

India Steel

The debt issue: don't panic, differentiate

Equities

India
Steel

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Steel industry debt is an investor concern; we think market should differentiate

Risks abound in global steel from which India is not exempt. High leverage is a further 'red flag' and a drag on sentiment/valuations. Yet our analysis of industry-wide financials and contributions from UBS's banks team shows why investors should differentiate. Industry free cash flow generally improves from FY16 led by falling capex; after >5 years of pressure, we believe long-term prospects for India steel are fundamentally good (see our [Initiation](#)). We believe Tata Steel and JSW Steel are best positioned to benefit from deleveraging and balance sheet stress in the longer 'tail' of competition.

Fortune favours the large

Our coverage generally have stronger balance sheets (FY15 net debt/EBITDA of 5.6x; interest cover of 2.9x) than the tail (FY15 net debt/EBITDA >15x; interest cover c1.0x). We believe Tata Steel and JSW Steel are in the most comfortable position, and should benefit the most from favourable scale, mix and efficiency (capital and operating), fastest deleveraging from falling capex (down c25%/35% in FY16/17E) and apparently strong promoter/bank support. The situation in the tail is also varied but weaker: on aggregate we estimate covered companies could reach breakeven cash flow with realisations 5-15% lower than spot, while the tail would need a >30% increase.

Implications for the banking sector: asset quality concerns to persist

Indian banks have c4.8% exposure to the iron and steel sector and >50% have interest coverage ratio (ICR) <1x (Q2 FY16). We understand only 7.5% of steel loans are NPL as of March 2015 and c20% are restructured. We estimate around 1.7% of sector loans (2.5% of PNB and 1.5% of ICICI) are under RBI the 5-25 refinancing scheme. Additionally, 0.6% of total banking loans are to companies with ICR <1x and debt/EBITDA >10x (SBI, YES, IndusInd have >1% of loans approved to this sub-group).

We believe Tata Steel has the most attractive risk/reward profile

We cut our EBITDA estimates for FY16-18 by an average c15% for covered companies (we did not adjust post Q2). We change our valuation approach from multiples to sustainable FCF on a 10% yield to derive a less volatile 'fair value'. We think stock prices are broadly pricing in steel prices remaining depressed. We believe Tata Steel represents the best upside/downside skew (downside valuation of Rs160.00, consistent with steel prices c20% lower, and an upside valuation of Rs500.00 versus the current price of Rs230.05) and remains our top pick.

Figure 1: Valuations and price target changes

	Reuters Code	Mcap (USD mn)	UBS Rating	Old Price Target (Rs/sh)	New Price Target (Rs/sh)	Share Price (Rs)	PE(x)		PB(x)		Net Debt (USD mn)
							FY17E	FY18E	FY17E	FY18E	FY17E
Tata Steel	TISC.BO	3,351	Buy	360	330	230	11.5	5.5	0.57	0.53	10,698
JSW Steel	JSTL.BO	3,279	Buy	1100	1200	904	10.9	8.3	0.87	0.81	5,479
Steel Authority of India	SAIL.BO	2,834	Neutral	55	47	46	-34.4	54.1	0.47	0.48	6,330
Jindal Steel & Power	JNSP.BO	1,272	Neutral	75	100	91	18.1	5.4	0.37	0.34	6,211

Source: Company data, UBS estimates; Share price as of closing of 30 Nov 2015

Tata Steel, JSW Steel

Steel Authority of India, Jindal Steel & Power

PIVOTAL QUESTIONS

Q: Is India an oversupplied market?

We think not, although it is still vulnerable to global steel price pressure. We think capacity additions are limited through both discipline at the larger companies and circumstances at the smaller or foreign companies. Further out we see the potential for at least price stability through further government support for the domestic industry and good demand prospects in India. [India steel initiation](#)

Q: What are the sector and valuation implications of high debt?

Balance sheets are still a drag on sentiment/valuation for our covered companies, but we think the coming deleveraging cycle is a meaningful turning point. Capex has been the main issue for the industry and with expansion programs completing, we are convinced debt peaks and free cash flow (generally) improves from FY16. We believe debt will remain a bigger issue for the long-tail of non-covered companies in the Indian steel industry and could present long-term consolidation opportunities. [more →](#)

Q: When do we see a turning point?

Not in the next 1-2 quarters, and demand/government protection is key. On-the-ground trends suggest tepid demand growth in India, although it is relatively well-placed globally. We believe further government protection for the steel industry would be a positive. On a 12m view we think long-term demand drivers (eg infrastructure) start to materialize. [Market tough; protection still on the agenda](#)

WHAT'S PRICED IN?

Current depressed steel prices are priced in. We find investors highly cautious after months of steel price pressure and bad news for commodities/China more generally. We think the market is pricing in a broadly stable and depressed domestic steel price. Our downside scenario incorporates a 10-20% further fall in steel prices from currently depressed spot levels. [more →](#)

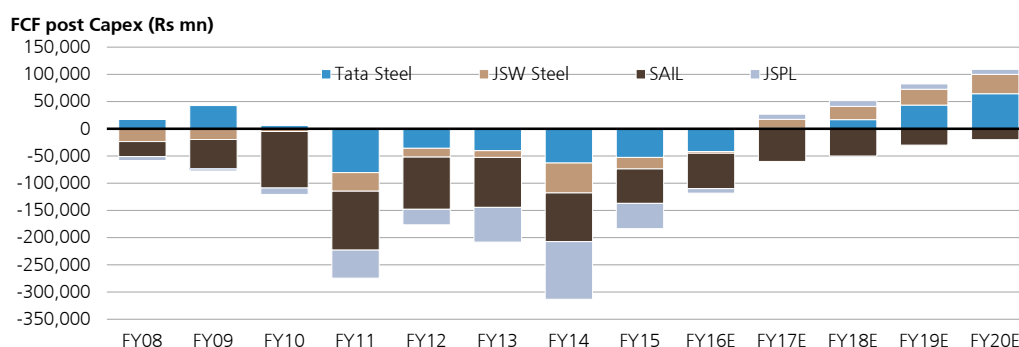
UBS VIEW

Pick the best risk/reward (Tata Steel) in a depressed sector: We understand investor macro concerns and no greater visibility. However we think the Indian steel industry would survive and thrive as economic growth picks up. We believe balance sheet repair gives equity investors further upside, especially at Tata Steel and JSW Steel. We think financial stress in the tail of the industry is not new and is ultimately favorable for market structure and discipline.

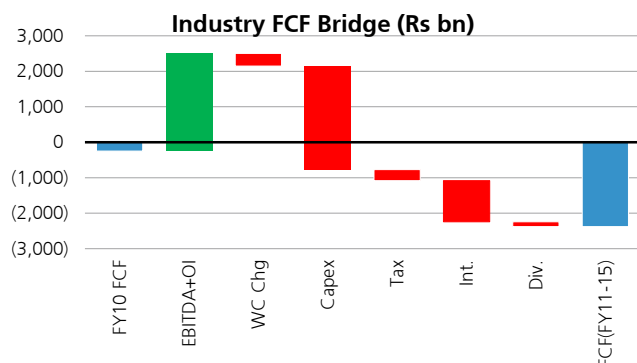
EVIDENCE

Detailed analysis of steel sector balance sheets: we examined financials for 32 companies (covering 92% of the FY15 debt and c.95% of the EBITDA of the steel industry). We believe wide divergences in debt and servicing ability means investors should differentiate. We believe larger diversified companies like Tata Steel and JSW are best positioned. The tail of the industry is much more stretched, which we believe means a weaker competitive position and ongoing asset quality issues for many banks.

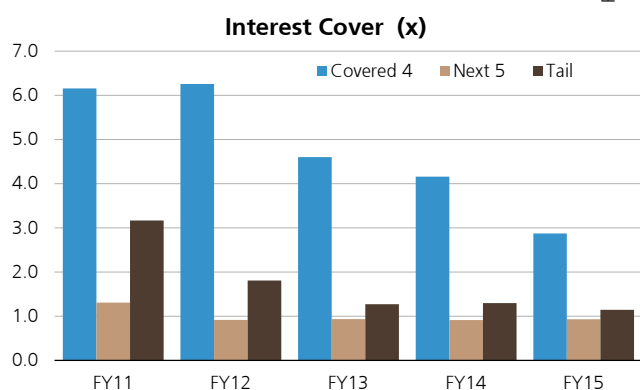
Debt peaking; FCF turning



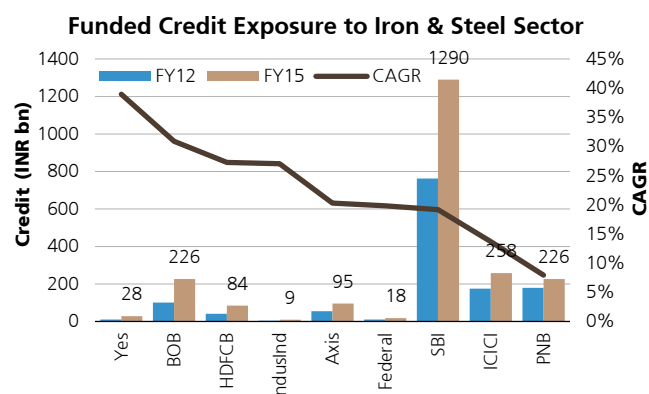
OUR THESIS IN PICTURES

[return](#) ↑

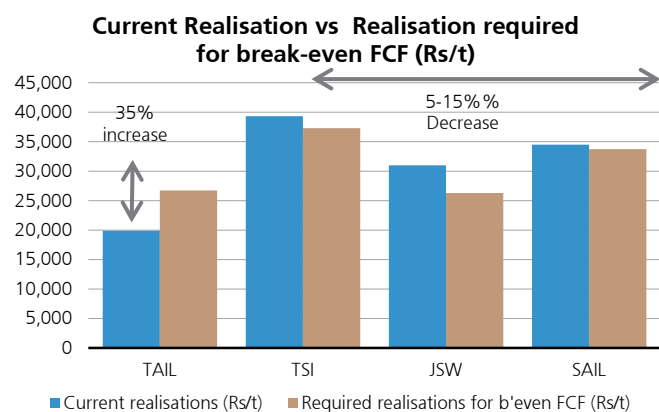
Balance sheet pressure has arisen mainly from high capex



Analysis of 32 company financials shows a wide variety in debt servicing ability. We believe investors should differentiate



Asset quality concerns to persist for India banking sector



Major listed companies should be able to survive in a weak steel price environment; longer tail will struggle to repair balance sheets for the foreseeable future

Sources for exhibits above: Company data, UBS Research

PIVOTAL QUESTIONS

[return](#) ↑**Q: What are the implications of high debt?**

UBS VIEW (ON STEEL)

Our conversations with investors suggest debt is one of their key concerns. This has increased given the extreme pressures in the steel market over the last 12 months and debt's sensitivity on equity valuations. We performed detailed analysis of industry-wide financials (a sample of 32 companies representing c.92% of FY15 steel industry debt) in order to frame today's issue and model potential industry scenarios going forward. The situation is not uniform and we believe if investors do not differentiate they may miss opportunities. On an aggregate basis, the "tail" of the industry below our coverage has the greatest balance sheet pressure and needs much more help from the steel market to relieve this. Ultimately we think this should benefit the competitive position of less pressured, larger and diversified companies, especially Tata Steel and JSW Steel.

UBS VIEW (ON BANKS)

UBS's Banks team has been writing about issues on [asset quality](#) in India for some time. Recent quarterly reporting for Q2 and our recent India Conference indicate this is a key investor concern. UBS's economics team are relatively positive on India within emerging markets, with asset quality issues their [main area of concern](#). Our analysis suggests the steel industry will be little help in improving this situation in the short/medium-term. Partially offsetting this risk, we note that many of the most distressed steel assets are already NPA (c20% of total banking exposure) with many of the largest cases already well-known. Bank-wise exposure is difficult to identify, but suggests a relative lack of concentration.

EVIDENCE

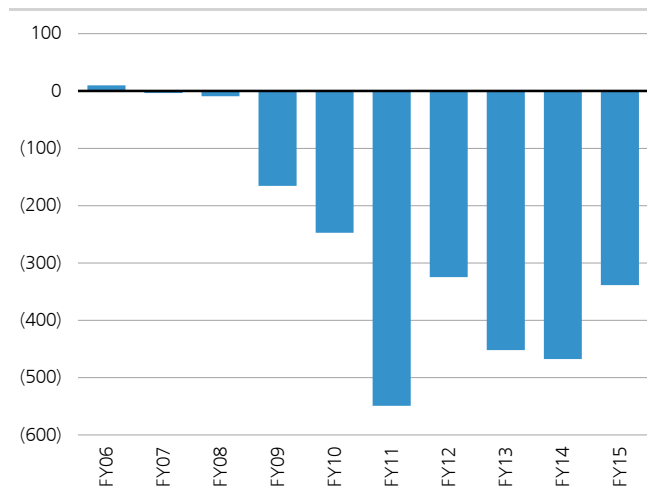
- **Differentiate** – detailed analysis of industry financials shows a much more favourable position at our covered companies than the tail. Around 32% of industry debt is within five mid-tier **companies** and 19% in smaller **companies**.
- **Beneficiaries** – larger companies benefit from scale and generally premium pricing. Analysis also indicates their debt burden has generally come at a lower cost and is more sustainable than peers.
- **Larger companies can endure tougher steel price environment** – debt peaks in FY16E for our covered companies and deleveraging occurs thereafter, which could be significant for equity investors (with debt at c70% of EV). We think our covered companies will reach breakeven free cash flow with steel prices 5-15% lower than spot, while the rest of the industry on aggregate may need a c30% increase, in our view.

Debt a significant issue, driven by capex

The existence of high leverage in the Indian steel industry has been a key driver of share price pressure in the steel industry, as well as a consistent drag on investor sentiment. The sector has reported negative free cash flow for the last 7 years.

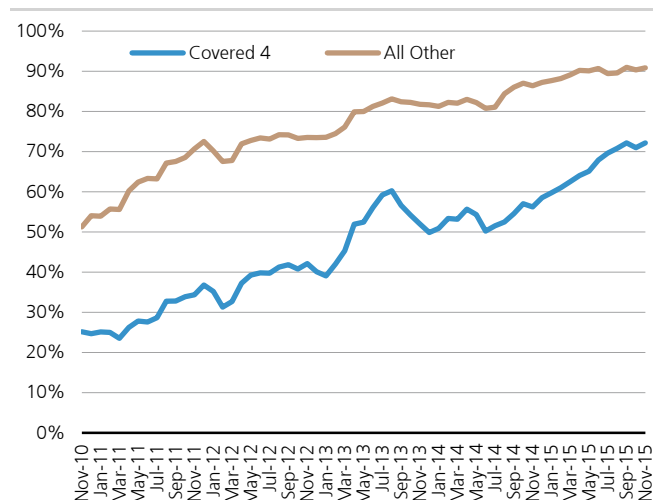
Debt "issue" is well known to investors

Figure 2: Aggregate steel sector* FCF progression (Rs.bn)



Source: Capitaline, UBS; * - sector is 32 companies (details see appendix)

Figure 3: Net debt % of Enterprise Value (EV)

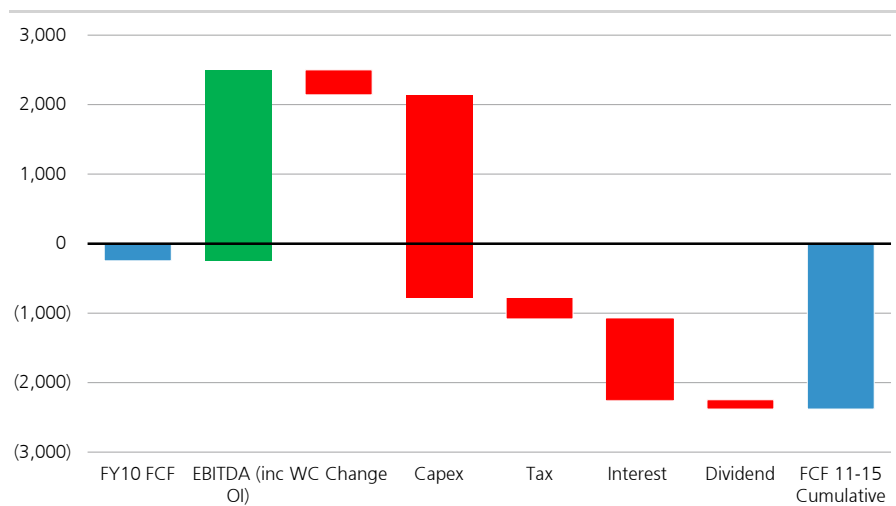


Source: Bloomberg, UBS; Covered 4 = Tata Steel, JSW, JSPL, SAIL

The deterioration in free cash flow can largely be attributed to a significant rise in capex as almost all major market participants have added capacity. Industry crude steel capacity more than doubled between FY03 and FY12 with a CAGR of 12%.

Capex is the major culprit

Figure 4: Cumulative FCF bridge FY10 - FY15 (Rs bn) – Indian Steel sector*



Source: Capitaline; * - sector is 32 companies (details see appendix)

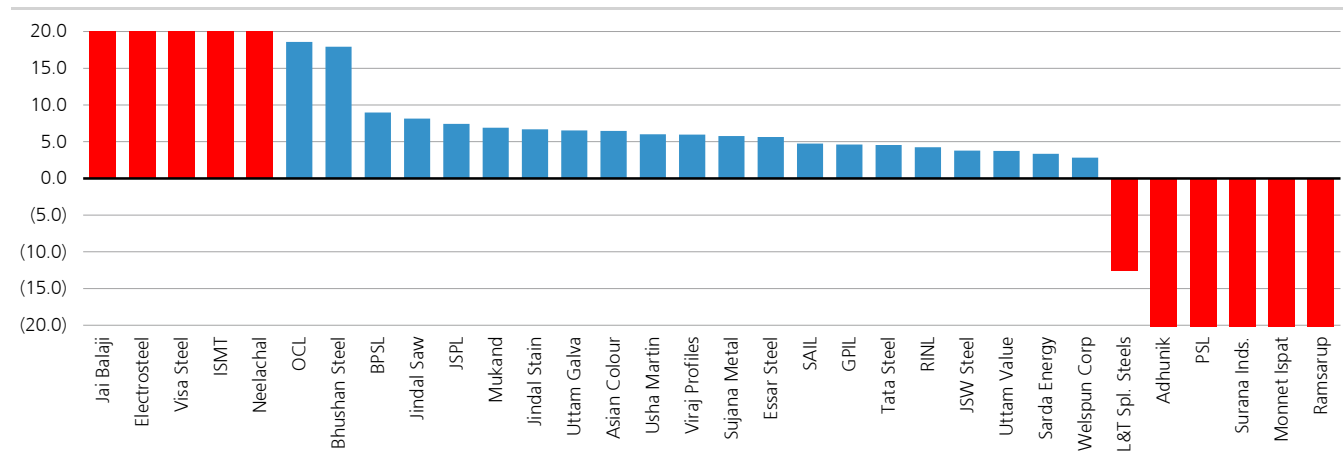
We covered the capacity history of Tata Steel, JSW Steel, JSPL and SAIL in our recent initiation - [Turning Point Approaching](#). The next c.20% of industry capacity (Bhushan Steel, BPSL, Essar and RINL) have also seen significant capacity expansion over the last 5 years. Overall we believe this capacity expansion has been ill-timed with the completion of many projects corresponding with a significant drop in global steel markets.

Industry "stress" is concentrated: differentiate

We frequently encounter the investor perception that high leverage makes the entire Indian steel sector un-investable. Well-known public examples of stressed steel companies and associated restructuring (such as Bhushan Steel) in the industry, contribute to this perception. There are clearly pockets of much higher leverage and hence risk, but there is clearly a range within the sector.

Industry balance sheets are a key concern for investors

Figure 5: FY15 leverage by company (Net debt: EBITDA ratio (x))

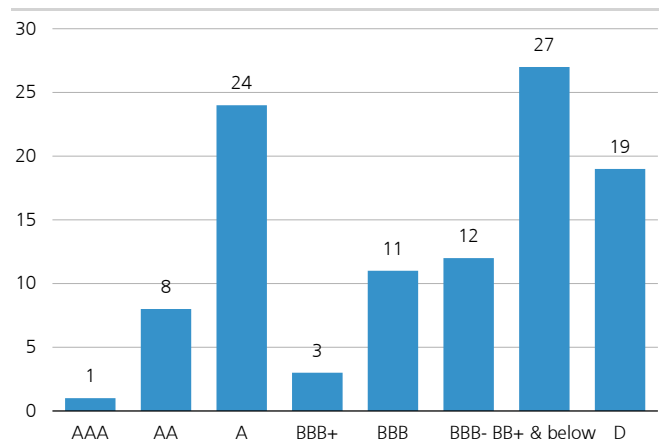


Source: Capitaline, UBS; Y axis cut off at 20x -20x. In cases where Net Debt to EBITDA is negative it is due to -ve EBITDA for the particular company

The differences in leverage are also reflected by the ratings agencies. The data below shows the broad spread of ratings (across a number of domestic ratings agencies) for some 300+ debt instruments in the Indian iron and steel industry. We also note that the bulk of the debt is found in only 9 companies: the 4 that we cover, then Bhushan, Essar Steel, Jindal Stainless, Monnet Ispat and BPSL.

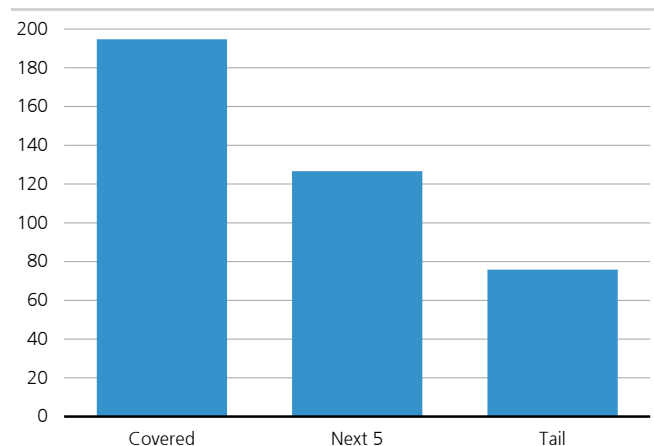
But absolute net debt is fairly concentrated (c.80% in just 9 companies)

Figure 6: No. of steel companies per credit rating band



Source: Capitaline; A total of 105 companies have been considered; Rating pertains to various debt facilities of the respective companies, cases where ratings were available for multiple debt categories per company, we prioritised/considered long term debt/term loan/short term in that order.

Figure 7: Sector gross debt distribution (Rs bn)



Source: Capitaline, Category constituents as follows - Tata Steel, JSW Steel, SAIL & JSPL under 'Covered', Bhushan Steel, Essar Steel, Jindal Saw, Jindal Stainless, Bhushan Power & Steel under 'Next 5' (on basis of FY15 gross debt), and the rest 23 companies (as per 32 defined set of companies in appendix) in 'Tail'

Differences within the industry are clear as we look at development of profitability, cash-flow and debt over the last decade. The Indian steel industry is highly fragmented with more than 300 companies in the wider steel value chain filing accounts each year. We used a sample of 32 companies (detailed in the Appendix to this note). We believe these represent c.92% of industry debt and c.95% of industry EBITDA.

