe this could be a near-term downside risk unless there are any strategic investors interested in the blocks. There have been no material changes in shareholder structure in the past few years.

Foreign exchange risk (-/+): About 50% of Lomon’s revenue is from TiO2 overseas sales (as of 2018). Similar to total China TiO2 exports, it supplies to a wide range of countries. According to Lomon, any Rmb appreciation / depreciation would be negative/positive to Lomon because it would lower / increase export sales.

M&A score

Across our global coverage, we examine stocks using an M&A framework, considering both qualitative and quantitative factors (which may vary across sectors and regions) to incorporate the potential that certain companies could be acquired. We then assign an M&A rank as a means of scoring companies under our rated coverage from 1 to 3, with 1 representing high (30%-50%) probability of the company becoming an acquisition target, 2 representing medium (15%-30%) probability and 3 representing low (0%-15%) probability. For companies ranked 1 or 2, in line with our standard departmental guidelines we incorporate an M&A component into our target price. An M&A rank of 3 is considered immaterial and therefore does not factor into our price target, and may or may not be discussed in research.

Under our M&A framework for the Asia-Pacific Energy and Chemical sector, we recognize a myriad of factors could influence the probability of a deal, and our regional team see the following as five key common issues:

- Regulation on ownership that prohibits or discourages acquisitions, including by a foreign entity, on grounds of national security.
- Regulatory risks that discourage potential buyers from an acquisition and complicate realization of planned synergy and restructuring upside.
- Management stance in terms of openness to a deal (e.g., being a target of acquisition, management buyout), especially by government appointees.
- Strategic assets that offer the owners a strong competitive advantage due to a high entry barrier (e.g., monopoly) or a low-cost structure.
- Industry attractiveness based on a growing profit pool as a function of asset expansion, revenue growth, or profitability improvement.

Within this context, we have ranked Lomon Billions a “3” and weight our M&A value by 0% (reflecting the probability implied by this ranking) within our price target methodology.

图表 50: Summary of M&A score

Company	Ticker	M&A Rank	Regulation on Ownership	Regulatory Risks	Management Stance	Strategic Assets	Industry Attractiveness
Lomon Billions	002601.SZ	3	2	3	3	3	2

资料来源：高华证券研究

Appendix

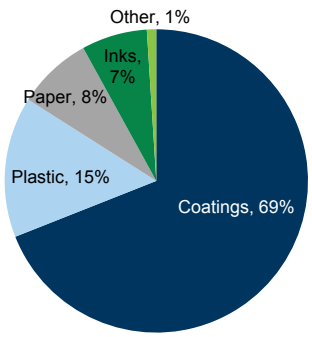
What is TiO2?

Titanium Dioxide (TiO2) is a white pigment widely used in paints, plastics, paper making, printing inks, etc. The global TiO2 industry has been developed for more than a hundred years, while China’s TiO2 industry began in 1956. Pigment-grade TiO2 production only started in China in the 1980s and 1990s. China now plays an important role in the global TiO2 market (at c. 50% of global capacity).

There are two main production technologies for TiO2: sulfate process (mainly in China) and chloride process (mainly outside China). The sulfate process uses ilmenite (a common iron-titanium oxide) as the major feedstock, plus sulfuric acid (converted from sulfur). The chloride process uses rutile or purer ore (higher titanium concentration, at 80% or above) as the major feedstock, plus chlorine gas. Rutile TiO2 has better weatherability and opacity, making it more suitable for outdoor coatings, plastics, advanced paper coatings, etc. The biggest customers are the paint and coating companies, such as PPG, Nippon Paint, and Akzo Nobel.

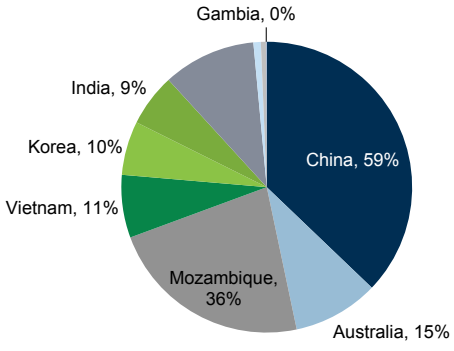
Since most of China’s titanium reserves are in the form of ilmenite (lower grade and cheaper titanium ores) instead of rutile (higher concentration), China has so far focused on the TiO2 sulfate production process (it now accounts for c.90% of China’s capacity). There are only a few chloride-process TiO2 plants operating in China, with only two (Lomon Billions and Jinzhou Titanium) running at normal operating rates. The others are either in production suspension or running at low utilization.

