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HOLD

TP: Rs 650 | ⋎ 13%

JSW STEEL | Metals & Mining | 20 December 2022

Dolvi another growth milestone

- **Successful delivery of 5mtpa Dolvi expansion with operational stability achieved within a year of startup**
- **Next growth milestones include expansion at BPSL (2.25mtpa) and Vijayanagar (7.5mtpa) by FY25**
- **At 6.7x FY24E EV/EBITDA, current valuations limit upside potential; retain HOLD and TP of Rs 650**

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5mtpa Dolvi expansion stabilised: JSTL has once again proved its ability to deliver on growth targets, successfully stabilising the expanded steel capacity at Dolvi within a year from startup in Q3FY22. Management now guides for 8.35-8.40mt of production at the 10mtpa Dolvi plant in FY23. The expansion has met cost efficiency targets, raising PCI usage to 200-205kg/t of steel, pellet consumption to 65-70% of the feed, and waste heat recovery plants to rated capacity. Conversion cost for the expansion is likely to be Rs 2,500-3,000/t lower than existing operations given higher power generation from waste heat recovery and the absence of DRI operations in phase-2.

Dolvi operations are highly competitive: Overcoming space constraints, JSTL has been able to set up one of the most compact 10mtpa plants over 1,400 acres, including a jetty. The Dolvi plant derives its competitiveness from a flexibility to switch between liquid and solid charge with a Conarc facility in phase-1, use of the largest blast furnace in phase-2, backward integrated operations (pellet and coke oven plants), waste heat recovery contributing 50% of power requirements, waterway logistics for raw materials, and access to group downstream facilities in the vicinity.

Eyeing phase-3 expansion: JSTL is considering ramp-up of the Dolvi site by 4mtpa to 14mtpa and is currently working on securing additional land and evaluating technology options (BF vs. DRI).

Aggressive growth policy continues: The Dolvi expansion coupled with integration of BPSL has taken JSTL's capacity from 19mtpa to 27mtpa – in line with its aggressive growth policy. Management is looking to scale up capacity to 37mtpa by FY25, led by expansion at BPSL (2.25mtpa, FY23-FY24) and Vijaynagar (7.5mtpa, FY23-FY25).

Valuations full; maintain HOLD: JSTL is trading at 6.7x FY24E EV/EBITDA, reflecting limited upside from current levels. We retain our HOLD rating with an unchanged TP of Rs 650, based on an FY24E EV/EBITDA multiple of 6x – the highest within the steel sector to reflect the company's aggressive growth policy and in line with the stock's historical trading average of 6.5x/6.9x over the past 5Y/10Y to bake in economic uncertainty.

Key changes

Target	Rating
◀ ▶	◀ ▶

Ticker/Price	JSTL IN/Rs 746
Market cap	US$ 21.9bn
Free float	40%
3M ADV	US$ 16.9mn
52wk high/low	Rs 790/Rs 520
Promoter/FPI/DII	60%/11%/9%

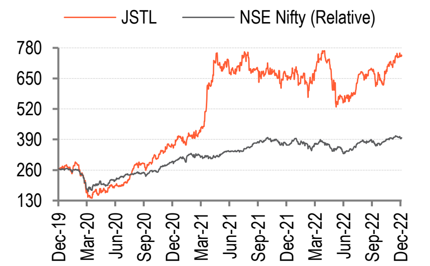
Source: NSE | Price as of 20 Dec 2022

Key financials

Y/E 31 Mar	FY22A	FY23E	FY24E
Total revenue (Rs mn)	1,464	1,604	1,618
EBITDA (Rs mn)	390	227	365
Adj. net profit (Rs mn)	197	74	173
Adj. EPS (Rs)	81.7	30.6	71.5
Consensus EPS (Rs)	81.7	32.0	57.4
Adj. ROAE (%)	35.0	10.5	21.6
Adj. P/E (x)	9.1	24.4	10.4
EV/EBITDA (x)	3.2	5.4	3.3
Adj. EPS growth (%)	149.6	(62.5)	133.7

Source: Company, Bloomberg, BOBCAPS Research

Stock performance



Source: NSE

Dolvi plant visit takeaways

We visited JSTL's Dolvi steel plant in Maharashtra after the company recently stabilised the 5mtpa phase-2 expansion, raising capacity at the plant to 10mtpa. Key takeaways:

Expanded capacity stabilised within a year

After bringing the expanded capacity at Dolvi online in Q3FY22, JSTL has successfully stabilised plant operations.