Figure 8: Gross Debt forming a part of our analysis

Sub-Sector	No. of companies	Gross Debt (Rs bn)	% of Total Sub-Sector Debt	% of Total Universe Debt	% of Total Sample Debt	Total Universe Debt (Rs bn)
Large	10	2,711	100%	67%	72%	2,711
Medium/Small	16	425	69%	10%	11%	612
Pig Iron	1	19	45%	0%	1%	42
Rolling	0	0	0%	0%	0%	20
Seamless Tubes	0	0	0%	0%	0%	4
Tubes & Pipes	2	88	70%	2%	2%	126
Sponge Iron	3	498	92%	12%	13%	539
Wires	0	0	0%	0%	0%	10
Total	32	3,741		92%	100%	4,065

Source: Capitaline

We sorted on the basis of size: our 4 covered companies, the "Next 5" by FY15 gross debt and then the "Tail" (23 remaining companies). Key historical performance and current status for these companies are detailed in Figure 9 below. We note the following key points:

- Relatively higher profitability at the larger companies suggests some benefit from scale and vertical integration which we discuss further below (on average we estimate the EBITDA/t of the 4 covered companies has been 2-3x that of the rest of the industry historically. It also reflects mix (flats vs long products), as well as the fact that the tail also contains suppliers of intermediates and raw materials (eg pellets or sponge iron).
- Capex has increased across the sector, but is most pronounced in the mid-tier ("Next 5"). This reflects well-known expansion programmes of some of the companies in this group. Of the covered companies there has also been a range of capex spend with JSPL the highest spenders. The Capital Work in Progress (CWIP) line shows the impact of pre-commissioning expansion projects across the sector remaining high across most of the period.
- Interest cover has deteriorated across the sector, albeit by more at the small industry participants. Only the larger companies are above the high-level "comfort level" as suggested by our banks team of 1.5x. But even the relatively sharp deterioration in FY15 and further in FY16 as a result of falling profitability has concerned some investors.
- Cost of debt has remained relatively constant across the 3 categories and is higher in the mid-tier segment. In most cases falling Indian interest rates (the UBS expectation is for a further 75bp reduction in the next 18m, on top of the 125bp seen since October 2014) should be a benefit. We do not see a big risk of lenders increasing rates or imposing punitive rates on struggling borrowers. As we show below, in several cases lenders have shown willingness to grant extensions recently against covenants without penalties. We also show that for very stressed borrowers lenders have generally sought extensions (such as through the RBI 5:25 scheme) or certain assets have entered into Corporate Debt Restructuring. There is no evidence of material equity raising across the group, with the exception of Tata Steel historically raising equity to fund acquisitions.

Performance trends held up reasonably well, although much more pressure in FY16.

Capex has been relatively highest in the mid-tier segment, reflecting aggressive capacity expansion.

Interest cover is deteriorating

No big increase in cost of debt. Evidence suggests banks more likely to restructure stressed companies' debt than impose punitive rates.

Figure 9: Steel industry* key historical financial summary

	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	FY14	FY15
Revenue growth										
Covered 4	5.3%	22.6%	24.9%	14.9%	-20.4%	15.3%	16.4%	2.4%	11.9%	-3.1%
Next 5	6.9%	43.4%	19.0%	15.7%	15.0%	23.7%	31.7%	6.7%	1.0%	-6.2%
Tail	8.8%	22.8%	32.9%	22.1%	7.4%	10%	15%	4.3%	-2.3%	6.7%
EBITDA Margin										
Covered 4	26.6%	29.0%	18.2%	13.8%	14.8%	18.0%	13.8%	12.6%	13.4%	12.5%
Next 5	13.5%	16.9%	17.3%	16.6%	19.7%	17.9%	15.6%	17.4%	14.2%	16.1%
Tail	15.9%	14.9%	16.0%	9.6%	12.9%	11.7%	9.4%	7.3%	7.6%	7.3%
FCF (Rs mn)										
Covered 4	25,379	54,095	100,469	(34,098)	(21,786)	(205,895)	(42,690)	(96,012)	(230,252)	(161,674)
Next 5	(6,372)	(27,738)	(64,049)	(49,045)	(156,819)	(199,724)	(168,443)	(207,288)	(141,446)	(101,965)
Tail	11,665	(7,276)	(19,201)	(52,766)	(36,769)	(115,220)	(81,100)	(122,188)	(72,472)	(48,500)
Capex % Sales										
Covered 4	10.3%	14.6%	9.8%	11.0%	15.6%	17.2%	11.1%	12.8%	16.7%	12.3%
Next 5	21.9%	43.4%	41.8%	27.4%	49.9%	49.9%	36.7%	33.9%	29.7%	23.6%
Tail	6.4%	12.0%	17.3%	20.4%	17.2%	21.0%	16.4%	14.7%	9.7%	7.3%
CWIP % Total FA										
Covered 4	14.5%	23.3%	19.6%	24.2%	28.6%	31.8%	33.6%	35.0%	32.2%	26.9%
Next 5	16.3%	47.5%	50.3%	49.7%	60.9%	46.2%	33.6%	34.9%	44.4%	16.4%
Tail	9.7%	26.5%	34.1%	39.5%	38.4%	46.4%	48.3%	37.6%	33.6%	29.8%
Interest Cover										
Covered 4	16.8	16.0	8.4	6.3	6.0	6.2	6.3	4.6	4.2	2.9
Next 5	6.6	3.0	2.0	1.8	1.6	1.3	0.9	0.9	0.9	0.9
Tail	8.1	6.7	7.3	3.5	4.7	3.2	1.8	1.3	1.3	1.1
Asset Turns										
Covered 4	0.9	0.7	0.9	1.0	0.7	0.7	0.7	0.7	0.7	0.6
Next 5	0.6	0.6	0.5	0.5	0.3	0.3	0.3	0.3	0.3	0.2
Tail	0.8	0.8	0.8	0.7	0.7	0.6	0.6	0.5	0.5	0.5
Cost of debt										
Covered 4	8.0%	3.7%	6.9%	5.7%	5.4%	6.1%	5.5%	5.2%	5.2%	6.6%
Next 5	2.5%	7.0%	8.0%	10.5%	8.1%	7.8%	9.8%	8.8%	10.0%	11.0%
Tail	5.6%	6.4%	7.8%	8.3%	7.0%	7.1%	8.6%	8.3%	7.4%	7.8%
Net Debt:EBITDA										
Covered 4	0.3	0.9	1.7	2.2	2.6	2.2	2.9	4.1	4.6	5.6
Next 5	6.4	5.3	6.7	5.4	8.5	10.7	11.9	12.6	17.7	17.0
Tail	0.7	0.9	1.0	2.8	2.5	4.7	7.1	11.8	12.4	13.2
Equity raisings										
Covered 4	7	16,054	50,805	286	24,906	103,256	5,586	0	116	133
Next 5	108	4,249	4,465	2,346	15,876	21,200	26,529	10,406	19,337	26,635
Tail	10,946	2,961	9,781	912	23,351	13,843	12,984	9,773	1,770	6,056
Number of companies										
Covered 4	3	4	4	4	4	4	4	4	4	4
Next 5	3	4	5	5	5	5	5	5	5	5
Tail	13	15	16	19	19	21	22	23	23	23*

Source: Capitaline, UBS; *In cases where FY15 data wasn't available, we rolled over FY14 numbers; However this was a only to do with abt. 6 companies which are private & smaller in size; * - steel industry is 32 companies (see sample details in the Appendix); Covered 4 are Tata Steel, JSW Steel, JSPL and SAIL, "Next 5" are next 5 companies by largest FY15 gross debt according to financial statements, Tail is remainder

Larger companies much better positioned

Overall Indian outlook is supportive

Positive developments in operating cash-flow are the clearest route for the industry to improve balance sheets. We look at the biggest sensitivity within this, the impact of steel prices, in the scenarios section below. We reiterate the view expressed in our recent initiation [Turning Point Approaching](#) that the fundamental prospects for the Indian steel industry are positive. We expect modest capacity additions both out of choice, but also from the constraint of high leverages. We do not see meaningful foreign investment in the Indian steel industry given the ongoing difficulties in investing and the cautionary experiences of Posco and Arcelor Mittal. We view the demand growth story in Indian steel is good in the short-term relative to other major global steel markets, even if Indian macro growth remains relatively muted. In the long-term we believe infrastructure investment and the development of manufacturing will boost steel demand further.

Favourable supply demand balance in India steel...

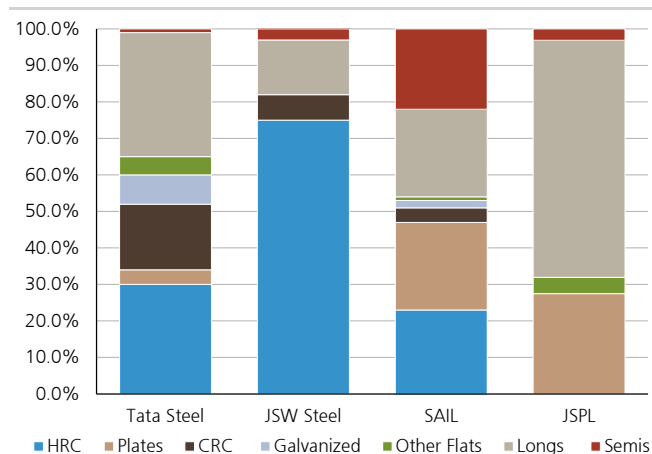
Finally we note signs of government support for the domestic steel industry. The official government target is for a broad tripling of steel industry capacity to 300mt in the next decade. We view this as high unlikely, but symptomatic of Indian aspirations of self-sufficiency in key resources/minerals and ultimately supportive. More recently the Indian government has shown willingness to protect against elevated imports in the form of the safeguard duty on HRC imposed in September.

...and government support

Fortune favours the large...

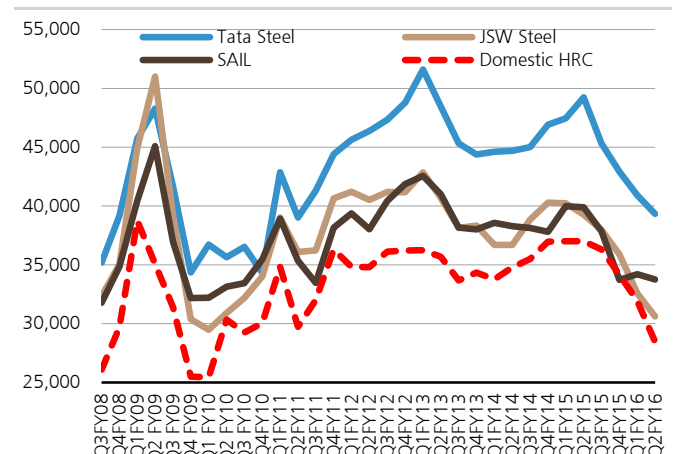
We have no inherent preference for any part of the value chain, or product line. We subscribe to the consensus view that long products give more gearing to infrastructure growth and greater protection from import substitution, but all of the covered companies have a good degree of product diversity in our view, as we show below. All of the larger steel companies in India push their own competitive advantages with respect to value-added products. It is difficult to judge what such claims mean in practice: the evidence from our analysis of the 4 larger listed companies suggests that Tata Steel gets the highest premium above benchmark pricing. Premia are under pressure in tough markets for all companies. We note SAIL is the most active in trying to fight this trend, but is consequently suffering from lower volumes and implicitly market share loss.

Figure 10: Product mix by company (FY15)



Source: Company data, UBS estimates

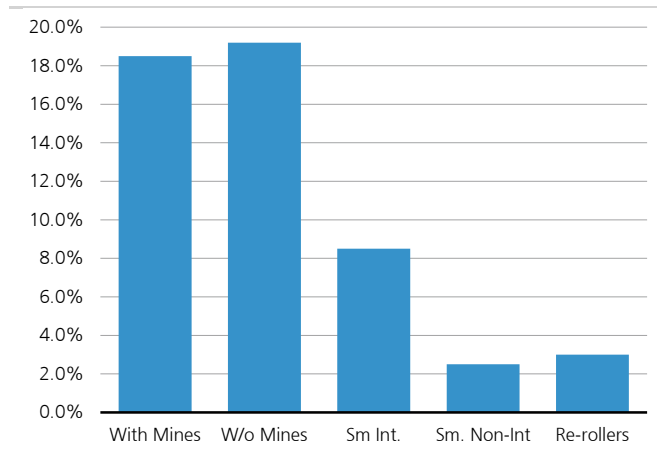
Figure 11: Domestic HRC vs Comp realization—Qtrly (Rs/t)



Source: Metal Bulletin, Company data, UBS

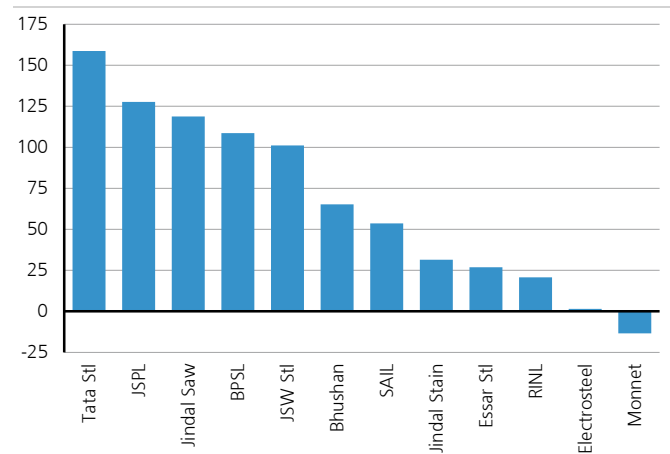
Scale and efficiency are as important as product mix in tough markets. Conceptually, scale will allow economies of production and distribution as well as potential brand and reputational advantages. This is borne out by data which suggests lower profitability further down the value chain.

Figure 12: Margin range across value chain



Source: CRISIL; Please read 'Sm Int' as Small Integrated & 'Sm Non-Int' as Small Non-integrated

Figure 13: EBITDA/t of capacity snapshot* - FY15 (USD)



Source: Capitaline; * - based on FY15 net debt (consolidated) for top 10 FY15 net debt. Tata Steel/JSPL India/standalone only

Structurally we think better scale efficiency and mix at the large integrated steel companies, when combined with their (generally) relatively lower leverage profiles bodes well for the strength of their future market position. The Indian steel industry is split broadly 60:40 between c.10 larger companies (capacity c.2mt and above) and a much more fragmented "tail" (incorporating some 300 companies). There has been almost no significant M&A beyond the well-known JSW/Ispat and Tata Steel/Corus deals, although the industry has invested in both domestic and overseas raw materials assets in the last 5-10 years. As balance sheets are stretched, especially amongst the smaller companies we would expect small/medium bolt-on acquisitions to accelerate, albeit not in the short-term. If corporate debt restructuring (ie lenders taking stakes in the sector) increases, we believe this could also increase the availability of assets at reasonable prices.

Industry stress could also be a catalyst for consolidation

Heavy capex cycle is over

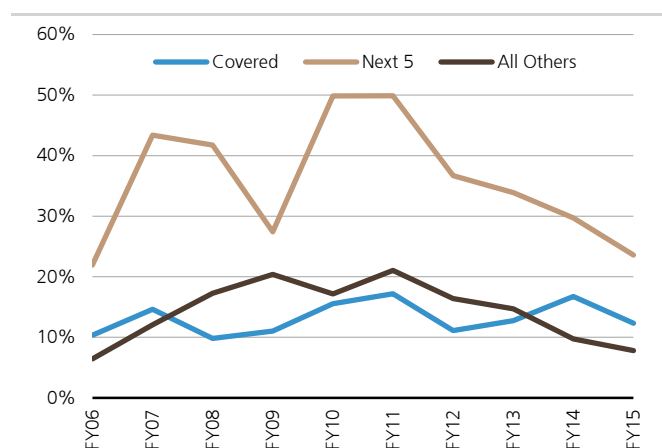
We believe that the pressure on industry cash flow from capex will largely disappear in the next 2-3 years, with no large incremental projects likely without a substantial pick-up in market conditions. This trend has already been in evidence over the last 2 years as capex to sales has markedly reduced. All of the companies under our coverage are guiding to significantly reduce capex in the next couple of years as growth investment is pared back and they focus largely on maintenance.

Capex has already started to fall; and is set to fall further

Tata Steel guides for consolidated capex down 10-15% in FY16 and we think it falls substantially further in FY17 (new guidance awaited). We believe JSW capex will be down c.20% in FY16 and again will fall further in future years. JSPL is also heavily reducing all capex. The one exception within the companies we cover is SAIL where we note the timing of the ongoing Modernisation and Expansion programme (MEP) means capex will remain elevated for the next 2 years.

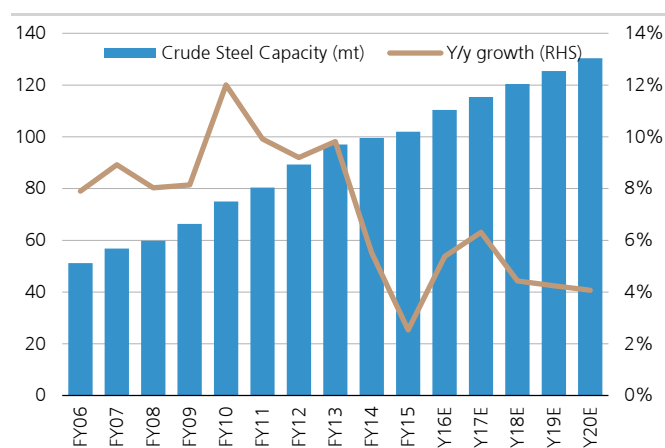
Capex falls for covered companies in FY16 and again in FY17, except for SAIL

Figure 14: Aggregate capex % Sales



Source: Capitaline

Figure 15: Crude steel capacity & growth – India steel industry



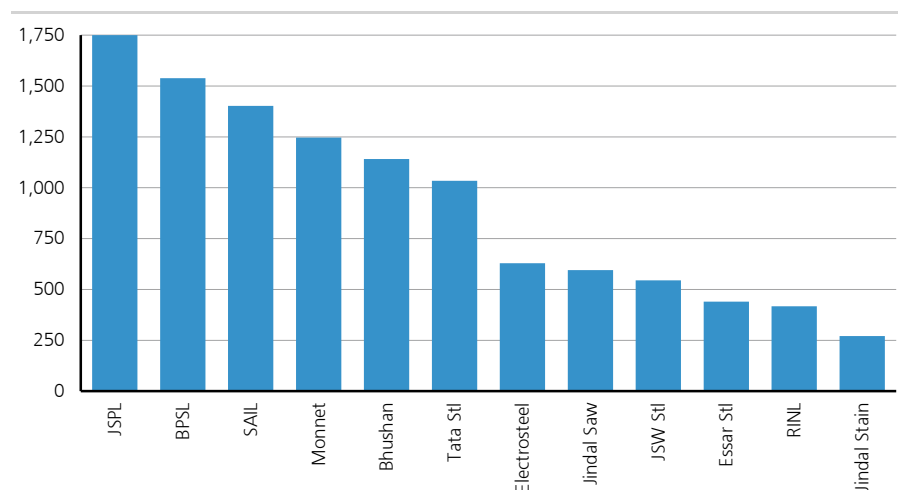
Source: Capitaline

Data indicates a wide variety in capital cost of new capacity over the last 5 years. In the chart below we show our calculation of the capex/t in the last 5 years. It is illustrative only and does not strictly compare like with like or show all the realities on the ground. So SAIL is not the highest but c.\$1400/t for brownfield capacity addition is high relative to the industry rule of thumb of \$1000/t for greenfield. Jindal Saw and Jindal Stainless are mainly downstream not integrated producers.

Range of efficiency in capex spend in the industry is evident

Tata Steel appears broadly in-line with the industry "average", we view JSW Steel's figures bear out the company's assertion that it is one of the most efficient companies in the industry in terms of both operational efficiency and capital use. JSPL looks high, although we note the company has invested in its downstream network and in augmentation of its existing plants.

Figure 16: Capex/t (USD) snapshot* FY10-15



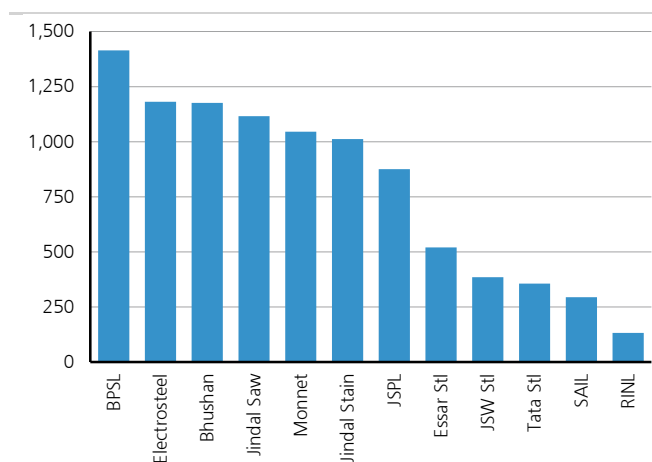
Source: Capitaline; Please read 'BPSL' as Bhushan Power & Steel, 'Monnet' as 'Monnet Ispat', 'Bhushan' as Bhushan Steel; * - based on FY15 net debt (consolidated) for top 10 FY15 net debt. Tata Steel India only and includes FY16 growth capex guidance to account for commissioning of Kalinganagar plant; JSPL is India only and capex is reduced by UBS estimates of 25% to account for investment in other areas like captive power, pellets etc

Debt servicing ability very different

Fundamentally the ability of companies to service debts is driven by the cash-generating potential of their assets. Again we see a wide variety in this across the Indian steel industry. The following chart shows debt/t for the most indebted companies in the Indian Steel industry in absolute terms. We believe the 4 covered companies are more favourably positioned than the rest in terms of debt/t which implies a lower future burden per unit of cash generating assets. For Jindal Steel and Power debt/t of steel does not necessarily reflect the whole burden (JSPL has also taken on debt from expansion in power and in its overseas business in Oman). SAIL is surprisingly low in terms of debt/t (given the relatively high cost of its expansion), although it reflects the fact that the capex expansion programme started when the company was in a strong net cash position. Interest/t effectively shows the "inverse" – ie the significant burden on the current asset base in terms of meeting the current debt obligations.