图表 51: Coatings (mainly used in paints for interior and exterior walls) are the largest consumer
Global TiO2 demand breakdown, 2018



资料来源：Company data.

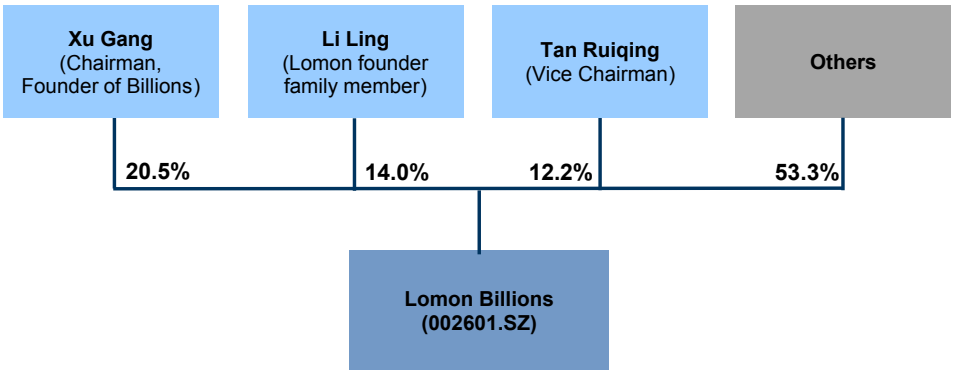
图表 52: Most of China’s imported titanium ores are sourced from Mozambique and Australia
Source of titanium ores, 2018



资料来源：China Customs

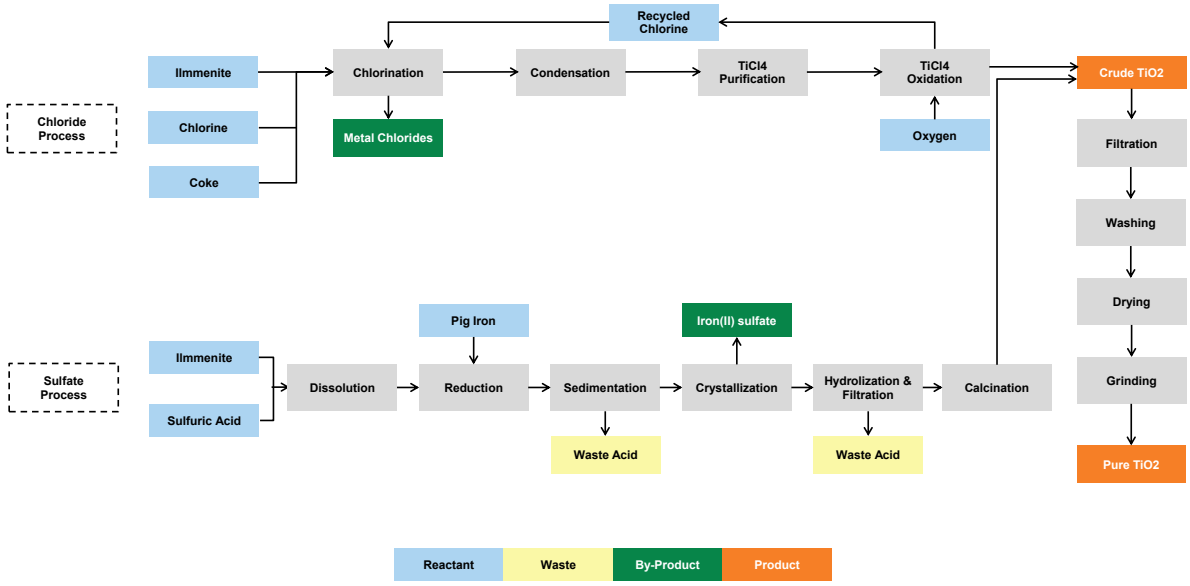
Company ownership

图表 53: Ownership structure



资料来源：公司数据

图表 54: TiO2 flow chart



资料来源：公司数据, 高华证券研究

高华证券感谢高盛分析师Mark Wiseman, CFA和乔雅虹在本报告中的贡献。

信息披露附录

申明

本人，朱金巧，在此申明，本报告所表述的所有观点准确反映了本人对上述公司或其证券的个人看法。此外，本人薪金的任何部分不曾与，不与，也将不会与本报告中的具体推荐意见或观点直接或间接相关。