- Management is now **guiding for 8.35-8.40mt of production in FY23** at the 10mt Dolvi steel plant. While the SMS BOF (steel melting shop with basic oxygen furnace) has ramped up to full utilisation, the hot strip mill (HSM) is still in the final lap. The combined plant can now produce 8.5mtpa of hot rolled coils (HRC) and 1.5mtpa of TMT bars.
- The plant has **achieved the desired cost efficiencies** with a pulverised coal injection (PCI) rate of 200-205kg per tonne of steel, which is close to peak industry usage levels in India, though JSTL aspires to further raise this to 220kg/t. The company has also ramped up the use of pellets to 65-70% of the feed its blast furnace (BF-2), which is significantly above the industry average and limits sinter feed to 30-35% besides avoiding the use of lumps in the burden mix. Waste heat recovery plants– specifically the 30MW top recovery turbine, 175MW using blast furnace gas and 60MW using coke oven gas have reached rated capacities.
- **Conversion cost for the phase-2 expansion is likely to be lower** by Rs 2,500-3,000/t than the existing operations at Dolvi due to higher power generation from waste heat recovery and absence of the 1.5mtpa direct reduced iron (DRI) solid charge used in the Conarc process in phase-1.
- JSTL is now working on **trials of special grades of HRC** to feed into its value-added products such as tinplate, electro steel and advanced high strength steel (AHSS). This could further improve margins at Dolvi.

Dolvi plant is highly competitive

Though the Dolvi plant has space constraints, JSTL has been able to raise capacity from 3.5mtpa to 5mtpa in phase-1 over 2016-17 and further to 10mtpa in phase-2 during FY22 – making Dolvi one of the most compact steel plants set up at a 1,200acre site (with a 200acre jetty).

- **Use of Conarc technology in phase-1** gives the plant the flexibility to switch between a liquid and solid charge, helping the company manage costs against the backdrop of volatile coking coal, iron ore and natural gas prices. Phase-1 has a 3.5mtpa BF and 1.6mtpa DRI plant.
- **Use of a large BF in phase-2** further optimises the cost of operations. BF2 is currently the largest furnace in India by volume.

- **Fully backward-integrated operations** with an in-house pellet plant (4+8mtpa in phase-1+phase-2), coke oven (1+3mtpa), sinter (5.1+5.1mtpa) and waste heat recovery plants help to significantly lower conversion costs.
- More than half of Dolvi's power requirement is met through **in-house waste recovery plants**. The balance is currently sourced from the thermal power plant of group company, JSW Energy. To further lower electricity cost, JSTL is currently working on tying up renewable energy to substitute for thermal power.
- **Use of waterway logistics** for raw material movement helps lower transportation cost. The plant has an all-weather jetty at Dharamtar spread over 200 acres with 28mtpa of cargo handling capacity.
- **Access to group downstream capacity within the region** helps tide over space constraints by removing the need for downstream facilities at the plant itself.
- **Covered sheds for raw material storage at the jetty** protect against the heavy rain that is typical for the region.

Next wave of expansion under evaluation

- JSTL is exploring expansion of Dolvi site capacity from 10mtpa to 14mtpa and is working on options to acquire additional land.
- While the company had chosen the BF route for Dolvi phase-2, it will be evaluating both the BF and DRI process for phase-3, keeping in view the growing focus on carbon emissions and the economics of the two operations.