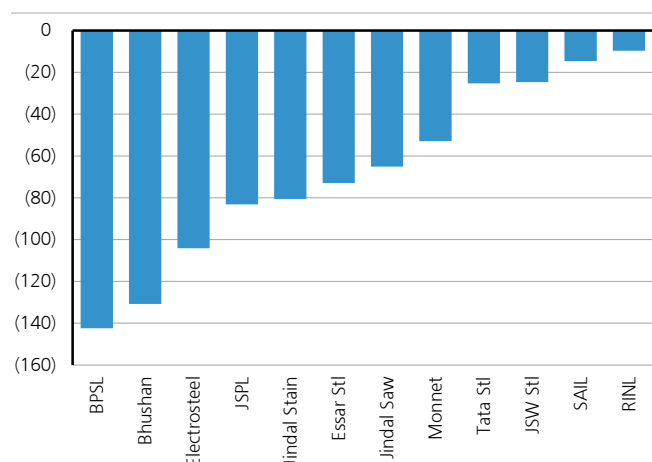
Low debt/t implies greater ability to service debts in the future

Figure 17: Net debt/t (USD) snapshot* FY15



Source: Company data, UBS; * - based on FY15 net debt (consolidated) for top 10 FY15 net debt. We assume Tata Steel and JSW capacity expansion completes in FY16 and add in FY16 growth capex to net debt; SAIL we assume expansion completes over next 2 years and add in associated capex; JSPL is standalone only.

Figure 18: Interest/t (USD) snapshot* FY15



Source: Company data, UBS; * - based on FY15 net debt (consolidated) for top 10 FY15 net debt. JSPL is India only; SAIL we use FY17e interest (higher than FY15) to reflect higher burden from final stage capex

There is also a wide difference in the level of financial support. We believe the ability of promoter groups to support the business via capital injections is likely to be another important differentiator going forward. We show the main promoter for each of the companies in our sample in the Appendix to this note.

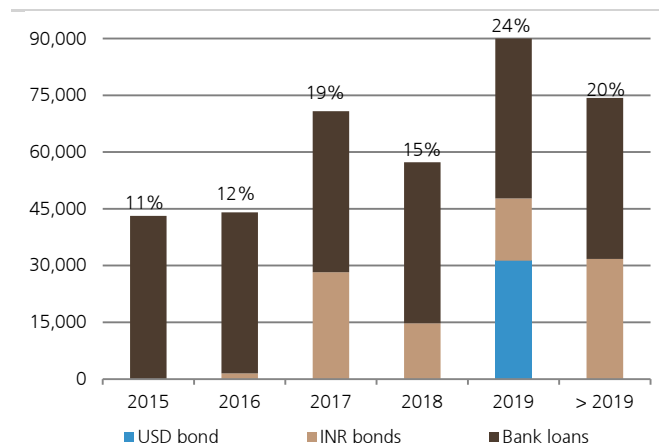
Financial strength of promoter groups is also key in our view, albeit hard to assess

We express no view on the relative likelihood of promoter support. However we believe there are some obviously better positioned companies. For example SOEs such as SAIL, RINL and Neelachal Ispat have the implied support of the Government of India (a factor which we also understand is incorporated by the ratings agencies). Uttam Galva is 30% owned by Arcelor Mittal, while L&T special steels is promoted by the L&T group. Tata Steel has consistently demonstrated an ability to liquidate non-core assets and Tata Group cross-holdings to reduce its debt. JSPL has a similar strategy of selling assets to reduce debt, but we view this as less likely: according to the company, its favoured route is an IPO of Jindal Power and the Oman steel business, which we believe is difficult given market conditions in those segments and a uncertainty in Indian primary markets.

A lack of pressure from lenders can also be an important differentiator in our view. For Tata Steel and JSW Steel, we are comfortable that the repayment schedule for the next 5 years is well spread and achievable. We do not cover the debt of JSPL, but note that term loans and debentures (representing 70% of FY15 gross long and short term debt) do not have material repayment commitments until FY19. For SAIL there is not the appropriate level of disclosure, but the debentures mostly with expiry after FY19 represent over 75% of gross debt.

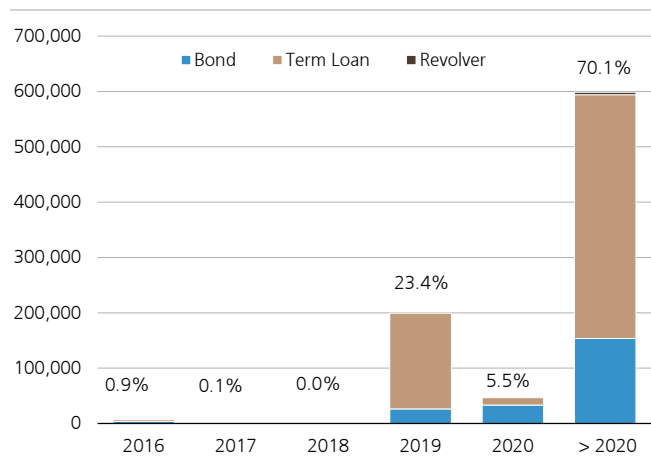
Favourable repayment schedules at covered steel companies

Figure 19: JSW debt repayment schedule (Rs mn)



Source: Company data; UBS estimates

Figure 20: Tata Steel debt repayment schedule (Rs.m)



Source: Bloomberg

Both JSW and JSPL have benefitted from extensions from lenders in recent months when covenants have come under pressure: JSW stated on its Q2 conference call that it had received a relaxation on covenants with no additional rate of interest.; JSPL stated on its Q1 conference call that there were no profitability-based covenants and no breaches of its FACR (fixed asset coverage ratio)-based measures. SAIL benefits from the implied support of the government of India, its 75% majority owner.

Evidence of supportive lenders at covered companies – no immediate covenant pressure

Figure 21: Covered Companies financing summary

	Financing comment	Covenant comment
Tata Steel	H214 refinancing. c.\$7b comprised of \$1.5b of 5-7 year bonds (\$500m at 4.85% coupon and \$1000m at 5.95% coupon) as loan); UK: no maintenance covenants but a cap on well a multi-currency (mainly Euro and GBP) loan facility across capex; Group: wants investment grade credit rating in group entities, also with 5-7 year maturities.	Standalone: 3x debt:equity (under most recent INR 3-4 years, which implies 2-2.5x net debt EBITDA.
JSW Steel	Q315 JSW refinanced part of its rupee debt with \$500m bonds at a 4.75% coupon rate, which will benefit the blended cost of debt going forward. No further immediate refinancing to maintain minimum liquidity (cash, short-term requirements other than the general debt servicing.	Covenants at 3.75x net debt:EBITDA and 1.75x debt: equity at standalone. No consolidated covenants. Aims to maintain minimum liquidity (cash, short-term investments, facilities) of 20b INR (c.\$320m).
JSPL	In August 2014 the company stated it wanted to refinance its high cost debt into dollar-denominated loans, although there has been no apparent further progress on this.	Vary by instrument. Current leverage levels of c.7x net debt:EBITDA and no breach imply generous terms, although there was a "small breach" in FY14 according to the company.
SAIL	Domestic debt is mainly privately placed debentures and we expect this to have increased during FY15 (as per the strategy laid out in the FY14 Annual Report).	Not disclosed. Last ratings agency report indicated "significant headroom" to covenants. Government majority stake.

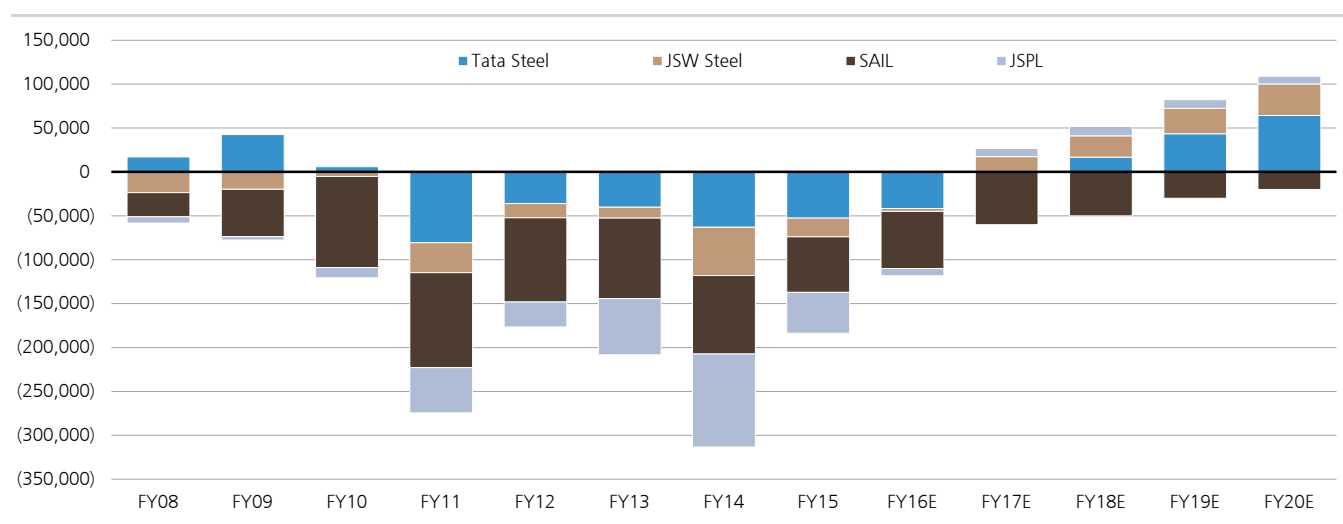
Source: Company data; UBS estimates; press

Positive FCF in sight for large companies, not the tail

We are convinced that net debt is peaking and free cash-flow is turning in FY16/FY17 for Tata Steel and JSW Steel. A swing to positive free cash-flow after 5 years+ of declines is a meaningful positive event for balance sheets and hence equity investors in our view. We believe their lower leverage ratios and faster-reducing capex makes meaningful deleveraging more likely than for SAIL and JSPL. JSPL suffers relatively from its need to monetise assets (such as the power business, Oman steel plant) in difficult capital and commodities markets. SAIL suffers from its need to spend elevated levels of capex for another 2 years in order to complete long-running expansion projects.

FCF at a turning point for Tata Steel and JSW in particular

Figure 22: FCF forecast by company (Rs mn)



Source: Company data, UBS estimates

But the situation for the wider steel is less favourable in our view. While many of the wider steel industry participants are listed, they are often small and illiquid with limited disclosure and analyst coverage. To get round this lack of transparency and to build a view of how the wider industry might develop, we built an aggregate industry model (see Figure 24 below) for the small/mid-sized companies and tested the cash-flow and balance sheet implications under different steel market assumptions.

We wanted to see what the industry "tail" needs to improve balance sheets

In-terms of our key assumptions:

- We aggregated the 28 companies in our 32 company sample, excluding the 4 that we formally cover and built a model for this group using industry and published financial statement data.
- Note the lower average realisations over the last 5 years (c.Rs.25,000-28,000/t) vs covered companies at c.Rs.40,000-43,000/t) are consistent with the smaller industry companies being focused on long products (with lower prices) or semis and other steel inputs (pig iron/pellets/sponge iron). Looking forward, in our base case we assume spot prices stabilise for the rest of FY16 and FY17 (as we have seen in October and November) and then recover gradually. We extend this further for our upside scenario (consistent with a strong infrastructure market and good demand levels). In our downside scenario we assume a 10% stepdown across Q3/Q4 FY16 and no subsequent recovery.

- Our volume assumptions are consistent with our mid-single-digit Indian steel industry consumption assumptions outlined in our initiation note. Even in our downside scenario we believe that some volume growth is reasonable given the UBS view of relatively healthy long-term growth prospects for the Indian steel industry and this group of companies' focus on long products.
- We also note the fact that capex in this group of companies has already fallen substantially as some projects complete and also in response to building pressure from balance sheets. Our base case assumption is broadly consistent with a rule of thumb of \$10-20/t of maintenance capex. We assume some growth capex in our upside scenario and more aggressive cuts, likely involving some permanent shutdowns, in our downside scenario.

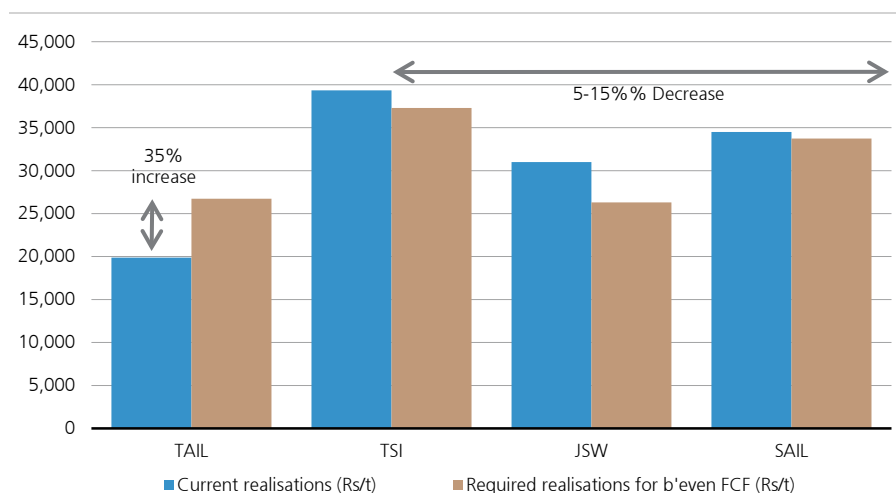
Only in our upside scenario is there a meaningful deleveraging, with improving interest cover and FCF swinging to positive levels. Our base case scenario points to the status quo continuing (no meaningful deleveraging in the short/medium term and pressure on interest cover ratios). Our downside scenario would clearly imply significant further balance sheet stress on this group of companies.

To put all this in context:

We then calculate the implied realisations needed for the industry "tail" to reach break-even free cash flow. We estimate they would need a 35% increase (from FY16e average levels) to achieve this, which is unrealistic in depressed steel markets. We believe this points to further debt restructuring and potentially industry consolidation as the most likely means to resolve these issues. Conversely of the covered companies where this analysis is possible, we believe break-even free cash-flow is possible even if realisations fall 5-15% from current depressed levels.

Back-calculating suggests the tail needs materially higher realisations for break-even free cash-flow

Figure 23: Implied realisations to hit break even free cash-flow on 3 year view



Source: UBS estimates; India operations only; data not available for JSPL

We think this illustrates our view that the larger listed steel companies under our coverage are relatively better positioned from both a balance sheet and an industry perspective. We are wary of the risks of a disruptive "tail" in terms of desperate or irrational behaviour, however we also note that the divergence in balance sheet, pricing and profitability is by no means new and has not disrupted the industry materially so far.

Analysis supports our view of larger listed companies generally being much better positioned.

Figure 24: Indian steel industry (small/mid-sized companies) financial model

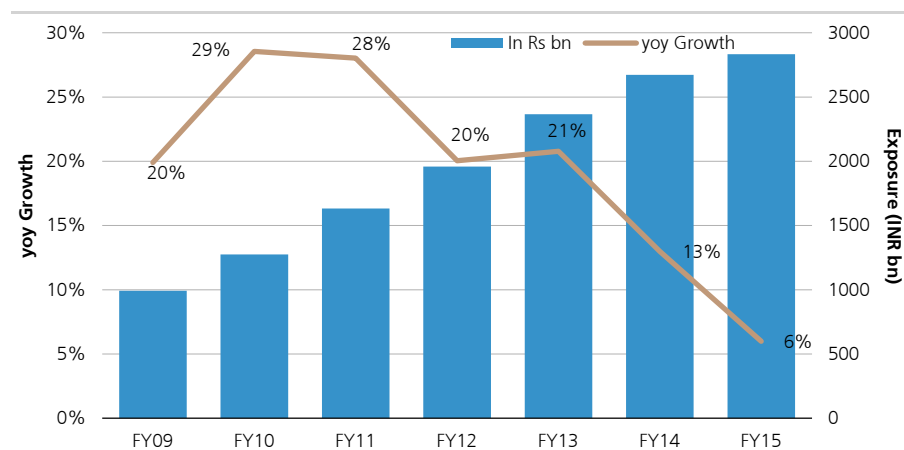
BASE	FY11	FY12	FY13	FY14	FY15	FY16e	FY17e	FY18e	FY19e	FY20e
Volume (mt)	36.7	42.3	47.3	47.4	49.2	53.4	56.6	60.7	66.2	72.5
Growth (%)	n/a	15%	12%	0%	4%	9%	6%	7%	9%	9%
Realisations (Rs/t)	26,527	27,950	26,307	25,964	25,394	19,877	17,872	18,819	19,809	20,846
Growth (%)	n/a	5%	-6%	-1%	-2%	-22%	-10%	5%	5%	5%
EBITDA _{at} (Rs)	3,689	3,293	2,951	2,652	2,665	1,789	1,787	2,070	2,377	2,710
Margin (%)	13.9%	11.8%	11.2%	10.2%	10.5%	9.0%	10.0%	11.0%	12.0%	13.0%
EBITDA Adj (Rs.m)	135,317	139,367	139,605	125,788	131,203	95,606	101,157	125,695	157,381	196,439
Capex (Rs.m)	-304,367	-286,160	-275,971	-217,648	-166,220	-80,000	-80,000	-80,000	-80,000	-80,000
Capex % sales	31%	24%	22%	18%	13%	8%	8%	7%	6%	5%
Interest (Rs.m)	-80,229	-130,652	-150,986	-176,880	-198,252	-188,211	-190,118	-190,350	-187,265	-180,448
Cash cost of debt	-8%	-10%	-9%	-9%	-10%	-9%	-9%	-8%	-8%	-7%
Other CF (Rs.m)	-65,665	27,902	-42,124	54,821	82,804	37,933	38,211	39,438	41,022	41,376
FCF (Rs.m)	-314,944	-249,543	-329,476	-213,918	-150,465	-134,672	-130,750	-105,218	-68,863	-22,633
Interest cover (x)	1.9	1.2	1.1	1.0	1.0	0.7	0.7	0.8	1.0	1.3
Net debt (Rs.m)	1,008,034	1,330,938	1,715,637	1,928,144	2,008,199	2,142,871	2,273,621	2,378,839	2,447,702	2,470,335
Net debt:EBITDA (x)	7.4	9.5	12.3	15.3	15.3	22.4	22.5	18.9	15.6	12.6
UPSIDE	FY11	FY12	FY13	FY14	FY15	FY16e	FY17e	FY18e	FY19e	FY20e
Volume (mt)	36.7	42.3	47.3	47.4	49.2	53.7	59.2	66.0	74.6	84.5
Growth (%)	n/a	15%	12%	0%	4%	9%	10%	11%	13%	13%
Realisations (Rs/t)	26,527	27,950	26,307	25,964	25,394	20,602	21,057	22,302	23,609	24,982
Growth (%)	n/a	5%	-6%	-1%	-2%	-19%	2%	6%	6%	6%
EBITDA _{at} (Rs)	3,689	3,293	2,951	2,652	2,665	2,162	2,526	3,009	3,540	4,120
Margin (%)	13.9%	11.8%	11.2%	10.2%	10.5%	10.5%	12.0%	13.5%	15.0%	16.5%
EBITDA Adj (Rs.m)	135,317	139,367	139,605	125,788	131,203	116,192	149,445	198,490	263,915	347,976
Capex (Rs.m)	-304,367	-286,160	-275,971	-217,648	-166,220	-80,000	-85,000	-90,000	-95,000	-100,000
Capex % sales	31%	24%	22%	18%	13%	7%	7%	6%	5%	5%
Interest (Rs.m)	-80,229	-130,652	-150,986	-176,880	-198,252	-188,211	-191,142	-191,142	-191,142	-191,142
Cash cost of debt	-8%	-10%	-9%	-9%	-10%	-9%	-9%	-8%	-8%	-7%
Other CF (Rs.m)	-65,665	27,902	-42,124	54,821	82,804	5,810	23,778	25,495	22,224	18,021
FCF (Rs.m)	-314,944	-249,543	-329,476	-213,918	-150,465	-146,210	-102,919	-57,157	-3	74,856
Interest cover (x)	1.9	1.2	1.1	1.0	1.0	0.6	0.8	1.0	1.4	1.8
Net debt (Rs.m)	1,008,034	1,330,938	1,715,637	1,928,144	2,008,199	2,154,409	2,257,328	2,314,484	2,314,487	2,239,631
Net debt:EBITDA (x)	7.4	9.5	12.3	15.3	15.3	18.5	15.1	11.7	8.8	6.4
DOWNSIDE	FY11	FY12	FY13	FY14	FY15	FY16e	FY17e	FY18e	FY19e	FY20e
Volume (mt)	36.7	42.3	47.3	47.4	49.2	51.7	52.5	54.0	56.6	59.6
Growth (%)	n/a	15%	12%	0%	4%	5%	2%	3%	5%	5%
Realisations (Rs/t)	26,527	27,950	26,307	25,964	25,394	18,864	15,715	15,715	15,715	15,715
Growth (%)	n/a	5%	-6%	-1%	-2%	-26%	-17%	0%	0%	0%
EBITDA _{at} (Rs)	3,689	3,293	2,951	2,652	2,665	1,320	1,179	1,257	1,336	1,414
Margin (%)	13.9%	11.8%	11.2%	10.2%	10.5%	7.0%	7.5%	8.0%	8.5%	9.0%
EBITDA Adj (Rs.m)	135,317	139,367	139,605	125,788	131,203	68,212	61,860	67,878	75,542	84,252
Capex (Rs.m)	-304,367	-286,160	-275,971	-217,648	-166,220	-80,000	-60,000	-60,000	-60,000	-60,000
Capex % sales	31%	24%	22%	18%	13%	8%	7%	7%	7%	6%
Interest (Rs.m)	-80,229	-130,652	-150,986	-176,880	-198,252	-188,211	-192,366	-192,366	-192,366	-192,366
Cash cost of debt	-8%	-10%	-9%	-9%	-10%	-9%	-9%	-8%	-8%	-7%
Other CF (Rs.m)	-65,665	27,902	-42,124	54,821	82,804	39,987	39,669	39,970	40,354	40,789
FCF (Rs.m)	-314,944	-249,543	-329,476	-213,918	-150,465	-160,012	-150,837	-144,519	-136,471	-127,326
Interest cover (x)	1.9	1.2	1.1	1.0	1.0	0.4	0.3	0.4	0.4	0.4
Net debt (Rs.m)	1,008,034	1,330,938	1,715,637	1,928,144	2,008,199	2,168,211	2,319,048	2,463,566	2,600,038	2,727,363
Net debt:EBITDA (x)	7.4	9.5	12.3	15.3	15.3	31.8	37.5	36.3	34.4	32.4

Source: Capitaline; JPC; UBS estimates. Note interest cover is cash interest vs EBITDA; Other incorporates tax and other income and working capital (which we assume is neutral in our base case, an inflow in our downside case and an outflow in our upside case).

Further risk to bank balance sheets

Unsurprisingly, Indian banks' exposure to the steel sector has steadily increased, though growth decelerated in FY15.