投资摘要

投资摘要部分通过将一只股票的主要指标与其行业和市场相比较来评价该股的投资环境。所描述的四个主要指标包括增长、回报、估值倍数和波动性。增长、回报和估值倍数都是运用数种方法综合计算而成，以确定该股在地区研究行业内所处的百分位排名。

每项指标的准确计算方式可能随着财务年度、行业和所属地区的不同而有所变化，但标准方法如下：

增长是下一年预测与当前年度预测的综合比较，如每股盈利、EBITDA 和收入等。 回报是各项资本回报指标一年预测的加总，如CROCI、平均运用资本回报率和净资产回报率。 估值倍数根据一年预期估值比率综合计算，如市盈率、股息收益率、EV/FCF、EV/EBITDA、EV/DACF、市净率。 波动性根据12个月的历史波动性计算并经股息调整。

并购评分

在我们的全球覆盖范围中，我们使用并购框架来分析股票，综合考虑定性和定量因素（各行业和地区可能会有所不同）以计入某些公司被收购的可能性。然后我们按照从1到3对公司进行并购评分，其中1分代表公司成为并购标的的概率较高(30%-50%)，2分代表概率为中等(15%-30%)，3分代表概率较低(0%-15%)。对于评分为1或2的公司，我们按照研究部统一标准将并购因素体现在我们的目标价格当中。并购评分为3被认为意义不大，因此不予体现在我们的目标价格当中，分析师在研究报告中可以予以讨论或不予讨论。

Quantum

Quantum是提供具体财务报表数据历史、预测和比率的高盛专有数据库，它可以用于对单一公司的深入分析，或在不同行业和市场的公司之间进行比较。

GS SUSTAIN

GS SUSTAIN是一项侧重于通过发现优质行业领先企业而实现长期超额收益的全球投资策略。GS SUSTAIN 50关注名单列出了我们认为凭借出色的资本回报、具有可持续性的竞争优势和对ESG（环境、社会和企业治理）风险的有效管理而有望在长期内相对于全球同业表现出色的行业领军企业。候选企业主要基于对企业在这三方面表现的综合量化分析筛选而出。

相关的股票研究范围

朱金巧：亚洲化工行业。

亚洲化工行业：Daoming Optics & Chemical、Hengli Petrochemical Co.、Lomon Billions Group、Rongsheng Petrochemical Co.、Sinopec Shanghai Petrochemical (A)、Sinopec Shanghai Petrochemical (H)、Tongkun Group Co.、Wanhua Chemical Group、Weihai Guangwei、Yantai Tayho、Zhejiang Satellite。

信息披露

与公司有关的法定披露

以下信息披露了高盛高华证券有限责任公司（“高盛高华”）与北京高华证券有限责任公司（“高华证券”）投资研究部所研究的并在本研究报告中提及的公司之间的关系。

没有对下述公司的具体信息披露： Lomon Billions Group (Rmb14.09)

公司评级、研究行业和相关定义

买入、中性、卖出：分析师建议将评为买入或卖出的股票纳入地区投资名单。一只股票在投资名单中评为买入或卖出由其相对于所属研究行业的总体潜在回报决定。任何未获得买入或卖出评级且拥有活跃评级（即不属于暂停评级、暂无评级、暂停研究或没有研究的股票）的股票均被视为中性评级。每个地区投资评估委员会管理着地区强力买入或卖出名单，该名单以总体潜在回报规模和/或实现回报的可能性为主要依据确立各自研究范围内的投资建议。将股票加入或移出此类强力买入或卖出名单并不意味着分析师对这些股票的投资评级发生了改变。

总体潜在回报：代表当前股价低于或高于一定时间范围内预测目标价格的幅度，包括所有已付或预期股息。分析师被要求对研究范围内的所有股票给出目标价格。总体潜在回报、目标价格及相关时间范围在每份加入投资名单或重申维持在投资名单的研究报告中都有注明。