Phase-1 DRI operations facing cost challenges

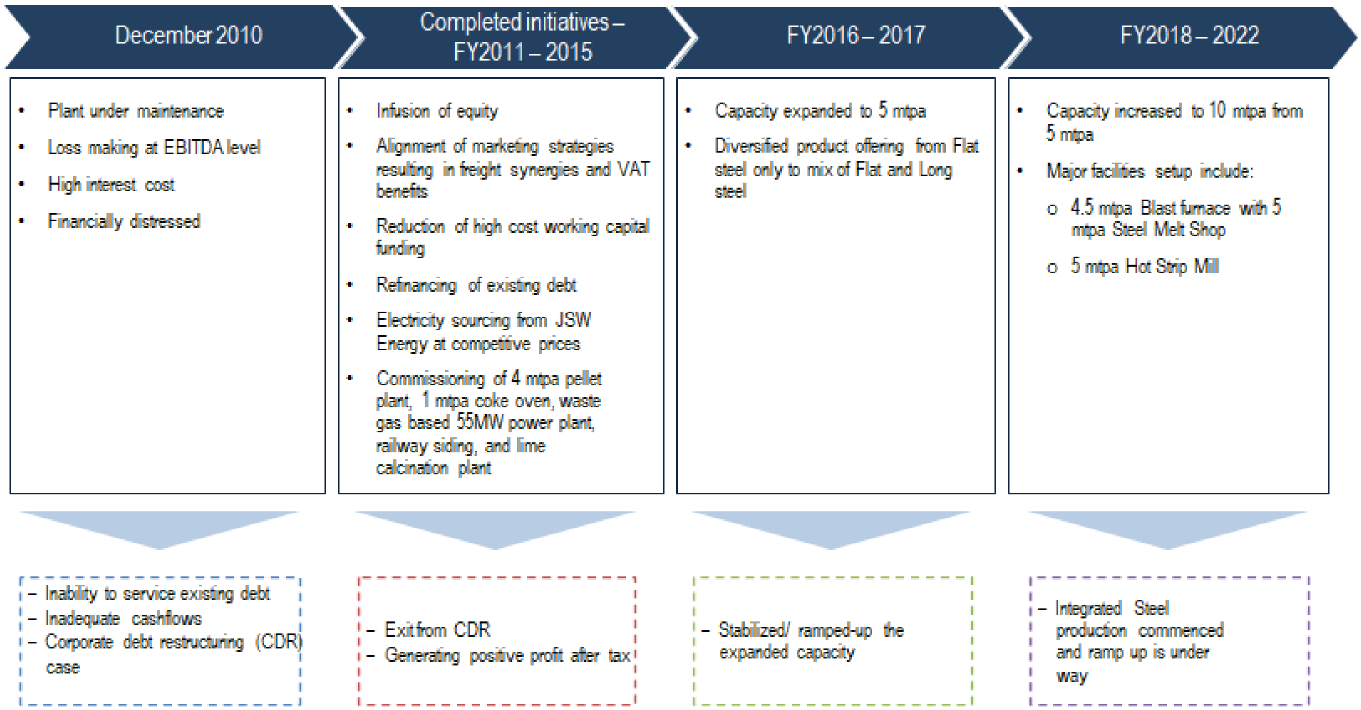
- Operational costs of the phase-1 DRI unit have risen substantially following the sharp jump in natural gas cost to US$ 17-18/MMBtu, and is currently Rs 8,000-9,000/t higher than the cost of production through the BF route where coking coal is available at US$ 275/t. However, DRI still contributes positive EBITDA even at this cost of production.
- With GAIL curtailing natural gas supply at a minimum contractual level, JSTL has stopped operations at its 0.9mtpa DRI plant at Salem and reduced operations to 1.4mtpa at Dolvi vs. 1.6mtpa of capacity.

Digitalisation improving operations and profitability

- JSTL has been using digital technology to improve operations. At Dolvi, the company has improved predictive power to reduce over-injection in the BF, implemented CVML (computer vision machine learning) based production enhancement and enhanced predictive maintenance.
- Under the latest set of initiatives at Dolvi plant, JSTL implemented a billet length measurement system over 2019-20, reduced delays in Conarc operations over 2020-21, brought in a radar-based wireless crane safety mechanism over 2021-22 and is currently implementing automated logistics operations over 2022-23.