Figure 25: Indian banking exposure/growth to Iron & Steel Sector

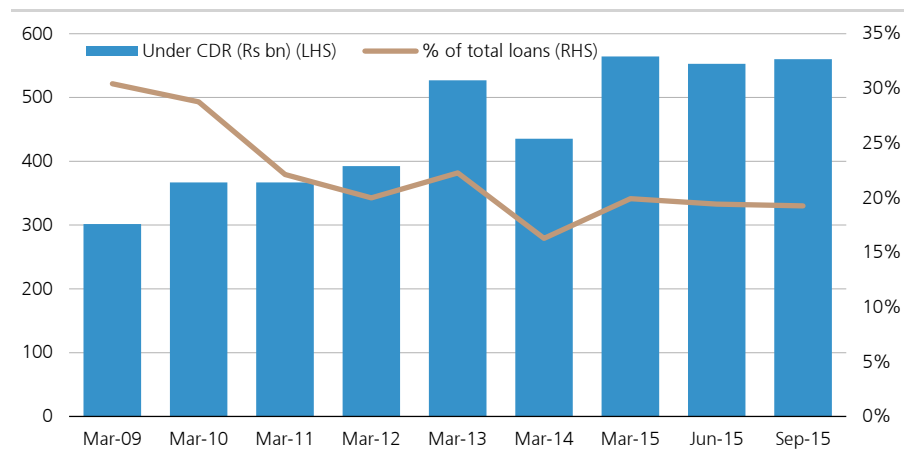


Source: RBI data

We make the following observations:

- On aggregate, Indian banks have around 4.8% of exposure to the Iron and Steel sector.
- Around one fourth of Steel exposure is either NPL or restructured already in our view, as evidenced by data from the RBI and Corporate Debt Restructuring Cell (CDR). However, bilateral restructuring done by banks is not captured in these numbers. Around 7.5% of Steel exposure has already become NPL as of March 2015.
- Companies with around one third of steel debt (roughly 1.7% of sector loans) had applied for refinancing under the RBI 5-25 scheme and are in various stages of approval, as per our estimates.
- Apart from the above, around one fifth of companies (including govt. owned) are unable to cover interest expense from operating profits or Debt to EBITDA of >10x.

Figure 26: India banking Iron and Steel CDR cases



Source: RBI data

In terms of which steel companies have already undergone restructuring or entered 5/25, it is difficult to get reliable data. We conducted a search of the 10-largest non-covered companies by FY15 gross debt in the reputable press to look for company-wise restructuring newsflow.

Figure 27: Debt restructuring measures – top 10 non-covered companies by FY15 gross debt

Company	Gross debt (Rs.m FY15)	Debt reduction measures	Source
Bhushan Steel	390,787	Rs.300b "5/25" debt restructuring approved in July 2015; sale and leaseback for some assets; further measures pending	CNBC; company data
Essar Steel	349,287	HDCF already classified position as bad; Project lending been placed under 5/25; Essar group seeking to monetize assets (Essar Oil); promoter infusion	Business Standard, Bloomberg, Livemint
Bhushan Power and Steel	293,504	Rs.350b "5/25" debt restructuring approved in June; sale and leaseback of some assets; additional loans provided in Q1	Financial Express
Monnet Ispat	124,997	Company to issue equity to lenders under strategic debt restructuring scheme (SDR), announced in October	Livemint; company data
Jindal Stain.	108,020	Group restructuring approved September 2015 based on "slump sale" of assets	Financial Express; company data
Electrosteel St.	102,351	Company to issue equity to lenders under strategic debt restructuring scheme (SDR), announced in July. Looking at asset sales.	Financial Express; company data
PSL	50,136	Debt restructuring discussed with lenders in 2013 in response to gas market conditions.	Reuters
Uttam Galva	37,504	Bankers cleared 5:25 refinancing in mid-2015. Co is 30% owned by Arcelor Mittal	Indian Express
Jai Balaji Inds.	30,765	Restructuring based on tenure extension and rate reduction announced in 2012	Hindu Business Line
Welspun	30,206	Restructuring under CDR scheme in 2014 and subsequent asset sales. Lenders pushing a disposal of power assets.	Economic Times

Source: Capital Line; Press; UBS estimates. Note no apparent debt restructuring undertaken at Jindal Saw, RINL, Adhunik, Usha Martin – all of which are in top 10 gross debt as reported in statutory accounts for FY15

How will this develop?

As we show above, while high leverage is an issue across the steel sector, the longer "tail" of companies has deeper rooted issues in terms of debt-servicing ability. Fundamentally they require a much more positive steel price environment to reduce leverage ratios and improve interest cover than we believe is likely on a short/medium-term view. Again note that we refer to the tail of 28 companies in aggregate and note the range of exposures, risks and profitability. Nonetheless we think it suggests that asset quality concerns from the steel industry are likely to be an issue for the banking sector for some time to come.

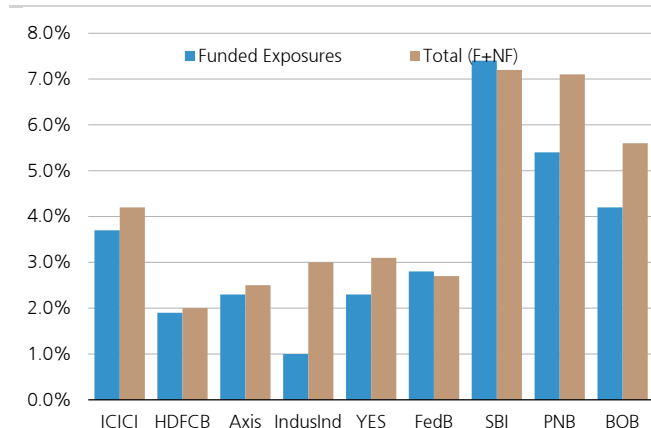
Within the 28 companies we identified a subgroup of the 12 largest companies which have P&L interest cover of <1x as of Q2 FY16 or Debt to EBITDA >10x. These represent 57% of FY15 gross debt. To try and pin down bank-wise risk is difficult given lack of exposure. We took a 2-pronged approach.

We used loan approvals data collected from Ministry of Corporate Affairs (MCA) and Reuters for this group. Please note loan approvals are the best proxy we have to analyse debt profile and may not equal to current outstanding exposures. Similarly Reuters data only had about 70% aggregate cover of our sample.

- At an aggregate level, SBI and PNB have around 7% exposure (funded + non-funded facilities) to the Iron and Steel sector, while HDFC Bank, AXIS and IndusInd have exposures of around 2-3%.

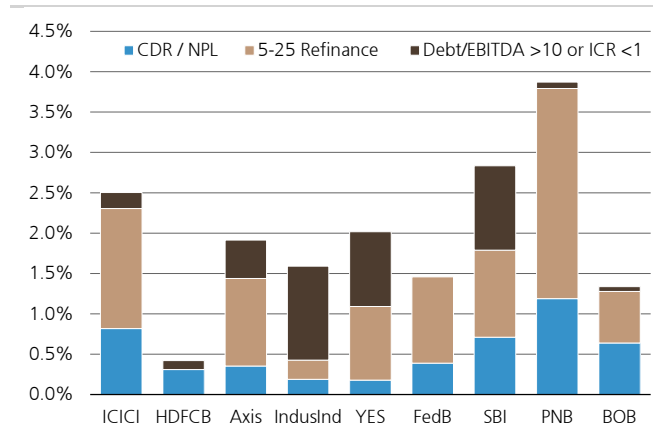
- Among the companies analysed by us, YES, SBI, IndusInd have more than 1% of loans approved to Iron and steel companies which are not NPL or restructured so far but have less than 1x Interest coverage ratio or Debt to EBITDA of >10x. For SBI and IndusInd 70-100% of this above exposure is towards state owned entities as per our estimates.
- PNB and ICICI seems to have 2.5% and 1.5% of loans under 5-25 refinancing as per our estimates.

Figure 28: Exposure to Iron and Steel Industry (as a % of loans)



Source: Company data; % figures are as a % of respective portion e.g. Funded as % of Total Funded

Figure 29: Est. loan approvals to large leveraged steel companies (as a % of loans)



Source: Company data, Registrar of Companies (India); ICR is Interest Coverage Ratio

WHAT'S PRICED IN?

[return](#) ↑

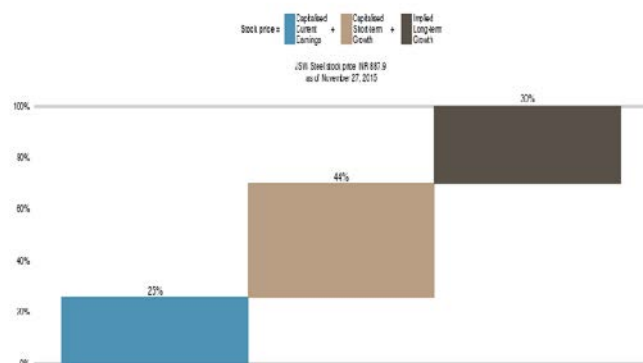
Residual income model

As we show in our charts below, the current share price is factoring in some future growth in all 4 companies. We note this is considerably less in Tata Steel and JSW Steel, our preferred plays in the industry, than SAIL and JSPL.

Note that we have used a very conservative discount rate of 15%, which we believe is consistent with a risk premium investors would look for in a high-beta sector seeing considerable current earnings pressures.

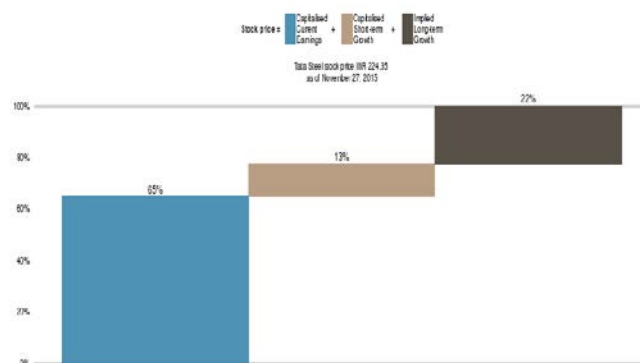
Several factors make this analysis problematic and should be taken in mind. We note the wide range in consensus expectations for cyclical stocks and the limited contributions in forward years. Currently highly depressed levels of profitability make a low base which skews the implied future growth rates. Finally we note that share prices also take account of future deleveraging which might not be fully captured in the residual income method.

Figure 30: What's Priced In – JSW Steel



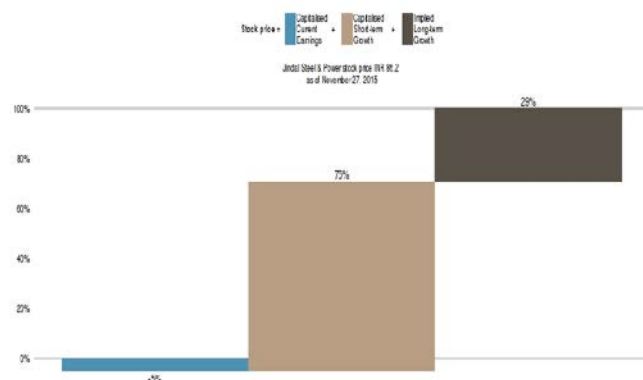
Source: UBS calculations, Thomson Reuters Consensus

Figure 31: What's Priced In – Tata Steel



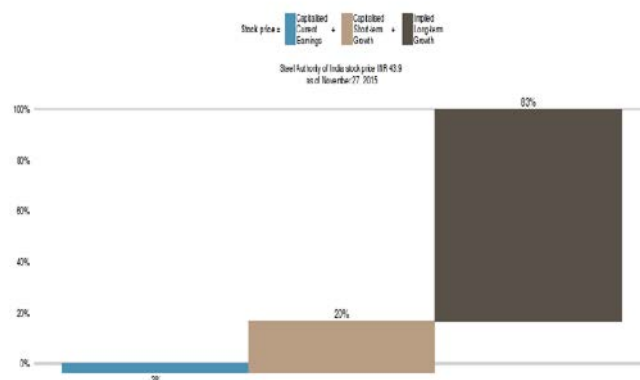
Source: UBS Calculations, Thomson Reuters Consensus

Figure 32: What's Priced In – JSPL



Source: UBS calculations, Thomson Reuters

Figure 33: What's Priced In – SAIL



Source: UBS calculations, Thomson Reuters

What steel price is implied...?

This is an important question for investors in steel, but it is also difficult to answer conclusively. Multiple factors drive valuations: cyclical outlook, raw materials costs which can also be volatile and driven by external factors, as well as balance sheet leverage. To tackle this question, we have adopted a 2-stage approach.

What steel price is implied in the share price is a difficult, but important question

Stage 1: assess cash-generation scenarios on 2-3 year view

We assess mid-term (c. 2-3 year) cash-flow-generation potential of each business under different scenarios, based on EBITDA/t and volume assumptions for the main business segments.

The detailed assumptions are shown in the Company Notes. Assumptions are obviously sensitive, especially in the downside scenario due to financial leverage.

Figure 34: Profitability and cash flow scenarios summary

Tata Steel	FY11-15	FY16e	BASE	UPSIDE	DOWNSIDE	Comment
Europe volume (mt)	13.9	13.3	13.3	13.9	13.3	
Europe EBITDA/t (Rs)	2,007	255	3,000	4,000	2,000	Detailed assumptions are in appendix. This excludes SEA and Kalinganagar.
India steel volume	7.6	8.9	9.0	9.0	8.8	
India steel EBITDA/t (Rs)	15,328	9,060	9,000	11,000	7,000	
EBITDA (Rs.m)	146,650	98,655	157,385	205,916	102,407	
Implied CAGR	n/a	n/a	21%	34%	2%	On a 2.5 year basis from FY16
Implied Upgrade/(downgrade)	n/a	n/a	n/a	31%	-35%	Vs our base case
FCF (Rs.m)	-48,752	-41,671	29,280	45,349	12,717	Post capex. Detailed assumptions in appendix
JSW Steel	FY11-15	FY16e	BASE	UPSIDE	DOWNSIDE	Comment
India steel volume (mt)	9.3	12.9	13.5	15.3	11.7	
India steel EBITDA/t (Rs)	7,417	5,713	6,500	8,000	5,000	Detailed assumptions are in appendix. This shows standalone only.
EBITDA (Rs.m)	72,083	79,561	93,750	131,400	58,500	
Implied CAGR	n/a	n/a	7%	22%	-12%	On a 2.5 year basis from FY16
Implied Upgrade/(downgrade)	n/a	n/a	n/a	40%	-38%	Vs our base case
FCF (Rs.m)	-27,848	-3,323	29,893	41,928	13,775	Post capex. Detailed assumptions in appendix
SAIL	FY11-15	FY16e	BASE	UPSIDE	DOWNSIDE	Comment
India steel volume (mt)	11.7	11.5	14.7	16.8	13.7	
India steel EBITDA/t (Rs)	4,816	246	4,000	6,000	2,500	Detailed assumptions are in appendix.
EBITDA (Rs.m)	56,399	2,817	58,800	100,800	34,125	
Implied CAGR	n/a	n/a	237%	318%	171%	On a 2.5 year basis from FY16
Implied Upgrade/(downgrade)	n/a	n/a	n/a	71%	-42%	Vs our base case
FCF (Rs.m)	-55,016	-88,196	12,819	42,841	2,386	Post capex. Detailed assumptions in appendix

Source: Company data; UBS estimates; we use a slightly different methodology for JSPL due to lack of disclosure (see Appendix)

Stage 2: back calculate a steel price

We then work back from the EBITDA/t assumptions in our scenarios to see what kind of steel price is needed to achieve them. We take the observed premium over the last 5 years between market benchmark prices and the companies' average realisations. Using a historical premium is conservative in our view given all 3 companies' stated strategy of moving up the value chain. However offsetting this it is not unrealistic to assume premiums compress given the difficult and competitive market environment. We assume 10% reduction in costs (raw material and other) in our base case and 20% in our downside scenario. This reflects the linked relationship between iron ore/coal prices and steel. The one exception is Tata Steel Europe where we assume 15% and 25% cost reductions respectively, given recently initiated actions in the UK in particular.

Results are detailed below. In a nutshell, our base case assumes no recovery vs current spot in the mid-term (ie would not preclude a further dip and subsequent recovery). Our downside scenario assumes a c.15% structural move down in market benchmark prices from current levels.

Figure 35: Back calculating a steel price under different scenarios (Rs./t)

Base case	TS India		TS Europe		JSW India		SAIL	
Rs./t	FY16e	Mid-term	FY16e	Mid-term	FY16e	Mid-term	FY16e	Mid-term
Spot price*	27,750	27,750	23,400	23,400	27,750	27,750	27,750	27,750
Implied price vs spot	13%	3%	9%	-1%	2%	-4%	13%	14%
Implied steel price	31,316	28,687	25,485	23,054	28,182	26,599	31,364	31,663
Premium (Rs.)	9,395	8,606	25,485	23,054	2,818	2,660	3,136	3,166
%	30%	30%	100%	100%	10%	10%	10%	10%
Average realisations	40,710	37,293	50,969	46,107	31,000	29,258	34,500	34,829
EBITDA	9,060	8,807	255	3,000	5,713	6,500	246	4,000
Raw material/t	11,078	9,970	23,801	20,230	16,882	15,194	13,509	12,158
Other cost/t	20,573	18,516	26,914	22,877	8,405	7,565	20,745	18,671
Implied margin	22%	24%	1%	7%	18%	22%	1%	11%
Downside case	TS India		TS Europe		JSW India		SAIL	
Rs./t	FY16e	Mid-term	FY16e	Mid-term	FY16e	Mid-term	FY16e	Mid-term
Spot price*	27,750	27,750	23,400	23,400	27,750	27,750	27,750	27,750
Implied price vs spot	13%	-10%	9%	-14%	2%	-17%	13%	-2%
Implied steel price	31,316	24,862	25,485	20,018	28,182	22,936	31,364	27,185
Premium	9,395	7,459	25,485	20,018	2,818	2,294	3,136	2,718
%	30%	30%	100%	100%	10%	10%	10%	10%
Average realisations	40,710	32,321	50,969	40,036	31,000	25,230	34,500	29,903
EBITDA	9,060	7,000	255	2,000	5,713	5,000	246	2,500
Raw material/t	11,078	8,862	23,801	17,850	16,882	13,506	13,509	10,807
Other cost/t	20,573	16,458	26,914	20,185	8,405	6,724	20,745	16,596
Implied margin	22%	22%	1%	5%	18%	20%	1%	8%
Upside case	TS India		TS Europe		JSW India		SAIL	
Rs./t	FY16e	Mid-term	FY16e	Mid-term	FY16e	Mid-term	FY16e	Mid-term
Spot price*	27,750	27,750	23,400	23,400	27,750	27,750	27,750	27,750
Implied price vs spot	13%	18%	9%	6%	2%	9%	13%	32%
Implied steel price	31,316	32,808	25,485	24,821	28,182	30,261	31,364	36,595
Premium	9,395	9,842	25,485	24,821	2,818	3,026	3,136	3,659
%	30%	30%	100%	100%	10%	10%	10%	10%
Average realisations	40,710	42,651	50,969	49,643	31,000	33,287	34,500	40,254
EBITDA	9,060	11,000	255	4,000	5,713	8,000	246	6,000
Raw material/t	11,078	11,078	23,801	21,421	16,882	16,882	13,509	13,509
Other cost/t	20,573	20,573	26,914	24,222	8,405	8,405	20,745	20,745
Implied margin	22%	26%	1%	8%	18%	24%	1%	15%

Source: UBS estimates; Benchmark is domestic HRC for India, import CRC for Europe. Sourced from Metal bulletin

What do multiples tell us?

As we described in our initiation steel tends to re-rate 6-9 months ahead of the inflection point in earnings. We believe there have been signs of re-rating since Q2 of this calendar year. PB multiples are less volatile, but paint a similar picture.

While it is clearly too early to call a trend, re-rating provides some evidence that the market is looking through well-understood issues of pressures on profitability, poor outlook in China and high leverage. With share prices down materially YTD and in some cases close to multi-year lows, we believe this suggests that the turmoil in steel markets in calendar Q2/Q3 is in the price. Obviously for sustained share price recovery the market will need to believe that steel earnings can grow again: as we show with Tata Steel below, 2 year earnings growth expectations have had a good correlation with share price performance.

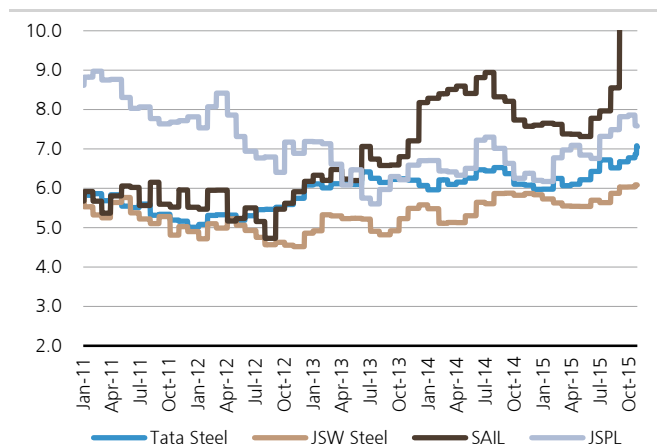
This also makes multiples less useful valuation tools around turning points in the cycle in our view. SAIL for example will make only break-even EBITDA in FY16 on our estimates and has 60% debt/EV today. But we think the market is taking a view on the benefits of implied government support and the long-term potential of the company to service its debts when capacity expansion completes. **Note this drives our change in valuation methodology in this note: we move from a multiples-driven approach to one that looks at sustainable FCF yield.**

Very early signs of re-rating

Weak Q2FY16 was well-expected by the market

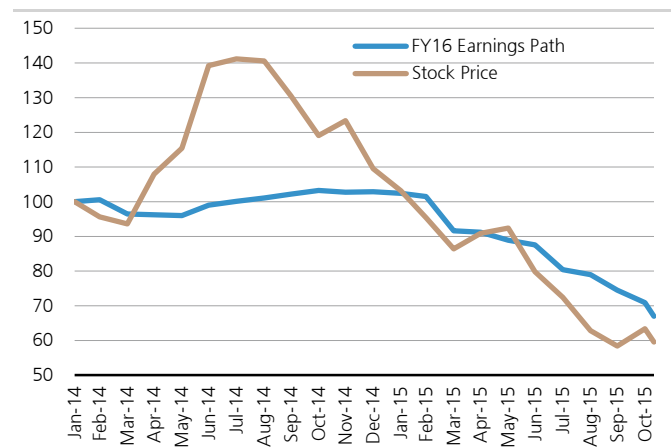
Multiples not the best valuation tool at turning points in the cycle

Figure 36: Historic EV/EBITDA multiples



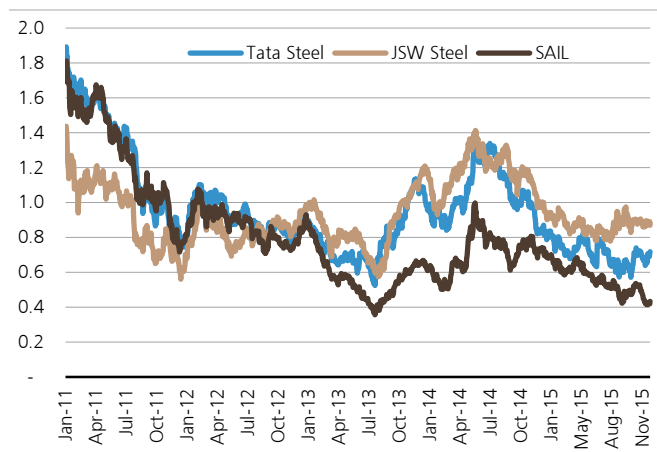
Source: Thomson Financial

Figure 37: Recent rerating – Tata Steel example



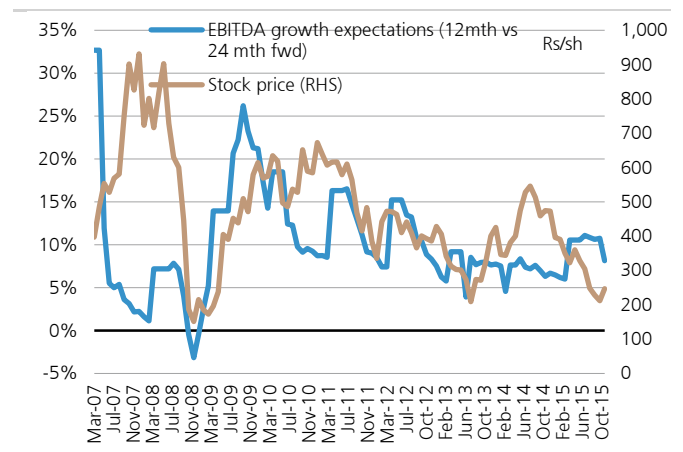
Source: Thomson Financial

Figure 38: Historic PB multiples



Source: Thomson Financial

Figure 39: Tata Steel correlation with earnings growth



Source: Thomson Financial

UPSIDE/DOWNSIDE SKEW

[return](#) ↑

As described above, we move from a multiples-based valuation methodology to using conservative FCF yield of 10% on sustainable FCF (which we think arrives on a 2-3 year view). This eliminates the issue of near-term volatility in earnings and multiples, gets us closer to "fair value" and importantly is consistent with how we think the market is viewing the stocks. **Our price targets, detailed in the company pages of this note attribute 50% to the base case and 25% to the downside and upside respectively. While there is still material potential downside in all cases, we believe Tata Steel has the most attractive risk/reward skew in our view.** All of our detailed company-level assumptions are in the company pages of this note, but in summary:

Base case scenario:

We assume slow recovery from current levels in terms of key drivers. It would be consistent with our generally favourable thesis for India steel coming through, but with external pressures keeping steel prices subdued at or around current levels. For example for Tata Steel we assume India EBITDA/t of Rs.9,000 (FY16E Rs.9060) and for JSW Steel India EBITDA/t of Rs.6,050 (FY16E Rs.5,713). We believe capex would continue to fall towards "maintenance only" in this scenario as growth programmes complete.