研究行业：每个行业研究的所有股票名单可登陆https://www.gs.com/research/hedge.html通过主要分析师、股票和行业进行查询。

暂无评级(NR)：在高盛于涉及该公司的一项合并交易或战略性交易中担任咨询顾问时并在某些其他情况下，投资评级和目标价格已经根据高盛的政策予以除去。 暂停评级(RS)：由于缺乏足够的基础去确定投资评级或价格目标，或在发表报告方面存在法律、监管或政策的限制，我们已经暂停对这种股票给予投资评级和价格目标。此前对这种股票作出的投资评级和价格目标(如有的话)将不再有效，因此投资者不应依赖该等资料。 暂停研究(CS)：我们已经暂停对该公司的研究。 没有研究(NC)：我们没有对该公司进行研究。 不存在或不适用(NA)：此资料不存在或不适用。 无意义(NM)：此资料无意义，因此不包括在报告内。

一般披露

本报告在中国由高华证券分发。高华证券具备证券投资咨询业务资格。

本研究报告仅供我们的客户使用。除了与高盛相关的披露，本研究报告是基于我们认为可靠的目前已公开的信息，但我们不保证该信息的准确性和完整性，客户也不应该依赖该信息是准确和完整的。报告中的信息、观点、估算和预测均截至报告的发表日，且可能在不事先通知的情况下进行调整。我们会适时地更新我们的研究，但各种规定可能会阻止我们这样做。除了一些定期出版的行业报告之外，绝大多数报告是在分析师认为适当的时候不定期地出版。

高盛高华为高华证券的关联机构，从事投资银行业务。高华证券、高盛高华及它们的关联机构与本报告中涉及的大部分公司保持着投资银行业务和其它业务关系。

我们的销售人员、交易员和其它专业人员可能会向我们的客户及自营交易部提供与本研究报告中的观点截然相反的口头或书面市场评论或交易策略。我们的资产管理部门、自营交易部和投资业务部可能会做出与本报告的建议或表达的意见不一致的投资决策。

本报告中署名的分析师可能已经与包括高华证券销售人员和交易员在内的我们的客户讨论，或在本报告中讨论交易策略，其中提及可能会对本报告讨论的证券市场价格产生短期影响的推动因素或事件，该影响在方向上可能与分析师发布的股票目标价格相反。任何此类交易策略都区别于且不影响分析师对于该股的基本评级，此类评级反映了某只股票相对于报告中描述的研究范围内股票的回报潜力。

高华证券及其关联机构、高级职员、董事和雇员，不包括股票分析师和信贷分析师，将不时地根据适用的法律和法规对本研究报告所涉及的证券或衍生工具持有多头或空头头寸，担任上述证券或衍生工具的交易对手，或买卖上述证券或衍生工具。

在高盛组织的会议上的第三方演讲嘉宾（包括高华证券或高盛其它部门人员）的观点不一定反映全球投资研究部的观点，也并非高华证券或高盛的正式观点。

在任何要约出售股票或征求购买股票要约的行为为非法的地区，本报告不构成该等出售要约或征求购买要约。本报告不构成个人投资建议，也没有考虑到个别客户特殊的投资目标、财务状况或需求。客户应考虑本报告中的任何意见或建议是否符合其特定状况，以及(若有必要)寻求专家的意见，包括税务意见。本报告中提及的投资价格和价值以及这些投资带来的收入可能会波动。过去的表现并不代表未来的表现，未来的回报也无法保证，投资者可能会损失本金。

某些交易，包括牵涉期货、期权和其它衍生工具的交易，有很大的风险，因此并不适合所有投资者。外汇汇率波动有可能对某些投资的价值或价格或来自这一投资的收入产生不良影响。

投资者可以向高华销售代表取得或通过https://www.theocc.com/about/publications/character-risks.jsp和https://www.fiadocumentation.org/fia/regulatory-disclosures_1/fia-uniform-futures-and-options-on-futures-risk-disclosures-booklet-pdf-version-2018取得当前期权和期货的披露文件。对于包含多重期权买卖的期权策略结构产品，例如，期权差价结构产品，其交易成本可能较高。与交易相关的文件将根据要求提供。

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