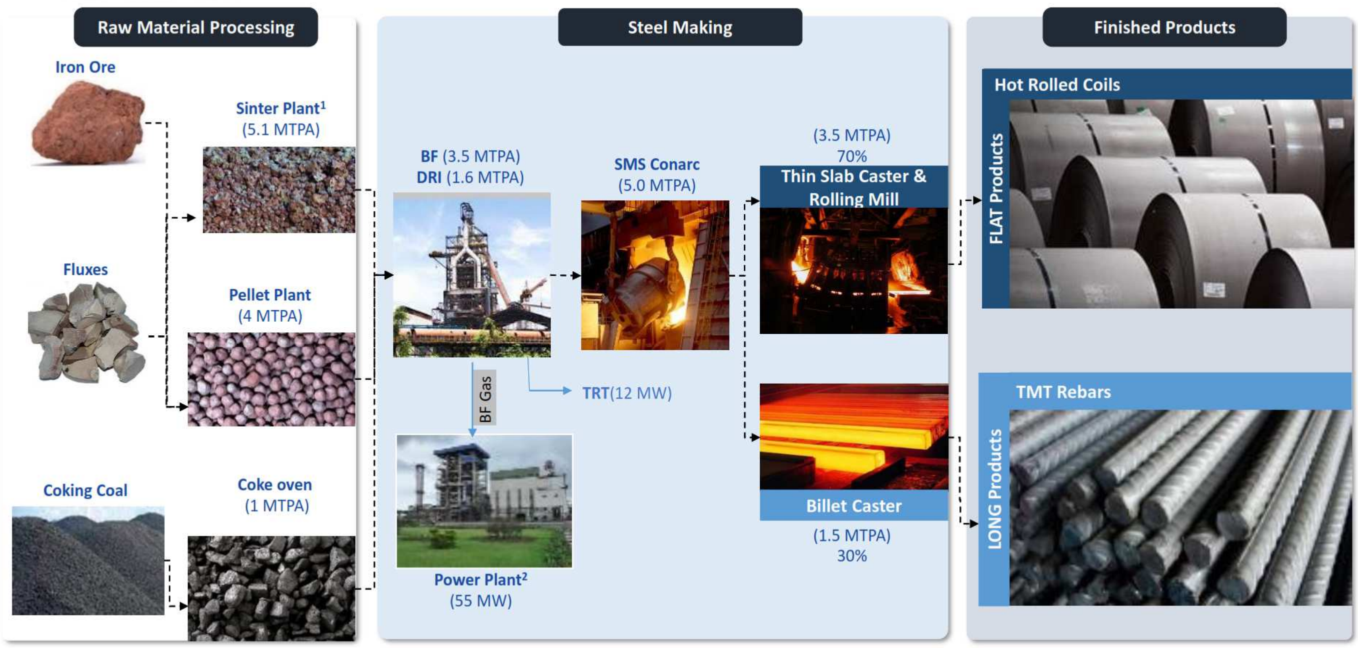
Dolvi plant: Story in charts

Fig 1 – Turnaround at Dolvi plant



Source: Company

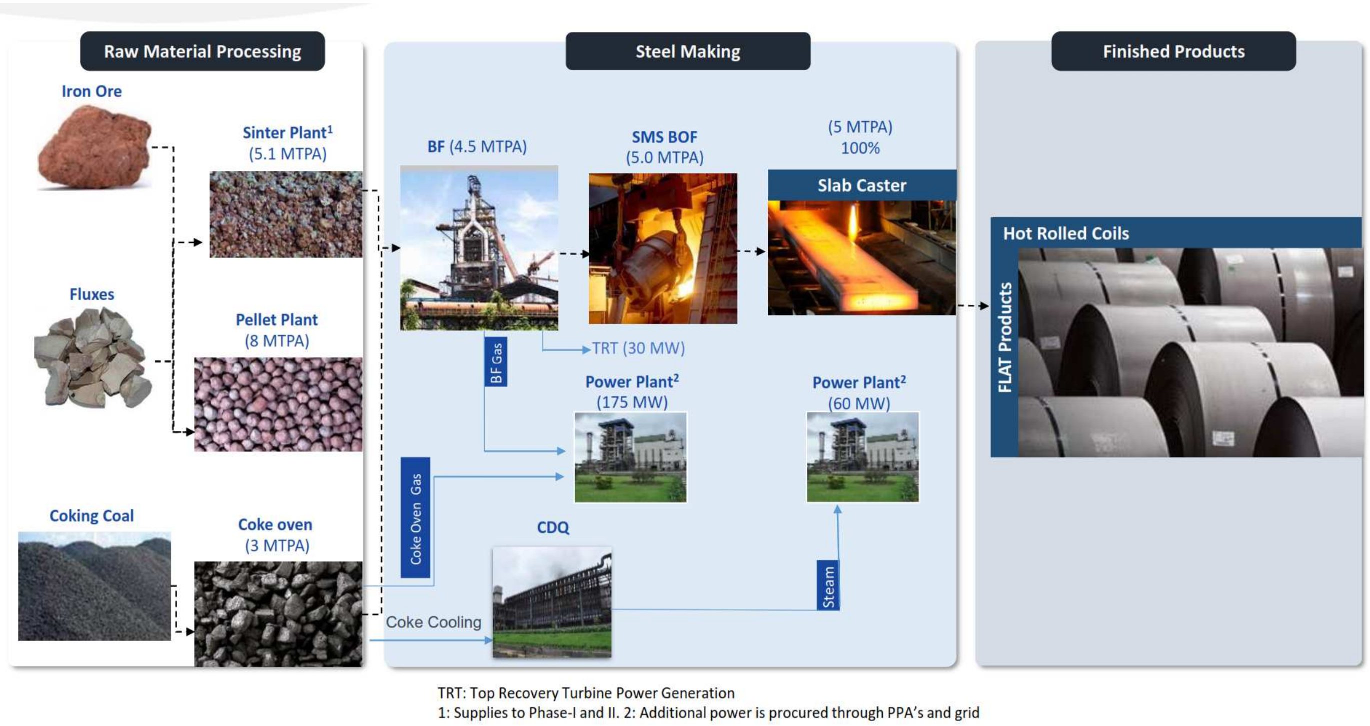
Fig 2 – Dolvi plant: Process flow in Phase-1 (5mtpa)



TRT: Top Recovery Turbine Power Generation
1: Supplies to Phase-I and II. 2: Additional power is procured through PPA's and grid.

Source: Company

Fig 3 – Dolvi plant: Process flow in Phase-2 (5mtpa)



Source: Company

Fig 4 – Dolvi plant: Portfolio and applications

Source: Company

Valuation methodology

JSTL is trading at 6.7x FY24E EV/EBITDA and holds limited upside from current levels, in our view. We thus maintain our HOLD rating with an unchanged TP of Rs 650. Our rating also reflects potential risks from the relatively high level of gearing within the Indian steel sector.

Our target price is based on a one-year forward EV/EBITDA multiple of 6x applied on FY24E earnings. To credit JSTL for delivering on aggressive growth, we ascribe the company the highest target multiple of 6x within the steel sector (current range of 4-6x). Our target multiple is in line with the stock's historical trading average of 6.5x/6.9x one-year forward EV/EBITDA over the past 5-year/10-year period, reflecting the current economic uncertainty.

Fig 5 – Valuation summary

(Rs bn)	Value
FY24E EBITDA	365
Target EV/EBITDA multiple (x)	6
EV	**2,191**
FY23E Net debt	621
Equity investments	5
Equity Value	**1,575**
Fair value per share (Rs)	652
Target price Mar'23 (rounded to nearest Rs 5)	**650**

Source: BOBCAPS Research

Key risks

- Steel producer valuations are highly sensitive to product and raw material prices. Key upside/ downside risks to our estimates are favourable/ unfavourable changes in global demand-supply balance for steel and its raw materials, leading to lower prices than assumed.
- Company specific downside risks: JSTL is exposed to risk of delays in ramping up its aggressive capital investment plan, which could impact earnings growth. The company aims to expand group capacity to 37mtpa by FY25. Considering its aggressive growth policy and large capital investment plan over FY23-FY24, the company is relatively more vulnerable than peers in the event of a protracted downturn in the steel cycle.
- Company specific upside risks include faster implementation of capital investment plan than our current assumptions. We conservatively assume limited contribution from Vijayanagar expansion till FY25 till we see more clear pointers towards JSTL achieving guided schedule.