We move to a sustainable FCF approach to eliminate short-term earnings/multiple volatility

Base case represents the "status quo"

Downside scenario:

As we have shown above in our discussion of What's Priced In, this scenario would be consistent with another 10-20% fall in steel prices, more limited volume growth consistent with further delays to the Indian recovery and a consequent hit to profitability. We think companies would cut capex more aggressively in this case, which provides a partial offset.

Downside scenario incorporates further risk to pricing

Upside scenario:

This would be consistent with steel prices c.10-20% higher than spot levels. We believe this would need some action from China to reduce steel capacity (there are no signs of this in the short-term, although visibility into this market is limited) or substantial further action from the Indian government in terms of pricing. We believe either of these have the potential to send profitability back to, or close to long-term averages. In this scenario, we think companies would consider further capacity expansion (such as currently postponed phase II projects) so capex would start to increase again.

Upside scenario would need prices to rise, and external intervention to drive this

This approach has the secondary benefit of allowing us to work back from the current share price to see broadly what the market expects in terms of earnings growth. We use the current share price and a 15% yield (more conservative than the 10% under our scenarios to reflect the highly cautious attitude towards steel stocks) to derive an implied free cash-flow needed to justify that valuation. We then set our interest, capex and tax assumptions between our base and downside scenarios, again to reflect the bearish outlook we see in the market, to arrive at an implied EBITDA. In general, the market is pricing in little future growth at JSW Steel/Tata Steel. SAIL shows considerable growth, although we note the low base

effect from FY16E and the impact of new volume coming on stream. The risk/reward is also widest at SAIL, but most compelling at Tata Steel in our view.

Figure 40: Summary of scenarios and "What's priced in?" analysis* (for details; see company sections)

Tata Steel	FY11-15	FY16e	BASE	UPSIDE	DOWNSIDE	WPI*
Consolidated EBITDA (Rs.m)	146,650	98,655	157,385	205,916	102,407	136,181
CAGR (2.5 years)	n/a	n/a	21%	34%	2%	14%
Equity FCF (Rs.m)	-48,752	-41,671	29,280	45,349	12,717	29,586
Equity FCF Yield	n/a	n/a	10%	10%	10%	15%
Equity Value (Rs.m)	n/a	n/a	292,804	453,490	127,169	197,242
Per Share (Rs)	n/a	n/a	328	494	157	230
Upside /(downside)	n/a	n/a	43%	115%	-31%	n/a
JSW Steel	FY11-15	FY16e	BASE	UPSIDE	DOWNSIDE	WPI*
Consolidated EBITDA (Rs.m)	72,083	79,561	93,750	131,400	58,500	88,587
CAGR (2.5 years)	n/a	n/a	7%	22%	-12%	4%
Equity FCF (Rs.m)	-27,848	-3,323	29,893	41,928	13,775	32,750
Equity FCF Yield	n/a	n/a	10%	10%	10%	15%
Equity Value (Rs.m)	n/a	n/a	298,933	419,279	137,748	218,332
Per Share (Rs)	n/a	n/a	1,235	1,733	569	902
Upside /(downside)	n/a	n/a	37%	92%	-37%	n/a
SAIL	FY11-15	FY16e	BASE	UPSIDE	DOWNSIDE	WPI*
Consolidated EBITDA (Rs.m)	56,399	2,817	58,800	100,800	34,125	72,482
CAGR (2.5 years)	n/a	n/a	237%	318%	171%	267%
Equity FCF (Rs.m)	-55,016	-88,196	12,819	42,841	2,386	28,318
Equity FCF Yield	n/a	n/a	10%	10%	10%	15%
Equity Value (Rs.m)	n/a	n/a	128,194	428,415	23,860	188,787
Per Share (Rs)	n/a	n/a	31	104	6	46
Upside /(downside)	n/a	n/a	-32%	127%	-87%	n/a

some earnings recovery priced in, but risk/reward skew attractive

reasonable earnings growth in the price, means less favourable risk / reward

earnings growth skewed by low base and valuation skewed by financial leverage, means a wide range of outcomes

Source: Company data; UBS estimates; * - for detailed calculations please refer to the appendix

Appendix

Figure 41: Description of sampled companies (Rs m)

Company	Status	Main promoter	Brief description	Revenue FY15	EBITDA FY15	Net debt FY15
Tata Steel	Listed	Tata	Covered company (see UBS Research).	1,395,037	125,358	719,514
JSW Steel	Listed	Jindal	Covered company (see UBS Research).	529,715	94,023	360,766
Jindal Steel	Listed	Jindal	Covered company (see UBS Research).	194,007	54,819	443,617
SAIL	Listed	GOI	Covered company (see UBS Research).	458,942	48,433	279,669
Adhunik Metal*	Listed	Agarwal	Alloy, special and construction steel. <1mt of capacity.	11,083	-1,382	41,475
Bhushan Steel	Listed	Singal	C.5mt of capacity. Focus on flat products.	106,458	21,624	389,904
Essar Steel	Private	Ruai	Integrated with 10mt plant at Hazira. Flat steel only.	146,927	17,504	338,317
Godawari Power	Listed	Agrawal	Longs (wires and billets) and sponge. <0.5mt of capacity.	23,950	3,582	19,328
ISMT*	Listed	Taneja	Special engineering steels and tubes. <0.5mt of capacity	15,230	47	41,475
Jai Balaji Inds.	Listed	Jajodia	Mainly sponge but downstream also.	15,057	-346	30,424
Jindal Saw	Listed	Jindal	One of the largest producers of SAW pipes (widely used in the energy sector) in India.	83,247	8,495	79,804
Jindal Stain.*	Listed	Jindal	Largest integrated manufacturer of stainless steel in India (c.2mt of capacity).	69,480	3,684	107,545
Monnet Ispat	Listed	Jajodia	Mainly sponge (second largest in India). Setting up 1.5mt at Raigarh.	32,422	-1,569	122,335
Mukand	Listed	Bajaj	Alloy and stainless steel longs. <1mt of capacity.	30,077	3,486	25,252
OCL Iron & Steel	Listed	Garima Buildprop	Predominantly DRI.	10,438	539	11,952
PSL	Listed	Punj	Pipes. C.1mt of capacity.	2,995	-1,238	49,391
Sarda Energy	Listed	Sarda	Sponge iron, longs and bars.	17,599	3,773	14,708
Sujana Metal Prd	Listed	Chowdary	N/A	39,425	2,601	15,623
Surana Inds.	Listed	Surana	Also has rerolling facilities/bar mills. Plans to add another 1mt of capacity (currently <0.5mt).	6,554	-702	29,313
Usha Martin	Listed	Jhawar	Wire rope and other specialty steels. <1mt of capacity.	45,611	6,163	39,188
Uttam Galva	Listed	Arcelor Mittal (30%)	Reroller. Produces CRC and galvanised. Cooperation with POSCO.	84,325	5,173	35,820
Visa Steel*	Listed	Saran / Agarwal	Long special steel and ferro-chrome. <1mt of capacity.	12,803	-82	30,742
Welspun Corp	Listed	Welspun Group (US)	Rebar, ingots and billet producer.	84,505	8,422	26,878
Asian Colour**	Private	Aggarwal	Reroller. Produces CRC and galvanised.	54,270	4,477	29,882
Bhushan Power**	N/A	Singal	Orissa Plant with c.2mt of capacity. Full range of products. Ltd power exposure. Different to Bhushan Steel.	103,784	32,487	291,744
Electrosteel St.	Listed	Kejriwal	Predominantly longs and pipes with c.2mt of integrated capacity.	18,312	129	99,818
L&T Spl. Steels**	Private	L&T	Forgings only.	649	-1,181	14,727
Neelachal Ispat**	Private	GOI	Integrated plant at Kalinganagar with c.1mt of capacity.	15,498	479	18,162
Ramsarup Inds.	Listed	Jhunjhunwala	Mainly billets/wires in steel, but predominantly a power and infrastructure co.	44	-60	20,082
Rashtriya Ispat**	Private	GOI	Recently expanded to c.6mt. Predominantly long products.	120,283	8,508	49,137
Uttam Value Ste.	Listed	Miglani	Integrated complex (Wardha). C1mt of capacity.	50,718	2,883	13,045
Viraj Profiles**	Private	Kochhar	Stainless steel long products. <1mt of capacity.	48,592	3,705	22,131

Source: Company data; UBS estimates; Capitaline; * - standalone financial data only for FY14; ** - FY14 consolidated data only. GOI = Government of India

Tata Steel

Risk reward favourable; despite Europe

What's our view

The India business is performing well in tough markets, but Europe and the balance sheet are a drag on numbers and sentiment. India realisations are holding up well in the context of a difficult market, volume growth is strong and the ramp-up of THE Kalinganagar plant appears (more or less) on track. Europe had a very disappointing Q2 and the market outlook in the UK in particular is poor. We believe Tata Steel needs to show quick results from restructuring of UK strip products to reassure the market. We believe debt has peaked and FCF/leverage improves markedly from FY17E.

Key long-term and short-term drivers

We note the positive announcement on the [pension deficit](#) in October was largely overlooked given its implications for leverage and valuation. We view Q3 will be another tough quarter with minimal restructuring benefit in Europe until Q4. We think the market would react well to a sale of the UK long products business (possible in FY16, according to *Economic Times*) or a more drastic restructuring or sale of the UK flat products business. More generally we view Tata Steel will be sensitive to news around its balance sheet (capex guidance, further refinancing) and macro trends in the India economy.

Downgrades to estimates due to TSE

We reduce our estimates in this report having not made changes post the [Q2FY16 Results](#). We reduce EBITDA by c.12% for FY16-18E, predominantly driven by downgrades to Tata Steel Europe (we revise up India slightly). We assume Europe gets to broadly breakeven EBITDA for FY16, which implies some benefit from cost savings and, to a lesser extent, government support in Q3/Q4.

Valuation: risk/reward remains attractive

We change our valuation methodology in this note. We now use normalised FCF on a 2-3 year view. This eliminates volatility in earnings and multiples for a cyclical/levered sector and is the best approximation of fair value. We lower our PT from Rs360 to Rs330. Our PT is based on 50% base/25% downside/25% upside using 10% FCF yield. Our base/upside/downside valuations of Rs330/500/160 suggest an attractive risk /reward skew.

Equities

India
Steel

12-month rating

Buy

12m price target

Rs330.00

Prior: Rs360.00

Price

Rs230.05

RIC: TISC.BO BBG: TATA IB

Trading data and key metrics

52-wk range	Rs465.20-201.35
Market cap.	Rs223bn/US\$3.35bn
Shares o/s	971m (ORD)
Free float	69%
Avg. daily volume ('000)	7,354
Avg. daily value (m)	Rs1,699.4
Common s/h equity (03/16E)	Rs380bn
P/BV (03/16E)	0.6x
Net debt / EBITDA (03/16E)	7.2x

EPS (UBS, diluted) (Rs)

	From	To	% ch	Cons.
03/16E	26.83	15.07	-44	21.39
03/17E	31.60	20.05	-37	25.96
03/18E	51.98	42.11	-19	32.81

William Vanderpump

Analyst

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Highlights (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Revenues	1,347,115	1,486,136	1,395,037	1,220,157	1,291,653	1,408,337	1,495,312	1,588,438
EBIT (UBS)	67,459	105,698	65,922	50,283	69,503	104,575	133,740	163,335
Net earnings (UBS)	3,323	36,225	31	14,637	19,479	40,910	59,490	80,681
EPS (UBS, diluted) (Rs)	3.42	37.29	0.03	15.07	20.05	42.11	61.24	83.06
DPS (Rs)	8.00	10.00	8.00	8.00	8.00	8.00	8.00	8.00
Net (debt) / cash	(451,337)	(598,081)	(704,891)	(710,585)	(718,830)	(711,114)	(676,825)	(621,621)
Profitability/valuation	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
EBIT margin %	5.0	7.1	4.7	4.1	5.4	7.4	8.9	10.3
ROIC (EBIT) %	8.4	11.8	6.5	4.7	6.3	9.4	11.8	14.2
EV/EBITDA (core) x	6.8	5.3	9.1	9.9	8.3	6.4	5.3	4.4
P/E (UBS, diluted) x	NM	8.7	NM	15.3	11.5	5.5	3.8	2.8
Equity FCF (UBS) yield %	(10.3)	(20.0)	(12.0)	(18.7)	0.4	7.5	19.4	28.8
Net dividend yield %	2.0	3.1	1.8	3.5	3.5	3.5	3.5	3.5

Source: Company accounts, Thomson Reuters, UBS estimates. Metrics marked as (UBS) have had analyst adjustments applied. Valuations: based on an average share price that year, (E): based on a share price of Rs230.05 on 30 Nov 2015 22:37 HKT

PIVOTAL QUESTIONS

Q: How is Tata Steel positioned?

Strongly in India, but Europe is concern. It is the most diverse Indian company with a strong profitability track-record, which should increase as Odisha ramps up. Europe in FY16 has been a concern and UK markets in particular are tough: Tata Steel needs to quickly cut costs or rationalise the business, in our view.

Q: Can it withstand price pressures?

Like the rest of the industry, not in the short-term. Tata Steel has traditionally operated at the premium end of the market in India which provides some protection. Clearing regulatory/raw materials issues should also help profitability. Pricing pressure in Europe is exacerbated by FX and high costs in the UK meaning further restructuring is required.

Q: How secure is the balance sheet?

Relatively. Debt has been an issue since the Corus acquisition in 2007. But as capex reduces and market conditions improve we expect improvement. We also note the significant refinancing concluded in H214 meaning good liquidity.

[India Steel: Turning point approaching](#)

UBS VIEW

Issues persist, but attractive risk/reward: The India business is performing well in tough markets, but Europe and the balance sheet are a drag on numbers and sentiment. We think European issues are resolved in FY16 (pensions completed); falling capex means deleveraging and the upside/downside skew is attractive.

EVIDENCE

Default play on India steel for many investors: As we showed in our initiation, we think the Indian market has strong long-term prospects and a favourable balance, and Tata Steel is a strong incumbent with an improving competitive position thanks to its own expansion and the struggles of smaller peers. We believe European issues will be resolved (via sale or restructuring) on a 1-2 year view.

WHAT'S PRICED IN?

Little earnings growth: Assuming a 15% equity FCF yield (to reflect and using clear company guidance on capex, interest and tax), we see the market pricing in moderate EBITDA growth on a 2-3 year view. This scenario is consistent with a c.5-10% further fall in steel prices and no recovery.

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UPSIDE / DOWNSIDE SPECTRUM



Value drivers	India Volume (mt)	India EBITDA/t (Rs)	Europe Volume (mt)	Europe EBITDA/t (Rs)	Capex (Rs mn)
Rs494	11.5	11,000	13.9	4,000	-80,000
Rs330	11.0	9,000	13.3	3,000	-65,000
Rs157	10.3	7,000	13.3	2,000	-40,000

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COMPANY DESCRIPTION

Tata Steel is an integrated steel company with operations in India and Europe as well as South East Asia. It has total global capacity of >30mt.

Tata Steel – key workings and estimate changes

Figure 42: Tata Steel – Scenario and Valuation Summary

	FY11-15	FY16e	BASE	UPSIDE	DOWNSIDE	WPI*	B'EVEN FCF**	Comment
India Steel volume (mt)	7.6	8.9	9.0	9.0	8.8	n/a	9.0	
EBITDA† (Rs)	15,328	9,060	9,000	11,000	7,000	n/a	8,807	More EBITDA† volatility than
Kalinganagar volume (mt)	0.0	0.3	2.0	2.5	1.5	n/a	2.0	volumes. Target production for
EBITDA† (Rs)	0.00	0.00	9,000	11,000	7,000	n/a	8,807	sales at KPO is 2.5mt. For Europe
Standalone EBITDA (Rs.m)	119,142	84,857	107,000	135,500	75,750	n/a	104,881	we do not assume any change
Europe volume (mt)	13.9	13.3	13.3	13.9	13.3	n/a	13.3	for long products (c.2.2mt
EBITDA† (Rs)	2,007	255	3,000	4,000	2,000	n/a	255	volume)
Consolidated EBITDA (Rs.m)	146,650	98,655	157,385	205,916	102,407	136,181	118,678	
Working capital (Rs.m)	-7,339	2,291	0	0	0	0	0	In FY16, capex guidance is
Tax paid (Rs.m)	-29,792	-9,358	-31,427	-53,721	-13,179	-20,000	-22,000	c.Rs.10b o/w c.Rs.6b is growth
Cash Tax rate (%)	-25%	-14%	-25%	-30%	-20%	-20%	-25%	(Rs.4.5b KPO and Rs.1.5b other,
Cash interest paid (Rs.m)	-40,889	-41,580	-40,000	-36,000	-44,000	-42,000	-40,000	mainly mining business). Assume
Investment income (Rs.m)	12,000	8,322	8,322	9,154	7,490	7,906	8,322	stability in cash cost of debt (ie
Net capital expenditure (Rs.m)	-129,383	-100,000	-65,000	-80,000	-40,000	-52,500	-65,000	little absolute deleveraging on a 2-
Equity FCF (Rs.m)	-48,752	-41,671	29,280	45,349	12,717	29,586	0	3 year view).
Equity FCF Yield	n/a	n/a	10%	10%	10%	15%	n/a	Other adjustments are deducting
Equity Value (Rs.m)	n/a	n/a	292,804	453,490	127,169	197,242	n/a	pension (93m GBP; and adding
Other adjustments (Rs.m)	n/a	n/a	25,700	25,700	25,700	25,700	n/a	back market value of
No Shares (m)	n/a	n/a	971	971	971	971	n/a	investments).
Per Share (Rs)	n/a	n/a	328	494	157	230	n/a	
PT (Rs)			330					

Source: Company data; UBS estimates; WPI = "what's price in"; * - refer to What's Priced In section in main body of note; ** - refer to Industry Tail section in main body of note. Please note "Base Case refers to mid-term (2-3 years) out so does not exactly agree with 1 forecast year.

Figure 43: Changes to estimates

Rs.m (unless stated)	FY15	FY16E	FY17E	FY18E	FY19E	FY20E	Comment
Revenue change	0%	-2%	-2%	-2%	-2%	-2%	
EBITDA - new	125,358	98,655	119,057	153,130	181,294	209,889	EBITDA downgrades mainly driven by TSE following poor performance in Q2. Higher EPS downgrades reflect financial leverage.
EBITDA - old	125,358	119,160	135,821	162,999	192,052	221,617	
Change	0%	-17%	-12%	-6%	-6%	-5%	
EPS - new (Rs)	0.03	15.07	20.05	42.11	61.24	83.06	
EPS - old (Rs)	0.03	26.83	31.60	51.98	71.56	93.88	
Change	0%	-44%	-37%	-19%	-14%	-12%	
Standalone							
Change in steel volume	0%	-3%	0%	0%	0%	0%	
Realisations (Rs/t)	43,716	38,380	38,788	40,429	42,457	44,588	
Change	0%	1%	3%	3%	3%	3%	Slightly lower realisation forecast for FY16.
Change (abs; Rs)	0	331	1,077	1,123	1,179	1,239	
EBITDA† (Rs)	11,439	9,249	8,845	9,511	10,898	12,199	
Change (abs; Rs)	0	844	683	753	806	862	
TSE							
Change in volume	0%	-5%	-8%	-8%	-8%	-8%	We assume break-even performance in FY16 only (implicitly cost savings come through in Q3 and Q4). Does not assume disposal of long products.
Realisations (Rs/t)	58,433	50,969	50,969	52,498	54,073	55,695	
Change	0%	3%	3%	3%	3%	3%	
EBITDA† (Rs)	3,135	255	1,019	2,100	2,704	3,342	
Change (abs; Rs)	0	-1,906	-1,636	-1,146	-1,164	-1,183	

Source: Company data; UBS estimates

Tata Steel (TISC.BO)

Income statement (Rsm)	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
Revenues	1,347,115	1,486,136	1,395,037	1,220,157	-12.5	1,291,653	5.9	1,408,337	1,495,312	1,588,438
Gross profit	276,350	341,836	312,312	236,646	-24.2	249,672	5.5	298,507	338,513	379,786
EBITDA (UBS)	123,212	164,110	125,358	98,655	-21.3	119,057	20.7	153,130	181,294	209,889
Depreciation & amortisation	(55,753)	(58,412)	(59,436)	(48,371)	-18.6	(49,554)	2.4	(48,554)	(47,554)	(46,554)
EBIT (UBS)	67,459	105,698	65,922	50,283	-23.7	69,503	38.2	104,575	133,740	163,335
Associates & investment income	2,753	2,483	6,106	14,692	140.6	6,407	-56.4	7,804	9,116	11,224
Other non-operating income	0	0	0	0	-	0	-	0	0	0
Net interest	(37,642)	(40,683)	(46,622)	(41,580)	10.8	(43,445)	-4.5	(44,030)	(43,372)	(39,590)
Exceptionals (incl goodwill)	(73,899)	(276)	(39,287)	(4,050)	89.7	0	-	0	0	0
Profit before tax	(41,329)	67,221	(13,881)	19,345	-	32,464	67.8	68,349	99,483	134,969
Tax	(32,294)	(30,582)	(25,674)	(9,358)	63.6	(12,986)	-38.8	(27,340)	(39,793)	(53,988)
Profit after tax	(73,624)	36,640	(39,555)	9,987	-	19,479	95.0	41,010	59,690	80,981
Preference dividends	0	0	0	0	-	0	-	0	0	0
Minorities	3,048	(691)	300	600	100.1	0	-	(100)	(200)	(300)
Extraordinary items	0	0	0	0	-	0	-	0	0	0
Net earnings (local GAAP)	(70,576)	35,949	(39,255)	10,587	-	19,479	84.0	40,910	59,490	80,681
Net earnings (UBS)	3,323	36,225	31	14,637	NM	19,479	33.1	40,910	59,490	80,681
Tax rate (%)	0.0	45.5	0.0	48.4	-	40.0	-17.3	40.0	40.0	40.0
Per share (Rs)	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
EPS (UBS, diluted)	3.42	37.29	0.03	15.07	NM	20.05	33.1	42.11	61.24	83.06
EPS (local GAAP, diluted)	(72.65)	37.01	(40.41)	10.90	-	20.05	84.0	42.11	61.24	83.06
EPS (UBS, basic)	3.42	37.29	0.03	15.07	NM	20.05	33.1	42.11	61.24	83.06
Net DPS (Rs)	8.00	10.00	8.00	8.00	0.0	8.00	0.0	8.00	8.00	8.00
Cash EPS (UBS, diluted) ¹	60.81	97.42	61.22	64.86	6.0	71.06	9.6	92.10	110.19	130.98
Book value per share	375.28	440.76	346.21	391.62	13.1	402.31	2.7	435.07	486.95	560.65
Average shares (diluted)	971.41	971.41	971.41	971.41	0.0	971.41	0.0	971.41	971.41	971.41
Balance sheet (Rsm)	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
Cash and equivalents	98,597	86,045	101,246	95,551	-5.6	87,307	-8.6	95,023	129,311	184,516
Other current assets	514,744	561,763	499,393	459,801	-7.9	493,798	7.4	542,692	582,211	624,986
Total current assets	613,341	647,808	600,639	555,353	-7.5	581,104	4.6	637,714	711,522	809,502
Net tangible fixed assets	692,132	859,806	833,709	885,338	6.2	900,784	1.7	917,229	934,675	953,121
Net intangible fixed assets	130,650	157,488	134,075	134,075	0.0	134,075	0.0	134,075	134,075	134,075
Investments / other assets	32,942	51,342	21,032	21,065	0.2	21,165	0.5	21,265	21,365	21,465
Total assets	1,469,064	1,716,445	1,589,455	1,595,831	0.4	1,637,128	2.6	1,710,284	1,801,638	1,918,163
Trade payables & other ST liabilities	423,418	467,372	299,118	253,387	-15.3	274,923	8.5	305,860	335,294	367,486
Short term debt	81,146	160,262	149,185	149,185	0.00	149,185	0.00	149,185	149,185	149,185
Total current liabilities	504,563	627,634	448,303	402,572	-10.2	424,108	5.3	455,045	484,479	516,671
Long term debt	468,788	523,864	656,952	656,952	0.0	656,952	0.0	656,952	656,952	656,952
Other long term liabilities	114,547	119,500	130,918	139,348	6.4	148,620	6.7	158,820	170,040	182,382
Preferred shares	0	0	0	0	-	0	-	0	0	0
Total liabilities (incl pref shares)	1,087,899	1,270,998	1,236,173	1,198,871	-3.0	1,229,680	2.6	1,270,817	1,311,471	1,356,005
Common s/h equity	364,472	428,070	336,244	380,421	13.1	390,809	2.7	422,628	473,028	544,619
Minority interests	16,694	17,377	17,039	16,539	-2.9	16,639	0.6	16,839	17,139	17,539
Total liabilities & equity	1,469,064	1,716,444	1,589,455	1,595,831	0.4	1,637,128	2.6	1,710,284	1,801,638	1,918,163
Cash flow (Rsm)	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
Net income (before pref divs)	(70,576)	35,949	(39,255)	10,587	-	19,479	84.0	40,910	59,490	80,681
Depreciation & amortisation	55,753	58,412	59,436	48,371	-18.6	49,554	2.4	48,554	47,554	46,554
Net change in working capital	38,407	(12,696)	3,514	2,291	-34.8	(3,188)	-	(7,757)	1,135	1,759
Other operating	88,346	16,550	44,205	(2,920)	-	0	-	100	200	300
Operating cash flow	111,930	98,216	67,900	58,329	-14.1	65,845	12.9	81,806	108,379	129,295
Tangible capital expenditure	(152,224)	(161,255)	(120,488)	(100,000)	17.0	(65,000)	35.0	(65,000)	(65,000)	(65,000)
Intangible capital expenditure	0	0	0	0	-	0	-	0	0	0
Net (acquisitions) / disposals	(2,510)	(961)	1,945	0	-	0	-	0	0	0
Other investing	18,190	(5,814)	30,943	45,067	-	0	-	0	0	0
Investing cash flow	(136,545)	(168,030)	(87,600)	(54,933)	37.3	(65,000)	-18.3	(65,000)	(65,000)	(65,000)
Equity dividends paid	(16,248)	(11,905)	(14,181)	(9,090)	35.9	(9,090)	0.0	(9,090)	(9,090)	(9,090)
Share issues / (buybacks)	208	114	128	0	-	0	-	0	0	0
Other financing	1,067	(37)	(893)	0	-	0	-	0	0	0
Change in debt & pref shares	29,168	58,737	43,051	0	-	0	-	0	0	0
Financing cash flow	14,195	46,909	28,104	(9,090)	-	(9,090)	0.0	(9,090)	(9,090)	(9,090)
Cash flow inc/(dec) in cash	(10,420)	(22,906)	8,404	(5,694)	-	(8,245)	-44.8	7,716	34,289	55,205
FX / non cash items	1,001	10,355	6,797	0	-100.0	0	NM	0	0	0
Balance sheet inc/(dec) in cash	(9,419)	(12,552)	15,201	(5,694)	-	(8,245)	-44.8	7,716	34,289	55,205

Source: Company accounts, UBS estimates. (UBS) metrics use reported figures which have been adjusted by UBS analysts.¹Cash EPS (UBS, diluted) is calculated using UBS net income adding back depreciation and amortization.

Tata Steel (TISC.BO)

Valuation (x)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
P/E (local GAAP, diluted)	NM	8.8	NM	21.1	11.5	5.5	3.8	2.8
P/E (UBS, diluted)	NM	8.7	NM	15.3	11.5	5.5	3.8	2.8
P/CEPS	6.6	3.3	7.4	3.5	3.2	2.5	2.1	1.8
Equity FCF (UBS) yield %	(10.3)	(20.0)	(12.0)	(18.7)	0.4	7.5	19.4	28.8
Net dividend yield (%)	2.0	3.1	1.8	3.5	3.5	3.5	3.5	3.5
P/BV x	1.1	0.7	1.3	0.6	0.6	0.5	0.5	0.4
EV/revenues (core)	0.6	0.6	0.8	0.8	0.8	0.7	0.6	0.6
EV/EBITDA (core)	6.8	5.3	9.1	9.9	8.3	6.4	5.3	4.4
EV/EBIT (core)	12.5	8.3	17.3	19.5	14.2	9.4	7.2	5.6
EV/OpFCF (core)	6.8	5.3	9.1	9.9	8.3	6.4	5.3	4.4
EV/op. invested capital	1.0	1.0	1.1	0.9	0.9	0.9	0.8	0.8
Enterprise value (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Market cap.	391,540	314,925	438,196	223,427	223,427	223,427	223,427	223,427
Net debt (cash)	421,547	524,709	651,486	707,738	714,708	714,972	693,970	649,223
Buy out of minorities	13,803	17,035	17,208	16,789	16,589	16,739	16,989	17,339
Pension provisions/other	13,750	15,500	31,000	31,000	31,000	31,000	31,000	31,000
Total enterprise value	840,639	872,169	1,137,890	978,954	985,723	986,138	965,385	920,988
Non core assets	0	0	0	0	0	0	0	0
Core enterprise value	840,639	872,169	1,137,890	978,954	985,723	986,138	965,385	920,988
Growth (%)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Revenue	1.4	10.3	-6.1	-12.5	5.9	9.0	6.2	6.2
EBITDA (UBS)	-0.8	33.2	-23.6	-21.3	20.7	28.6	18.4	15.8
EBIT (UBS)	-14.6	56.7	-37.6	-23.7	38.2	50.5	27.9	22.1
EPS (UBS, diluted)	-83.6	NM	-99.9	NM	33.1	110.0	45.4	35.6
Net DPS	-33.3	25.0	-20.0	0.0	0.0	0.0	0.0	0.0
Margins & Profitability (%)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Gross profit margin	20.5	23.0	22.4	19.4	19.3	21.2	22.6	23.9
EBITDA margin	9.1	11.0	9.0	8.1	9.2	10.9	12.1	13.2
EBIT margin	5.0	7.1	4.7	4.1	5.4	7.4	8.9	10.3
Net earnings (UBS) margin	0.2	2.4	0.0	1.2	1.5	2.9	4.0	5.1
ROIC (EBIT)	8.4	11.8	6.5	4.7	6.3	9.4	11.8	14.2
ROIC post tax	0.1	6.4	NM	2.8	3.8	5.6	7.1	8.5
ROE (UBS)	0.8	9.1	0.0	4.1	5.1	10.1	13.3	15.9
Capital structure & Coverage (x)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Net debt / EBITDA	3.7	3.6	5.6	7.2	6.0	4.6	3.7	3.0
Net debt / total equity %	118.4	134.3	199.5	179.0	176.4	161.8	138.1	110.6
Net debt / (net debt + total equity) %	54.2	57.3	66.6	64.2	63.8	61.8	58.0	52.5
Net debt/EV %	53.7	68.6	61.9	72.6	72.9	72.1	70.1	67.5
Capex / depreciation %	NM	NM	NM	NM	131.2	133.9	136.7	139.6
Capex / revenue %	11.3	10.9	8.6	8.2	5.0	4.6	4.3	4.1
EBIT / net interest	1.8	2.6	1.4	1.2	1.6	2.4	3.1	4.1
Dividend cover (UBS)	0.4	3.7	0.0	1.9	2.5	5.3	7.7	10.4
Div. payout ratio (UBS) %	233.9	26.8	NM	53.1	39.9	19.0	13.1	9.6
Revenues by division (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Europe (Net)	780,120	846,660	798,780	679,330	679,330	720,701	764,592	811,156
India (Net)	381,994	417,110	417,850	384,624	450,248	519,396	556,006	595,772
Natsteel Asia (Net)	93,930	121,280	90,280	77,232	83,104	89,269	95,742	102,539
Tata Steel Thailand (Net)	44,360	48,600	40,200	40,200	40,200	40,200	40,200	40,200
Other Businesses (Net)	46,711	52,485	47,927	38,771	38,771	38,771	38,771	38,771
Others	0	0	0	0	0	0	0	0
Total	1,347,115	1,486,136	1,395,037	1,220,157	1,291,653	1,408,337	1,495,312	1,588,438
EBIT (UBS) by division (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Others	67,459	105,698	65,922	50,283	69,503	104,575	133,740	163,335
Total	67,459	105,698	65,922	50,283	69,503	104,575	133,740	163,335

Source: Company accounts, UBS estimates. (UBS) metrics use reported figures which have been adjusted by UBS analysts.

JSW Steel

Well-positioned; holding up well

What's our view?

We believe JSW is the best-positioned Indian steel company under our coverage, although some of this is reflected in the share price. It has responded well to extreme market pressures with cost-cutting and strong execution on residual expansion programmes. We think the balance sheet is also relatively strong and banks are supportive despite short-term pressures. It is a pure-play on India and a clean story (converter model only; no significant legacy issues) and hence we think it is an attractive way to play growth and demand recovery trends in the country in the medium/long-term.

Key short-term and long-term catalysts

Operating at slightly lower average realisations than some peers, JSW is more sensitive to pricing trends, which remain weak. Further action from the Indian government in terms of duties/protection would be supportive. We expect a soft Q3 in terms of profitability, due to planned shutdowns, but underlying cost control to remain strong. JSW is also a potential consolidator of struggling smaller peers in the Indian steel industry in our view, although opportunities would need to be well-priced relative to its own low capital costs of expansion.

Changes to estimates

We make c.11% EBITDA downgrades, in this note having not made changes following the recent quarter. This comes largely from a slight cut to realisation assumptions from H2FY16, in response to recent market pricing trends, and a reduction in Q3 profitability assumptions given commentary from the company around shutdowns at the [Q2 results](#). Given the focus on India and the relatively low realisations, JSW Steel earnings are highly sensitive to price assumptions.

Valuation: new price target of Rs1,200 (prior Rs1,100)

We change our valuation methodology somewhat in this note. We now use sustainable FCF on a 2-3 year view. This eliminates volatility in earnings and multiples for a cyclical/levered sector and is the best approximation of fair value. Our PT is based on 50% base/25% downside/25% upside using 10% FCF yield. Our Base/upside/downside valuations of Rs1230/1730/570 suggest a still attractive risk/reward skew.

Equities

India
Steel

12-month rating

Buy

12m price target

Rs1,200.00

Prior: Rs1,100.00

Price

Rs904.35

RIC: JSTL.BO BBG: JSTL IB

Trading data and key metrics

52-wk range Rs1,176.75-811.15

Market cap. Rs219bn/US\$3.28bn

Shares o/s 242m (ORD)

Free float 44%

Avg. daily volume ('000) 869

Avg. daily value (m) Rs791.8

Common s/h equity (03/16E) Rs233bn

P/BV (03/16E) 0.9x

Net debt / EBITDA (03/16E) 4.7x

EPS (UBS, diluted) (Rs)

	From	To	% ch	Cons.
03/16E	56.93	54.75	-4	31.10
03/17E	94.41	83.12	-12	83.96
03/18E	134.37	108.68	-19	112.48

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Highlights (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Revenues	382,097	512,196	529,715	472,320	508,964	558,211	613,023	674,029
EBIT (UBS)	42,664	59,829	59,678	49,561	57,649	64,166	75,118	89,269
Net earnings (UBS)	13,001	21,321	18,101	13,234	20,093	26,270	35,591	47,116
EPS (UBS, diluted) (Rs)	58.27	88.20	74.88	54.75	83.12	108.68	147.24	194.92
DPS (Rs)	10.00	11.00	11.00	11.00	11.00	19.00	24.00	29.00
Net (debt) / cash	(198,281)	(347,956)	(368,407)	(375,778)	(365,991)	(350,618)	(329,713)	(300,883)
Profitability/valuation	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
EBIT margin %	11.2	11.7	11.3	10.5	11.3	11.5	12.3	13.2
ROIC (EBIT) %	12.7	13.1	10.5	8.3	9.5	10.5	12.1	14.2
EV/EBITDA (core) x	5.5	5.8	6.9	7.5	6.6	5.9	5.0	4.2
P/E (UBS, diluted) x	12.5	8.8	15.2	16.5	10.9	8.3	6.1	4.6
Equity FCF (UBS) yield %	(7.8)	(30.0)	(7.7)	(1.5)	6.1	9.6	12.8	17.1
Net dividend yield %	1.4	1.4	1.0	1.2	1.2	2.1	2.7	3.2

Source: Company accounts, Thomson Reuters, UBS estimates. Metrics marked as (UBS) have had analyst adjustments applied. Valuations: based on an average share price that year, (E): based on a share price of Rs904.35 on 30 Nov 2015 22:37 HKT

PIVOTAL QUESTIONS

Q: How is JSW positioned?

Well, in our view, as a strong operator and India pure-play. Expansion via mostly brownfield is largely complete and leaves JSW as a market leader with well-diversified and well-invested capacity. It is thus well-placed ahead of demand recovery in India. It has options to expand further via existing facilities or acquisitions, should market conditions allow.

Q: Can it withstand price pressures?

Like the rest of the industry, not in the short-term. However there are some offsets: JSW benefits from being the lowest cost Indian producer and a non-captive raw material model, which allows it the benefits of low raw materials prices (although lack of security is a risk), although it limits operating leverage into an upturn.

Q: How secure is the balance sheet?

Relatively. JSW has had to take short-term covenant favours due to current pressures. Yet it is the least-levered of the peer group and should de-lever from here as capacity expansion programmes come to an end and capex reduces. Faster deleveraging is dependent on a demand recovery in India.

[India Steel: Turning point approaching](#)

UBS VIEW

Best-positioned, but not the best risk/reward: JSW has responded well to extreme market pressures with cost-cutting and strong execution on residual expansion programmes. The balance sheet is also relatively strong. While we believe JSW will be a long-term winner, some of its operational and financial outperformance is reflected in the share price.

EVIDENCE

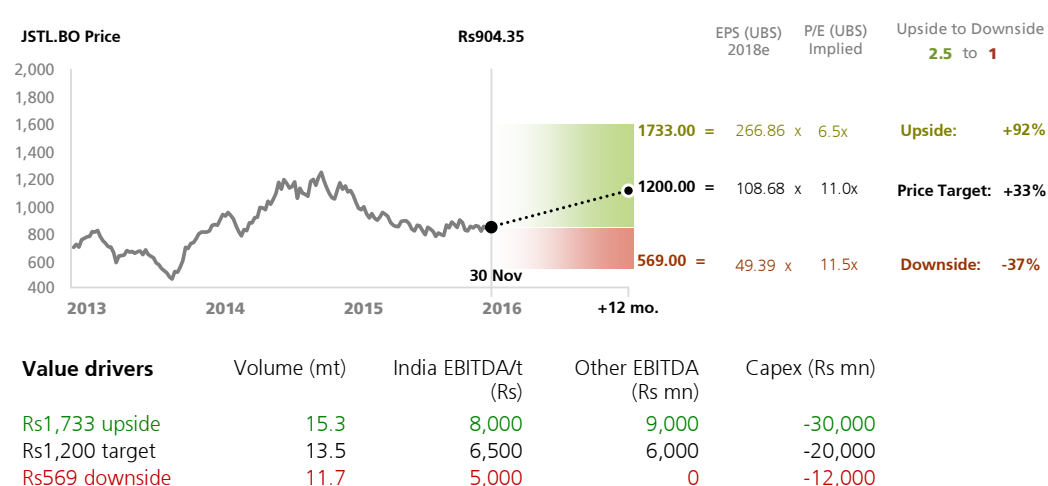
Pure play on India; market leader; top operator: As we showed in our initiation, we think the Indian market has strong long-term prospects and a favourable balance. JSW is the leader, while its operational excellence makes it a likely beneficiary in either weak markets or a stronger demand recovery. As we show in this note, its capital cost of expansion has been lower and the debt burden is less onerous than peers, which bodes well for deleveraging in the future.

WHAT'S PRICED IN?

Little earnings growth incorporated: Assuming a 15% equity FCF yield (to reflect market caution on the steel industry) and using company guidance on capex, interest and tax, we see the market pricing in almost no EBITDA growth on a 2-3 year view. This scenario is consistent with a c.5-10% further fall in steel prices and no recovery.

[more →](#)

UPSIDE / DOWNSIDE SPECTRUM



[more →](#)

COMPANY DESCRIPTION

JSW Steel is an integrated steel company based in Southern and Western India. It will soon complete a 4mt capacity expansion to 18mt. It is c.85% focused on flat products.

JSW Steel – Key workings and estimate changes

Figure 44: JSW Steel – Scenario and Valuation Summary

	FY11-15	FY16e	BASE	UPSIDE	DOWNSIDE	WPI*	B'EVEN FCF**	Comment
India Steel volume (mt)	9.3	12.9	13.5	15.3	11.7	n/a	13.5	Additional 4mt of capacity is almost certain. We assume 75%; 85%; 65% utilisation in our 3 scenarios.
EBITDA _t (Rs)	7,417	5,713	6,500	8,000	5,000	n/a	3,548	
India EBITDA (Rs.m)	68,892	73,561	87,750	122,400	58,500	n/a	47,892	
Other EBITDA (Rs.m)	3,191	6,000	6,000	9,000	0	n/a	6,000	
Consolidated EBITDA	72,083	79,561	93,750	131,400	58,500	88,587	53,892	
Working capital (Rs.m)	-12,963	-797	-2,500	-5,000	0	-1,250	-2,500	Guidance for current maintenance capex is Rs.11-12b.
Tax paid (Rs.m)	-5,041	-6,195	-17,464	-32,969	-6,444	-13,500	-7,500	
Tax rate (%)	-30%	-11%	-25%	-30%	-20%	-21%	-25%	
Cash interest paid (Rs.m)	-16,852	-23,892	-23,892	-21,503	-26,281	-25,087	-23,892	
Other investment (Rs.m)	-10,592	0	0	0	0	0	0	
Net capital expenditure (Rs.m)	-54,482	-52,000	-20,000	-30,000	-12,000	-16,000	-20,000	
Equity FCF (Rs.m)	-27,848	-3,323	29,893	41,928	13,775	32,750	0	
Equity FCF Yield	n/a	n/a	10%	10%	10%	15%	n/a	
Equity Value (Rs.m)	n/a	n/a	298,933	419,279	137,748	218,332	n/a	
Other adjustments	n/a	n/a	0	0	0	0	n/a	
No Shares (m)	n/a	n/a	242	242	242	242	n/a	
Per Share (Rs)	n/a	n/a	1235	1733	569	902	n/a	
PT (Rs)	1200							

Source: Company data; UBS estimates; WPI = "what's price in"; * - refer to What's Priced In section in main body of note; ** - refer to Industry Tail section in main body of note. Please note "Base Case refers to mid-term (2-3 years) out so does not exactly agree with 1 forecast year.