Sector recommendation snapshot

Company	Ticker	Market Cap (US$ bn)	Price (Rs)	Target (Rs)	Rating
JSW Steel	JSTL IN	21.8	746	650	HOLD
SAIL	SAIL IN	4.1	82	90	HOLD
Tata Steel	TATA IN	16.2	111	125	BUY

Source: BOBCAPS Research, NSE | Price as of 20 Dec 2022

Financials

Income Statement

Y/E 31 Mar (Rs bn)	FY21A	FY22A	FY23E	FY24E	FY25E
Total revenue	**798**	**1,464**	**1,604**	**1,618**	**1,688**
EBITDA	201	390	227	365	411
Depreciation	(47)	(60)	(74)	(75)	(78)
EBIT	155	330	154	290	334
Net interest inc./(exp.)	(40)	(50)	(54)	(52)	(46)
Other inc./(exp.)	6	15	8	8	8
Exceptional items	(1)	(7)	0	0	0
EBT	120	297	107	251	306
Income taxes	(41)	(88)	(32)	(75)	(92)
Extraordinary items	0	0	0	0	0
Min. int./Inc. from assoc.	0	9	0	5	10
Reported net profit	**79**	**207**	**74**	**173**	**211**
Adjustments	0	(9)	0	0	0
Adjusted net profit	**79**	**197**	**74**	**173**	**211**

Balance Sheet

Y/E 31 Mar (Rs bn)	FY21A	FY22A	FY23E	FY24E	FY25E
Accounts payables	152	309	363	332	336
Other current liabilities	64	137	150	152	158
Provisions	3	3	3	3	3
Debt funds	667	722	722	672	547
Other liabilities	72	109	119	139	164
Equity capital	3	3	3	3	3
Reserves & surplus	453	670	729	868	1,036
Shareholders' fund	450	685	743	879	1,045
Total liab. and equities	**1,472**	**1,965**	**2,100**	**2,177**	**2,253**
Cash and cash eq.	128	174	101	136	150
Accounts receivables	45	75	87	88	91
Inventories	142	338	453	379	336
Other current assets	43	67	67	67	67
Investments	0	0	0	0	0
Net fixed assets	591	931	910	887	961
CWIP	324	168	268	403	428
Intangible assets	18	21	23	25	27
Deferred tax assets, net	0	0	0	0	0
Other assets	180	192	192	192	192
Total assets	**1,472**	**1,965**	**2,100**	**2,177**	**2,253**

Cash Flows

Y/E 31 Mar (Rs bn)	FY21A	FY22A	FY23E	FY24E	FY25E
Cash flow from operations	**179**	**331**	**145**	**359**	**405**
Capital expenditures	(94)	(246)	(154)	(190)	(180)
Change in investments	0	0	0	0	0
Other investing cash flows	(108)	1	8	8	8
Cash flow from investing	**(201)**	**(245)**	**(146)**	**(182)**	**(172)**
Equities issued/Others	0	0	0	0	0
Debt raised/repaid	66	(9)	0	(50)	(125)
Interest expenses	(40)	(50)	(54)	(52)	(46)
Dividends paid	(16)	(42)	(15)	(35)	(42)
Other financing cash flows	19	60	(2)	(5)	(6)
Cash flow from financing	**30**	**(41)**	**(71)**	**(142)**	**(219)**
Chg in cash & cash eq.	**8**	**46**	**(73)**	**35**	**14**
Closing cash & cash eq.	**128**	**174**	**101**	**136**	**150**

Per Share

Y/E 31 Mar (Rs)	FY21A	FY22A	FY23E	FY24E	FY25E
Reported EPS	32.7	85.5	30.6	71.5	87.2
Adjusted EPS	32.7	81.7	30.6	71.5	87.2
Dividend per share	6.5	17.4	6.1	14.3	17.4
Book value per share	188.7	278.4	302.9	360.1	429.9

Valuations Ratios

Y/E 31 Mar (x)	FY21A	FY22A	FY23E	FY24E	FY25E
EV/Sales	1.7	0.8	0.8	0.8	0.7
EV/EBITDA	6.7	3.2	5.4	3.3	3.0
Adjusted P/E	22.8	9.1	24.4	10.4	8.5
P/BV	4.0	2.7	2.5	2.1	1.7