Figure 45: Changes to estimates

Rs.m (unless stated)	FY15	FY16E	FY17E	FY18E	FY19E	FY20E	Comment
Revenue - new	534,021	472,320	508,964	558,211	613,023	674,029	Downgrades are mainly driven by slightly lower profitability in H216 from weaker utilisation in Q316 (on planned shutdowns); and a slightly more cautious realisation assumption for FY17 onwards. Higher EPS changes due to financial leverage.
Revenue - old	534,021	472,320	517,426	567,630	623,506	685,697	
Change	0%	0%	-2%	-2%	-2%	-2%	
EBITDA - new	98,329	79,561	89,149	97,166	109,618	125,269	
EBITDA - old	98,329	86,186	100,505	112,144	127,737	146,259	
Change	0%	-8%	-11%	-13%	-14%	-14%	
EPS - new (Rs)	92.7	54.7	83.1	108.7	147.2	194.9	
EPS - old (Rs)	92.7	56.9	94.4	134.4	188.8	251.6	
Change	0%	-4%	-12%	-19%	-22%	-23%	
Net debt - new	368,407	375,778	365,991	350,618	329,713	300,883	
Net debt - old	368,407	369,405	350,422	322,964	288,620	245,177	
Change in volume	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	No change to volume assumptions. Main delta is on realisations.
Realisations (Rs/t)	38,297	31,000	31,930	33,527	35,203	36,963	
Change	0.0%	0.0%	-1.9%	-1.9%	-1.9%	-1.9%	
Change (abs; Rs)	0	0	-620	-651	-684	-718	
EBITDA _t (Rs)	7,372	5,713	6,092	6,301	6,756	7,337	
Change	0.0%	-8.3%	-12.0%	-14.1%	-14.9%	-15.0%	
Change (abs; Rs)	0	-514	-832	-1,035	-1,181	-1,291	

Source: Company data; UBS estimates

JSW Steel (JSTL.BO)

	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
Income statement (Rsm)										
Revenues	382,097	512,196	529,715	472,320	-10.8	508,964	7.8	558,211	613,023	674,029
Gross profit	56,456	79,270	83,369	69,199	-17.0	78,640	13.6	87,219	100,288	116,707
EBITDA (UBS)	65,097	91,655	94,023	79,561	-15.4	89,149	12.1	97,166	109,618	125,269
Depreciation & amortisation	(22,432)	(31,826)	(34,345)	(30,000)	-12.7	(31,500)	5.0	(33,000)	(34,500)	(36,000)
EBIT (UBS)	42,664	59,829	59,678	49,561	-17.0	57,649	16.3	64,166	75,118	89,269
Associates & investment income	697	858	1,114	2,000	79.5	2,000	0.0	2,000	2,000	2,000
Other non-operating income	0	0	0	0	-	0	-	0	0	0
Net interest	(19,675)	(30,479)	(34,930)	(32,365)	7.3	(30,149)	6.8	(27,141)	(24,091)	(21,000)
Exceptionals (incl goodwill)	(3,694)	(17,127)	(471)	0	-	0	-	0	0	0
Profit before tax	19,993	13,081	25,391	19,196	-24.4	29,500	53.7	39,025	53,026	70,269
Tax	(8,452)	(9,201)	(8,194)	(6,195)	24.4	(9,440)	-52.4	(12,488)	(16,968)	(22,486)
Profit after tax	11,541	3,880	17,197	13,001	-24.4	20,060	54.3	26,537	36,058	47,783
Preference dividends	(324)	(326)	(336)	(336)	-	(336)	-	(336)	(336)	(336)
Minorities	(1,910)	640	769	569	-26.0	369	-35.2	69	(131)	(331)
Extraordinary items	0	0	0	0	-	0	-	0	0	0
Net earnings (local GAAP)	9,307	4,193	17,630	13,234	-24.9	20,093	51.8	26,270	35,591	47,116
Net earnings (UBS)	13,001	21,321	18,101	13,234	-26.9	20,093	51.8	26,270	35,591	47,116
Tax rate (%)	42.3	70.3	32.3	32.3	0.0	32.0	-0.8	32.0	32.0	32.0
Per share (Rs)										
EPS (UBS, diluted)	58.27	88.20	74.88	54.75	-26.9	83.12	51.8	108.68	147.24	194.92
EPS (local GAAP, diluted)	41.71	17.35	72.93	54.75	-24.9	83.12	51.8	108.68	147.24	194.92
EPS (UBS, basic)	58.27	88.20	74.88	54.75	-26.9	83.12	51.8	108.68	147.24	194.92
Net DPS (Rs)	10.00	11.00	11.00	11.00	0.0	11.00	0.0	19.00	24.00	29.00
Cash EPS (UBS, diluted) ¹	158.81	219.87	216.97	178.86	-17.6	213.44	19.3	245.20	289.96	343.85
Book value per share	779.03	875.97	922.13	963.92	4.5	1,034.09	7.3	1,120.45	1,239.46	1,400.36
Average shares (diluted)	223.12	241.72	241.72	241.72	0.0	241.72	0.0	241.72	241.72	241.72
Balance sheet (Rsm)										
Cash and equivalents	17,969	7,310	19,136	1,765	-90.8	1,551	-12.1	6,924	17,829	36,660
Other current assets	134,948	198,685	226,998	192,293	-15.3	203,744	6.0	219,836	236,996	255,259
Total current assets	152,917	205,995	246,134	194,058	-21.2	205,295	5.8	226,760	254,825	291,919
Net tangible fixed assets	393,004	548,838	588,562	610,562	3.7	619,062	1.4	626,062	636,562	650,562
Net intangible fixed assets	13,143	15,619	15,854	15,854	0.0	15,854	0.0	15,854	15,854	15,854
Investments / other assets	16,064	5,947	5,990	5,990	0.0	5,990	0.0	5,990	5,990	5,990
Total assets	575,128	776,399	856,539	826,463	-3.5	846,200	2.4	874,665	913,230	964,324
Trade payables & other ST liabilities	150,052	182,270	211,763	182,134	-14.0	195,257	7.2	212,894	232,524	254,372
Short term debt	39,528	80,595	43,132	28,132	-34.78	23,132	-17.77	18,132	13,132	8,132
Total current liabilities	189,580	262,865	254,895	210,265	-17.5	218,389	3.9	231,026	245,656	262,504
Long term debt	173,932	267,026	336,766	341,766	1.5	336,766	-1.5	331,766	326,766	321,766
Other long term liabilities	36,207	25,454	33,360	33,360	0.0	33,360	0.0	33,360	33,360	33,360
Preferred shares	2,790	7,644	7,644	7,644	0.00	7,644	0.00	7,644	7,644	7,644
Total liabilities (incl pref shares)	402,509	562,990	632,666	593,036	-6.3	596,160	0.5	603,797	613,427	625,275
Common s/h equity	170,647	211,739	222,896	232,998	4.5	249,959	7.3	270,835	299,618	338,511
Minority interests	1,972	1,670	976	429	-56.1	81	-81.1	33	186	538
Total liabilities & equity	575,128	776,399	856,539	826,463	-3.5	846,200	2.4	874,665	913,230	964,324
Cash flow (Rsm)										
Net income (before pref divs)	9,631	4,520	17,966	13,570	-24.5	20,429	50.5	26,606	35,927	47,452
Depreciation & amortisation	22,432	31,826	34,345	30,000	-12.7	31,500	5.0	33,000	34,500	36,000
Net change in working capital	5,888	(35,195)	(11,748)	(797)	93.2	(4,357)	NM	(3,884)	(2,348)	(615)
Other operating	5,896	1,216	3,302	5,904	78.8	5,661	-4.1	5,360	4,950	4,531
Operating cash flow	43,847	2,367	43,865	48,677	11.0	53,233	9.4	61,082	73,028	87,368
Tangible capital expenditure	(56,180)	(57,443)	(65,134)	(52,000)	20.2	(40,000)	23.1	(40,000)	(45,000)	(50,000)
Intangible capital expenditure	0	0	0	0	-	0	-	0	0	0
Net (acquisitions) / disposals	0	0	0	0	-	0	-	0	0	0
Other investing	1,313	168	699	0	-	0	-	0	0	0
Investing cash flow	(54,868)	(57,275)	(64,435)	(52,000)	19.3	(40,000)	23.1	(40,000)	(45,000)	(50,000)
Equity dividends paid	(2,269)	(3,154)	(3,437)	(3,447)	-0.3	(3,447)	0.0	(5,709)	(7,123)	(8,537)
Share issues / (buybacks)	0	0	0	0	-	0	-	0	0	0
Other financing	0	0	0	0	0.00	0	0.00	0	0	0
Change in debt & pref shares	9,546	60,290	27,373	(10,000)	-	(10,000)	0.00	(10,000)	(10,000)	(10,000)
Financing cash flow	7,277	57,135	23,935	(13,447)	-	(13,447)	0.0	(15,709)	(17,123)	(18,537)
Cash flow inc/(dec) in cash	(3,744)	2,227	3,365	(16,770)	-	(213)	98.7	5,373	10,905	18,831
FX / non cash items	(10,797)	(12,886)	8,460	(601)	-	0	-	0	0	0
Balance sheet inc/(dec) in cash	(14,541)	(10,659)	11,826	(17,371)	-	(213)	98.8	5,373	10,905	18,831

Source: Company accounts, UBS estimates. (UBS) metrics use reported figures which have been adjusted by UBS analysts.¹Cash EPS (UBS, diluted) is calculated using UBS net income adding back depreciation and amortization.

JSW Steel (JSTL.BO)

Valuation (x)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
P/E (local GAAP, diluted)	17.4	44.7	15.6	16.5	10.9	8.3	6.1	4.6
P/E (UBS, diluted)	12.5	8.8	15.2	16.5	10.9	8.3	6.1	4.6
P/CEPS	4.6	3.5	5.2	5.1	4.2	3.7	3.1	2.6
Equity FCF (UBS) yield %	(7.8)	(30.0)	(7.7)	(1.5)	6.1	9.6	12.8	17.1
Net dividend yield (%)	1.4	1.4	1.0	1.2	1.2	2.1	2.7	3.2
P/BV x	0.9	0.9	1.2	0.9	0.9	0.8	0.7	0.6
EV/revenues (core)	0.9	1.0	1.2	1.3	1.1	1.0	0.9	0.8
EV/EBITDA (core)	5.5	5.8	6.9	7.5	6.6	5.9	5.0	4.2
EV/EBIT (core)	8.4	8.9	10.8	12.0	10.1	8.9	7.3	5.8
EV/OpFCF (core)	5.7	6.0	7.1	7.9	6.9	6.1	5.2	4.3
EV/op. invested capital	1.1	1.2	1.1	1.0	1.0	0.9	0.9	0.8
Enterprise value (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Market cap.	159,106	183,893	274,801	218,599	218,599	218,599	218,599	218,599
Net debt (cash)	198,281	347,956	368,407	375,778	365,991	350,618	329,713	300,883
Buy out of minorities	1,972	1,670	976	429	81	33	186	538
Pension provisions/other	0	0	0	0	0	0	0	0
Total enterprise value	359,359	533,518	644,184	594,806	584,671	569,251	548,499	520,020
Non core assets	0	0	0	0	0	0	0	0
Core enterprise value	359,359	533,518	644,184	594,806	584,671	569,251	548,499	520,020
Growth (%)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Revenue	11.2	34.0	3.4	-10.8	7.8	9.7	9.8	10.0
EBITDA (UBS)	6.5	40.8	2.6	-15.4	12.1	9.0	12.8	14.3
EBIT (UBS)	2.3	40.2	-0.3	-17.0	16.3	11.3	17.1	18.8
EPS (UBS, diluted)	-5.0	51.4	-15.1	-26.9	51.8	30.7	35.5	32.4
Net DPS	33.3	10.0	0.0	0.0	0.0	72.7	26.3	20.8
Margins & Profitability (%)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Gross profit margin	14.8	15.5	15.7	14.7	15.5	15.6	16.4	17.3
EBITDA margin	17.0	17.9	17.7	16.8	17.5	17.4	17.9	18.6
EBIT margin	11.2	11.7	11.3	10.5	11.3	11.5	12.3	13.2
Net earnings (UBS) margin	3.4	4.2	3.4	2.8	3.9	4.7	5.8	7.0
ROIC (EBIT)	12.7	13.1	10.5	8.3	9.5	10.5	12.1	14.2
ROIC post tax	8.2	9.1	7.1	5.6	6.5	7.1	8.2	9.7
ROE (UBS)	7.8	11.2	8.3	5.8	8.3	10.1	12.5	14.8
Capital structure & Coverage (x)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Net debt / EBITDA	3.0	3.8	3.9	4.7	4.1	3.6	3.0	2.4
Net debt / total equity %	114.9	163.0	164.6	161.0	146.4	129.4	110.0	88.7
Net debt / (net debt + total equity) %	53.5	62.0	62.2	61.7	59.4	56.4	52.4	47.0
Net debt/EV %	55.2	65.2	57.2	63.2	62.6	61.6	60.1	57.9
Capex / depreciation %	NM	180.5	189.6	173.3	127.0	121.2	130.4	138.9
Capex / revenue %	14.7	11.2	12.3	11.0	7.9	7.2	7.3	7.4
EBIT / net interest	2.2	2.0	1.7	1.5	1.9	2.4	3.1	4.3
Dividend cover (UBS)	5.8	8.0	6.8	5.0	7.6	5.7	6.1	6.7
Div. payout ratio (UBS) %	17.2	12.5	14.7	20.1	13.2	17.5	16.3	14.9
Revenues by division (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Standalone (Net)	354,918	452,977	460,873	399,172	435,816	485,063	539,875	600,881
Other Businesses (Net)	27,027	63,503	73,148	73,148	73,148	73,148	73,148	73,148
Others	152	(4,284)	(4,306)	0	0	0	0	0
Total	382,097	512,196	529,715	472,320	508,964	558,211	613,023	674,029
EBIT (UBS) by division (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Others	42,664	59,829	59,678	49,561	57,649	64,166	75,118	89,269
Total	42,664	59,829	59,678	49,561	57,649	64,166	75,118	89,269

Source: Company accounts, UBS estimates. (UBS) metrics use reported figures which have been adjusted by UBS analysts.

Jindal Steel & Power

Positive signs, but balance sheet the main issue

What's our view?

We believe risk/reward bands remain too wide to take a decisive view. JPSL will continue to generate a lot of "noise" in the short-term around coal availability, legacy regulatory issues and power, so the share price will be volatile. We believe equity valuation will only make a decisive move when the company provides a clear path to deleveraging the balance sheet, in our view. We do like the mix of businesses within the group and within steel, but the balance sheet remains the most important question.

Key short-term and long-term catalysts

In the short-term JSPL will need to continue to deliver on improved capacity utilisation in power (there were [encouraging signs in Q2](#)). Any resolution of the coal availability issues could also be positive: note the shares have risen >10% since CNBC reported on 19th November that the company had received clearance from the CCI over allegations of cartelisation in the coal block auctions earlier in the year. It will also need to deliver on plans to monetise c.\$300m of assets in H2. On the Q2 conference call the company stated that JVs with "global majors" were another potential route to balance sheet repair; we view news around these should be regarded positively.

Changes to estimates

We reduce FY16-FY18E EBITDA by an average of 5%, having not made changes immediately post Q2. This comes mainly from adjusting for higher costs in power and lower steel realisations in the Middle East

Valuation: new price target of Rs100 (prior Rs75)

We use a multiple-based approach (9x; consistent with 8-10x historical range) on 1-2 year forward earnings to value JSPL. In our downside case we also assume the dilutive impact of a \$500m equity raising. Our base/upside and downside scenarios generate valuations of Rs78/186/27 respectively. Consistent with other steel companies our PT is weighted 50% to the base case and 25% each to the upside and downside scenarios.

Equities

India
Steel

12-month rating **Neutral**

12m price target **Rs100.00**
Prior: Rs75.00

Price **Rs91.10**

RIC: JNSP.BO BBG: JSP IB

Trading data and key metrics

52-wk range	Rs195.35-58.25
Market cap.	Rs84.8bn/US\$1.27bn
Shares o/s	931m (ORD)
Free float	37%
Avg. daily volume ('000)	10,901
Avg. daily value (m)	Rs793.1
Common s/h equity (03/16E)	Rs222bn
P/BV (03/16E)	0.4x
Net debt / EBITDA (03/16E)	8.9x

EPS (UBS, diluted) (Rs)

	From	To	% ch	Cons.
03/16E	2.07	(3.26)	-258	(4.38)
03/17E	5.26	4.94	-6	3.49
03/18E	14.19	16.72	18	10.14

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Highlights (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Revenues	198,068	200,040	201,592	206,035	227,815	245,381	272,385	293,286
EBIT (UBS)	50,293	36,276	27,506	20,033	32,621	44,055	49,496	52,628
Net earnings (UBS)	34,842	19,104	6,335	(3,032)	4,594	15,553	20,748	25,234
EPS (UBS, diluted) (Rs)	37.27	20.53	6.81	(3.26)	4.94	16.72	22.30	27.12
DPS (Rs)	1.60	1.50	0.00	0.00	0.00	0.00	0.00	0.00
Net (debt) / cash	(244,180)	(353,529)	(433,767)	(419,944)	(409,921)	(398,299)	(387,514)	(377,598)
Profitability/valuation	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
EBIT margin %	25.4	18.1	13.6	9.7	14.3	18.0	18.2	17.9
ROIC (EBIT) %	12.5	7.0	4.5	3.1	5.1	6.9	7.6	7.9
EV/EBITDA (core) x	9.1	10.0	11.1	11.0	8.3	6.8	6.1	5.7
P/E (UBS, diluted) x	11.2	12.5	32.1	(28.0)	18.5	5.4	4.1	3.4
Equity FCF (UBS) yield %	(16.4)	(44.5)	(23.5)	(6.7)	11.8	13.7	12.7	11.7
Net dividend yield %	0.4	0.6	0.0	0.0	0.0	0.0	0.0	0.0

Source: Company accounts, Thomson Reuters, UBS estimates. Metrics marked as (UBS) have had analyst adjustments applied. Valuations: based on an average share price that year, (E): based on a share price of Rs91.10 on 30 Nov 2015 22:37 HKT

PIVOTAL QUESTIONS

Q: How well is JSPL positioned?

Most diverse business, but external threats. JSPL has high quality assets in power and steel. The expansion in steel is almost complete and JSPL has an attractive mix (long products/infra). Yet legacy issues, especially around coal availability in power, remain a drag on sentiment and profitability.

Q: Can it withstand price pressures?

Steel pricing less of a risk, but issues around costs. Steel prices have been under pressure, but operating in the premium segment provides some protection. Risks are more around price pressure in the Middle East and transmission and distribution issues in Indian power pressurising utilisation.

Q: How secure is the balance sheet?

Most pressurised of the covered peer group. JSPL has said it needs to monetise assets (Jindal Power, Middle East business) to reduce debt. While banks are supportive and profitability in power should improve as legacy issues clear, we believe the balance sheet remains a risk to equity investors.

[India Steel: Turning point approaching](#)

UBS VIEW

Risk/reward bands too wide to take a decisive view: JSPL will continue to generate a lot of noise in the short-term around coal availability, legacy regulatory issues and power, and the share price should be volatile. Equity valuation will only make a decisive move when the company provides a clear path to deleveraging the balance sheet, in our view.

EVIDENCE

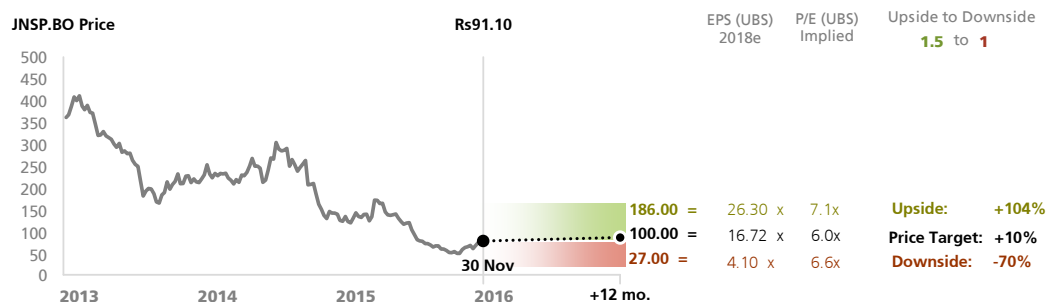
Capacity expansion has come at a cost: As we showed in our initiation, JSPL has developed a diversified business with well-invested assets. Yet in this note we show the relatively high cost at which this has come (for example in terms of legacy capex/sales, or forward debt or interest per ton). We think this increases conviction that special measures, not organic improvement, are key to deleveraging.

WHAT'S PRICED IN?

Long-term recovery: Given the depressed earnings base, valuation is coming c.2/3 from FY16-18 expectations and 1/3 from long-term growth expectations, according to our residual income model. The main driver of equity valuation will be if, or the extent to which, JSPL can delever its balance sheet.

[more →](#)

UPSIDE / DOWNSIDE SPECTRUM



Value drivers	Standalone EBITDA	Standalone Margin	Power EBITDA	Power Margin	Other EBITDA
Rs186 upside	43,393	26.4%	38,545	57.2%	4,017
Rs100 target	35,732	24.0%	31,392	51.7%	5,919
Rs27 downside	28,588	21.0%	20,610	46.7%	5,304

[more →](#)

COMPANY DESCRIPTION

JSPL is part of the OP Jindal Group. It combines assets in steel, power and cement across India and the Middle East. Steel capacity is c.8mt; power capacity is c.3,400MW.