DuPont Analysis

Y/E 31 Mar (%)	FY21A	FY22A	FY23E	FY24E	FY25E
Tax burden (Net profit/PBT)	65.4	64.8	69.0	69.0	69.0
Interest burden (PBT/EBIT)	78.2	92.4	69.9	86.5	91.7
EBIT margin (EBIT/Revenue)	19.4	22.5	9.6	17.9	19.8
Asset turnover (Rev./Avg TA)	57.2	85.2	78.9	75.7	76.2
Leverage (Avg TA/Avg Equity)	3.4	3.0	2.9	2.7	2.3
Adjusted ROAE	19.2	35.0	10.5	21.6	22.1

Ratio Analysis

Y/E 31 Mar	FY21A	FY22A	FY23E	FY24E	FY25E
YoY growth (%)					
Revenue	8.9	83.3	9.6	0.9	4.3
EBITDA	69.6	93.7	(41.7)	60.7	12.7
Adjusted EPS	96.3	149.6	(62.5)	133.7	21.9
Profitability & Return ratios (%)					
EBITDA margin	25.2	26.6	14.2	22.6	24.4
EBIT margin	19.4	22.5	9.6	17.9	19.8
Adjusted profit margin	9.9	13.5	4.6	10.7	12.5
Adjusted ROAE	19.2	35.0	10.5	21.6	22.1
ROCE	13.8	24.9	10.4	18.2	19.8
Working capital days (days)					
Receivables	21	19	20	20	20
Inventory	65	84	103	86	73
Payables	93	105	96	97	96
Ratios (x)					
Gross asset turnover	0.6	0.9	0.8	0.8	0.8
Current ratio	0.8	1.1	1.1	1.1	1.0
Net interest coverage ratio	3.9	6.6	2.8	5.5	7.3
Adjusted debt/equity	1.3	0.8	0.8	0.6	0.4

Source: Company, BOBCAPS Research | Note: TA = Total Assets

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Recommendation scale: Recommendations and Absolute returns (%) over 12 months

BUY – Expected return >+15%

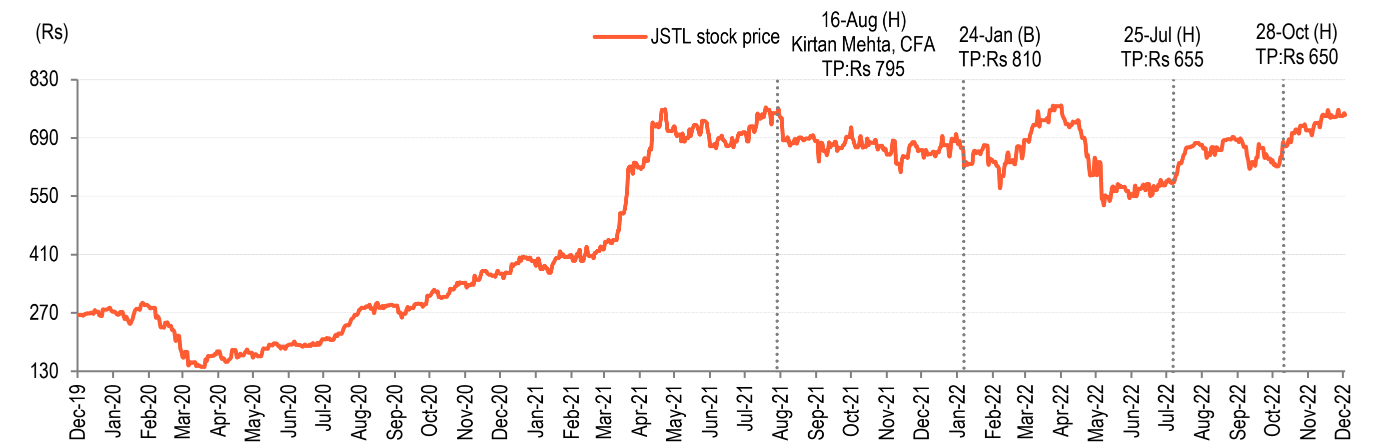
HOLD – Expected return from -6% to +15%

SELL – Expected return <-6%

Note: Recommendation structure changed with effect from 21 June 2021

Our recommendation scale does not factor in short-term stock price volatility related to market fluctuations. Thus, our recommendations may not always be strictly in line with the recommendation scale as shown above.

Ratings and Target Price (3-year history): JSW STEEL (JSTL IN)



B – Buy, H – Hold, S – Sell, A – Add, R – Reduce

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