JSPL – key workings and estimate changes

Figure 46: JSPL – valuation and scenario summary

	FORECAST	UPSIDE	DOWNSIDE	PT	Comment
EPS (INR)	0.9	6.3	-4.1		Average of FY16 and FY17
Cons EPS (INR)	0.1	0.1	0.1		Reuters consensus
Delta vs cons	676%	5609%	-3808%		
EBITDA (INRm)	54,018	62,947	44,281		Average of FY16 and FY17
Cons EBITDA (INRm)	58,000	58,000	58,000		Reuters consensus
Delta vs cons	-7%	9%	-24%		
Net debt (Rs.m)	414,932	396,547	363,768		Average of FY16 and FY17
Net debt:EBITDA (x)	7.7	6.3	8.2		
EV/EBITDA (x)	9.0	9.0	9.0		8-10x average range; 10x current level
EV (Rs.m)	486,163	566,519	398,525		
Equity (Rs.m)	71,230	169,972	34,757		
Shares (m)	915	915	1,265		Assume \$500m equity infusion in downside scenario
Per share (Rs)	78	186	27	100	PT is 50% base/25% upside and downside
Implied PER (x)	91.2	29.6	-6.7	n/a	
Share price (Rs)	91.1	91.1	91.1	91.1	
Upside / (downside)	-15%	104%	-70%	10%	

Source: Company data; UBS estimates; Note Forecast/UpSide/Downside represent average of FY16 and FY17

Figure 47: Changes to estimates

Rs.m (unless stated)	FY14	FY15	FY16E	FY17E	FY18E	FY19E	FY20E	Comment
Revenue - new	200,040	201,592	206,035	227,815	245,381	272,385	293,286	
Revenue - old	200,040	201,592	217,729	238,206	255,416	282,126	304,139	
Change	0%	0%	-5%	-4%	-4%	-3%	-4%	
EBITDA - new	54,568	54,835	47,311	60,725	73,043	79,506	83,800	
EBITDA - old	54,568	54,835	53,912	61,752	70,725	79,682	87,086	
Change	0%	0%	-12%	-2%	3%	0%	-4%	Cuts to EBITDA mainly due to power costs (coal) so far in FY16. Long-term assumptions are broadly unchanged. We also reflect lower profitability due to market conditions in the Oman business. EPS volatility reflects financial leverage and change in co depreciation guidance at Q2 results
Adj EPS - new (Rs)	20.9	6.9	-3.3	5.0	17.0	22.7	27.6	
Adj EPS - old (Rs)	20.9	6.9	2.1	5.4	14.4	22.3	30.0	
Change	0%	0%	-258%	-6%	18%	2%	-8%	
Net debt - new	353,529	429,290	419,944	409,921	398,299	387,514	377,598	
Net debt - old	353,529	429,290	449,507	463,128	464,264	457,242	444,087	
EBITDA delta	0	0	-6,601	-1,027	2,318	-176	-3,285	
- o/w Standalone	0	0	1,425	0	0	0	0	
- o/w JPL	-422	0	-7,716	-1,503	1,644	-269	-2,707	
- o/w Oman	0	0	-2,781	-2,656	-2,452	-3,030	-3,716	
- o/w Other	422	0	2,472	3,132	3,127	3,123	3,137	

Source: Company data; UBS estimates

Jindal Steel & Power (JNSP.BO)

	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
Income statement (Rsm)										
Revenues	198,068	200,040	201,592	206,035	2.2	227,815	10.6	245,381	272,385	293,286
Gross profit	67,723	53,880	45,246	37,047	-18.1	50,203	35.5	61,459	66,637	69,437
EBITDA (UBS)	65,685	54,568	54,835	47,311	-13.7	60,725	28.4	73,043	79,506	83,800
Depreciation & amortisation	(15,392)	(18,292)	(27,328)	(27,278)	-0.2	(28,104)	3.0	(28,988)	(30,010)	(31,173)
EBIT (UBS)	50,293	36,276	27,506	20,033	-27.2	32,621	62.8	44,055	49,496	52,628
Associates & investment income	1,364	656	2,256	2,463	9.2	1,894	-23.1	4,195	4,413	6,737
Other non-operating income	0	0	0	0	-	0	-	0	0	0
Net interest	(7,582)	(11,812)	(26,073)	(28,174)	-8.1	(29,092)	-3.3	(27,548)	(25,725)	(24,989)
Exceptionals (incl goodwill)	(5,741)	0	(19,116)	0	-	0	-	0	0	0
Profit before tax	38,335	25,120	(15,428)	(5,678)	63.2	5,423	-	20,702	28,184	34,375
Tax	(9,218)	(6,182)	882	1,619	83.7	(1,356)	-	(5,176)	(7,046)	(8,594)
Profit after tax	29,116	18,938	(14,546)	(4,058)	72.1	4,067	-	15,527	21,138	25,782
Preference dividends	0	0	0	0	-	0	-	0	0	0
Minorities	(15)	166	1,765	1,026	-41.8	526	-48.7	26	(391)	(548)
Extraordinary items	0	0	0	0	-	0	-	0	0	0
Net earnings (local GAAP)	29,101	19,104	(12,781)	(3,032)	76.3	4,594	-	15,553	20,748	25,234
Net earnings (UBS)	34,842	19,104	6,335	(3,032)	-	4,594	-	15,553	20,748	25,234
Tax rate (%)	24.0	24.6	0.0	0.0	-	25.0	-	25.0	25.0	25.0
Per share (Rs)										
EPS (UBS, diluted)	37.27	20.53	6.81	(3.26)	-	4.94	-	16.72	22.30	27.12
EPS (local GAAP, diluted)	31.13	20.53	(13.74)	(3.26)	76.3	4.94	-	16.72	22.30	27.12
EPS (UBS, basic)	37.45	20.88	6.92	(3.31)	-	5.02	-	17.00	22.68	27.58
Net DPS (Rs)	1.60	1.50	0.00	0.00	-	0.00	-	0.00	0.00	0.00
Cash EPS (UBS, diluted)*	53.74	40.20	36.18	26.06	-28.0	35.15	34.9	47.88	54.56	60.63
Book value per share	228.33	242.92	221.26	243.08	9.9	248.10	2.1	265.10	287.78	315.36
Average shares (diluted)	934.83	930.35	930.35	930.35	0.0	930.35	0.0	930.35	930.35	930.35
Balance sheet (Rsm)										
Cash and equivalents	2,001	10,153	25,715	75,341	193.0	78,660	4.4	83,576	87,656	80,868
Other current assets	149,811	199,142	168,493	179,249	6.4	173,237	-3.4	173,285	180,759	186,499
Total current assets	151,812	209,295	194,207	254,590	31.1	251,897	-1.1	256,861	268,414	267,366
Net tangible fixed assets	385,049	522,071	551,677	549,399	-0.4	547,219	-0.4	548,693	553,915	562,857
Net intangible fixed assets	1,543	5,930	5,485	5,485	0.0	5,485	0.0	5,485	5,485	5,485
Investments / other assets	32,322	3,425	3,998	3,998	0.0	4,024	0.7	4,050	4,077	4,103
Total assets	570,726	740,721	755,366	813,471	7.7	808,624	-0.6	815,089	831,890	839,811
Trade payables & other ST liabilities	38,301	62,455	53,758	63,490	18.1	61,254	-3.5	58,871	61,212	60,031
Short term debt	92,165	104,679	105,486	109,951	4.23	108,463	-1.35	106,974	105,486	101,778
Total current liabilities	130,466	167,134	159,244	173,441	8.9	169,717	-2.1	165,845	166,698	161,808
Long term debt	154,016	259,003	353,996	385,334	8.9	380,117	-1.4	374,901	369,684	356,688
Other long term liabilities	68,148	77,677	27,610	24,735	-10.4	24,735	0.0	24,735	24,735	24,735
Preferred shares	0	0	0	0	-	0	-	0	0	0
Total liabilities (incl pref shares)	352,631	503,813	540,849	583,509	7.9	574,569	-1.5	565,481	561,117	543,230
Common s/h equity	212,523	226,105	205,944	222,389	8.0	226,983	2.1	242,536	263,283	288,517
Minority interests	5,573	10,802	8,573	7,573	-11.7	7,073	-6.6	7,073	7,490	8,064
Total liabilities & equity	570,726	740,721	755,366	813,471	7.7	808,624	-0.6	815,089	831,890	839,811
Cash flow (Rsm)										
Net income (before pref divs)	29,101	19,104	(12,781)	(3,032)	76.3	4,594	-	15,553	20,748	25,234
Depreciation & amortisation	15,392	18,292	27,328	27,278	-0.2	28,104	3.0	28,988	30,010	31,173
Net change in working capital	(23,207)	12,816	(1,962)	(1,025)	47.8	3,776	-	(2,431)	(5,132)	(6,922)
Other operating	(708)	(10,395)	(1,724)	(3,875)	-124.7	(1,451)	62.6	(488)	160	432
Operating cash flow	20,578	39,816	10,861	19,346	78.1	35,023	81.0	41,621	45,785	49,917
Tangible capital expenditure	(83,791)	(141,348)	(58,650)	(25,000)	57.4	(25,000)	0.0	(30,000)	(35,000)	(40,000)
Intangible capital expenditure	(625)	(4,388)	0	0	-	0	-	0	0	0
Net (acquisitions) / disposals	0	0	0	0	-	0	-	0	0	0
Other investing	(12,557)	3,000	(110)	15,000	-	0	-	0	0	0
Investing cash flow	(96,973)	(142,736)	(58,760)	(10,000)	83.0	(25,000)	-150.0	(30,000)	(35,000)	(40,000)
Equity dividends paid	(1,569)	(1,488)	0	0	-	0	-	0	0	0
Share issues / (buybacks)	0	(5,006)	0	0	-	0	-	0	0	0
Other financing	3,120	1,232	0	0	-	0	-	0	0	0
Change in debt & pref shares	75,274	115,838	91,323	40,280	-55.89	(6,705)	-	(6,705)	(6,705)	(16,705)
Financing cash flow	76,824	110,577	91,323	40,280	-55.9	(6,705)	-	(6,705)	(6,705)	(16,705)
Cash flow inc/(dec) in cash	429	7,657	43,424	49,626	14.3	3,318	-93.3	4,916	4,080	(6,788)
FX / non cash items	80	495	(27,863)	0	-	0	-100.0	0	0	0
Balance sheet inc/(dec) in cash	509	8,152	15,562	49,627	218.9	3,318	-93.3	4,916	4,080	(6,788)

Source: Company accounts, UBS estimates. (UBS) metrics use reported figures which have been adjusted by UBS analysts.*Cash EPS (UBS, diluted) is calculated using UBS net income adding back depreciation and amortization.

Jindal Steel & Power (JNSP.BO)

Valuation (x)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
P/E (local GAAP, diluted)	13.4	12.5	NM	NM	18.5	5.4	4.1	3.4
P/E (UBS, diluted)	11.2	12.5	32.1	(28.0)	18.5	5.4	4.1	3.4
P/CEPS	7.7	6.3	5.9	3.4	2.5	1.9	1.6	1.5
Equity FCF (UBS) yield %	(16.4)	(44.5)	(23.5)	(6.7)	11.8	13.7	12.7	11.7
Net dividend yield (%)	0.4	0.6	0.0	0.0	0.0	0.0	0.0	0.0
P/BV x	1.8	1.1	1.0	0.4	0.4	0.3	0.3	0.3
EV/revenues (core)	3.0	2.7	3.0	2.5	2.2	2.0	1.8	1.6
EV/EBITDA (core)	9.1	10.0	11.1	11.0	8.3	6.8	6.1	5.7
EV/EBIT (core)	11.9	15.0	22.1	25.9	15.5	11.3	9.8	9.0
EV/OpFCF (core)	9.3	10.3	11.4	11.4	8.6	7.0	6.3	5.8
EV/op. invested capital	1.5	1.0	1.0	0.8	0.8	0.8	0.7	0.7
Enterprise value (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Market cap.	389,296	238,173	203,746	84,794	84,794	84,794	84,794	84,794
Net debt (cash)	206,798	298,855	393,648	426,855	414,932	404,110	392,907	382,556
Buy out of minorities	4,322	8,187	9,687	8,073	7,323	7,073	7,281	7,777
Pension provisions/other	0	0	0	0	0	0	0	0
Total enterprise value	600,416	545,215	607,081	519,722	507,049	495,976	484,982	475,127
Non core assets	0	0	0	0	0	0	0	0
Core enterprise value	600,416	545,215	607,081	519,722	507,049	495,976	484,982	475,127
Growth (%)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Revenue	8.8	1.0	0.8	2.2	10.6	7.7	11.0	7.7
EBITDA (UBS)	-6.7	-16.9	0.5	-13.7	28.4	20.3	8.8	5.4
EBIT (UBS)	-11.0	-27.9	-24.2	-27.2	62.8	35.1	12.4	6.3
EPS (UBS, diluted)	-15.0	-44.9	-66.8	-	-	NM	33.4	21.6
Net DPS	0.0	-6.2	-	-	-	-	-	-
Margins & Profitability (%)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Gross profit margin	34.2	26.9	22.4	18.0	22.0	25.0	24.5	23.7
EBITDA margin	33.2	27.3	27.2	23.0	26.7	29.8	29.2	28.6
EBIT margin	25.4	18.1	13.6	9.7	14.3	18.0	18.2	17.9
Net earnings (UBS) margin	17.6	9.5	3.1	NM	2.0	6.3	7.6	8.6
ROIC (EBIT)	12.5	7.0	4.5	3.1	5.1	6.9	7.6	7.9
ROIC post tax	9.9	5.3	4.5	3.1	3.8	5.1	5.7	6.0
ROE (UBS)	17.7	8.7	2.9	(1.4)	2.0	6.6	8.2	9.1
Capital structure & Coverage (x)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Net debt / EBITDA	3.7	6.5	7.9	8.9	6.8	5.5	4.9	4.5
Net debt / total equity %	112.0	149.2	202.2	182.6	175.1	159.6	143.1	127.3
Net debt / (net debt + total equity) %	52.8	59.9	66.9	64.6	63.7	61.5	58.9	56.0
Net debt/EV %	40.7	64.8	71.5	80.8	80.8	80.3	79.9	79.5
Capex / depreciation %	NM	NM	NM	91.6	89.0	103.5	116.6	128.3
Capex / revenue %	NM	NM	29.1	12.1	11.0	12.2	12.8	13.6
EBIT / net interest	6.6	3.1	1.1	0.7	1.1	1.6	1.9	2.1
Dividend cover (UBS)	23.4	13.9	-	-	-	-	-	-
Div. payout ratio (UBS) %	4.3	7.2	-	-	-	-	-	-
Revenues by division (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Standalone (Net)	149,547	145,440	140,994	142,506	142,679	148,883	161,702	175,809
Jindal Power (Net)	25,097	25,129	32,280	34,278	53,552	60,699	70,216	71,621
Shadeed (Net)	34,440	32,004	32,315	30,537	34,469	38,907	43,916	49,570
Other Businesses (Net)	(11,016)	(2,533)	(2,571)	(1,286)	(2,885)	(3,107)	(3,449)	(3,714)
Others	0	0	(1,425)	0	0	0	0	0
Total	198,068	200,040	201,592	206,035	227,815	245,381	272,385	293,286
EBIT (UBS) by division (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Others	50,293	36,276	27,506	20,033	32,621	44,055	49,496	52,628
Total	50,293	36,276	27,506	20,033	32,621	44,055	49,496	52,628

Source: Company accounts, UBS estimates. (UBS) metrics use reported figures which have been adjusted by UBS analysts.

Steel Authority of India

Performing poorly, but well-supported

What's our view?

We believe SAIL's capacity expansion programme (targeting 21mt by FY18) in India will leave it strongly placed if Indian economic growth continues. That SAIL is 75% owned by the Indian government is also supportive for the long-term position and given high current debt levels, in our view. Yet we prefer the lower execution risk, faster deleveraging and better risk/reward profile at peers such as JSW Steel and Tata Steel.

Key short-term and long-term catalysts

Short-term the market will be focused on measures to improve profitability. We note recent press (*Indian Express* 24 November 2015) that the government will appoint consultants for a "360 degree review" of SAIL's structure and strategy. Given its focus on India, we believe SAIL will be sensitive to further news-flow around government protection/duties for the domestic steel industry. In Q3 we will look for SAIL to ramp production at Bokaro (extended shutdown drove half the Q2 loss).

Estimate changes reflect weak Q2

Following a second-successive [loss-making quarter](#) in Q2FY16 we make c. 50% cuts to EBITDA for FY16-18E. While we assume the company can return to profitability in H216, the H1 losses carry through into forecast periods (FY16E EBITDA/t reduces by Rs.2,300; FY16-20E EBITDA/t reduces by c.Rs1,500/t).

Valuation: wide risk/reward bands make decisive view difficult

We change our valuation methodology in this note. We now use normalised FCF on a 2-3 year view. This eliminates volatility in earnings and multiples for a cyclical/levered sector and is the best approximation of fair value. We also think it equates to how the market looks at SAIL given the recent disconnect between share price and earnings performance. We lower out PT from Rs55 tp Rs47. Our new PT is based on 50% base/25% downside/25% upside using 10% FCF yield. Our base/upside/downside valuations of Rs32/105/7 show how operational and financial leverage generate a wide range of outcomes.

Equities

India
Steel

12-month rating **Neutral**

12m price target **Rs47.00**
Prior: **Rs55.00**

Price **Rs45.75**

RIC: SAIL.BO BBG: SAIL IB

Trading data and key metrics

52-wk range	Rs89.40-43.90
Market cap.	Rs189bn/US\$2.83bn
Shares o/s	4,130m (ORD)
Free float	25%
Avg. daily volume ('000)	3,766
Avg. daily value (m)	Rs190.4
Common s/h equity (03/16E)	Rs417bn
P/BV (03/16E)	0.5x
Net debt / EBITDA (03/16E)	>10

EPS (UBS, diluted) (Rs)

	From	To	% ch	Cons.
03/16E	2.76	(3.75)	-236	0.06
03/17E	3.58	(1.33)	-137	3.92
03/18E	4.77	0.85	-82	0.27

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Highlights (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Revenues	449,745	469,377	459,520	395,577	435,135	479,464	528,309	582,461
EBIT (UBS)	34,437	23,613	31,045	(15,183)	4,860	18,972	26,613	44,842
Net earnings (UBS)	25,174	14,462	22,468	(15,473)	(5,488)	3,490	7,045	18,871
EPS (UBS, diluted) (Rs)	6.09	3.50	5.44	(3.75)	(1.33)	0.85	1.71	4.57
DPS (Rs)	2.00	2.02	2.00	2.00	2.00	2.00	2.00	2.00
Net (debt) / cash	(183,036)	(228,337)	(279,249)	(368,485)	(422,885)	(458,984)	(468,388)	(454,125)
Profitability/valuation	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
EBIT margin %	7.7	5.0	6.8	-3.8	1.1	4.0	5.0	7.7
ROIC (EBIT) %	6.2	3.8	4.5	(2.0)	0.6	2.3	3.1	5.3
EV/EBITDA (core) x	10.8	11.4	12.1	>100	25.4	16.3	13.4	9.6
P/E (UBS, diluted) x	14.1	16.6	14.8	(12.2)	(34.4)	54.1	26.8	10.0
Equity FCF (UBS) yield %	(17.9)	(12.8)	(12.4)	(46.7)	(25.6)	(14.8)	0.3	12.9
Net dividend yield %	2.3	3.5	2.5	4.4	4.4	4.4	4.4	4.4

Source: Company accounts, Thomson Reuters, UBS estimates. Metrics marked as (UBS) have had analyst adjustments applied. Valuations: based on an average share price that year, (E): based on a share price of Rs45.75 on 30 Nov 2015 21:56 HKT

PIVOTAL QUESTIONS

Q: How well is SAIL positioned?

Well long-term, but with execution risk, in our view. India is an attractive market long-term and SAIL is a dominant company with a good mix (exposure to long products/infra). The modernisation and expansion programme should result in a diversification of the product portfolio and greater efficiency. However, we believe it needs to complete this programme and meet shorter-term challenges around efficiency and utilisation.

Q: Can it withstand price pressures?

Like the rest of the industry, we believe not in the short-term. SAIL has tried to resist industry pricing pressure, but at a cost of weak volumes and costly inventory-build. Execution in 2015 has been weak (eg, an extended shutdown of Bokaro), which has further damaged SAIL's near-term competitiveness.

Q: How secure is the balance sheet?

Pressured, but with implicit government support. The sharp decline in profitability has pressurised debt ratios in 2015, but the company is not seeing any bank/covenant pressure. Of more concern is ongoing capex, which delays deleveraging and the return to positive free cash-flow further than peers.

[India Steel: Turning point approaching](#)

UBS VIEW

Most geared to Indian recovery, but execution/debt drag: We believe SAIL's capacity expansion programme (targeting 21mt by FY18) in India will leave it strongly placed if Indian economic growth continues. Yet we prefer the lower execution risk, faster deleveraging and better risk/reward profile at peers such as JSW Steel and Tata Steel.

EVIDENCE

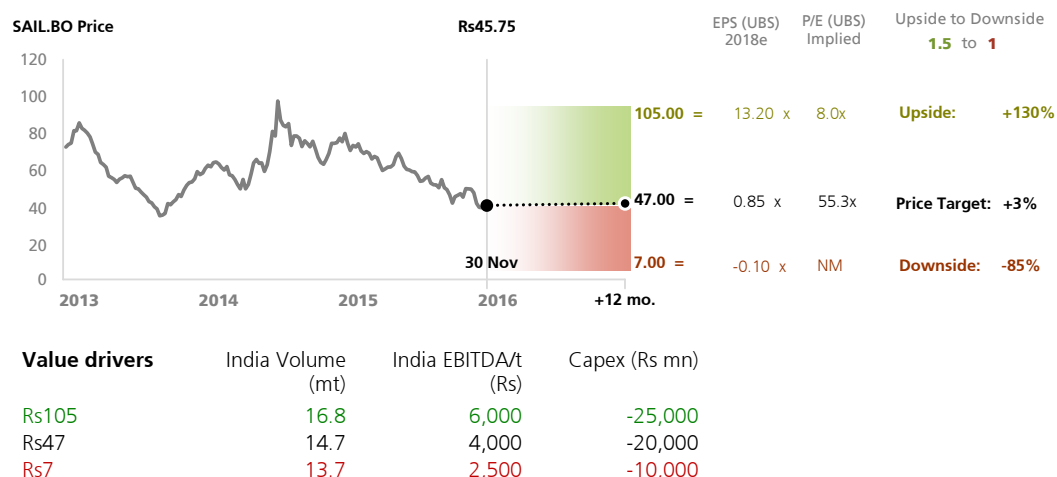
Capex programmes continue; balance sheet more pressured than peers: As discussed in our initiation, SAIL guides for elevated capex continuing until FY17 (assuming long-delayed projects complete). In this note we show that while SAIL has the cash-generation potential to service its debts, we believe tough markets and weak execution mean the balance sheet will remain stretched relative to peers.

WHAT'S PRICED IN?

Long-term recovery: Assuming 15% equity FCF yield (to reflect market caution towards the steel sector) and using company guidance on capex, interest and tax), we think the market is pricing in a return to long-term average profitability and eventual ramp up on volumes. While this risk/reward is unattractive, government support for the business will continue to support the valuation in our view.

[more →](#)

UPSIDE / DOWNSIDE SPECTRUM



[more →](#)

COMPANY DESCRIPTION

SAIL is an integrated steel company, 75% owned by the Government of India. It has plans to increase its current crude steel capacity of c.14mt to c.21mt by FY18.

SAIL – key workings and estimate changes

Figure 48: SAIL – Scenario and Valuation Summary

	FY11-15	FY16e	BASE	UPSIDE	DOWNSIDE	WPI*	B'EVEN FCF**	Comment
India Steel volume (mt)	11.7	11.5	14.7	16.8	13.7	15.0	14.7	Assume get to 21mt capacity with 70%/80%/65% utilisation in our 3 scenarios.
EBITDA _t (Rs.)	4,816	246	4,000	6,000	2,500	4,832	2,910	
Consolidated EBITDA (Rs.m)	56,399	2,817	58,800	100,800	34,125	72,482	42,776	
Working capital (Rs.m)	-16,463	-10,344	0	0	0	0	0	Completion of expansion programme means capex does drop dramatically, but debt servicing remains high
Other adjustments (Rs.m)	1,693	0	0	0	0	0	0	
Tax paid (Rs.m)	-12,224	2,107	-8,205	-16,960	-2,186	-10,500	-5,000	
Tax rate (%)	-20%	-14%	-20%	-20%	-15%	-20%	-20%	
Cash interest paid (Rs.m)	1,783	-17,776	-17,776	-15,998	-19,553	-18,664	-17,776	
Investment income (Rs.m)	3,466	0	0	0	0	0	0	
Net capital expenditure (Rs.m)	-89,670	-65,000	-20,000	-25,000	-10,000	-15,000	-20,000	
Equity FCF (Rs.m)	-55,016	-88,196	12,819	42,841	2,386	28,318	0	The wide variety in equity valuations in the 3 scenarios is reflective of the financial leverage.
Equity FCF Yield	n/a	n/a	10%	10%	10%	15%	n/a	
Equity Value (Rs.m)	n/a	n/a	128,194	428,415	23,860	188,787	n/a	
Other adjustments (Rs.m)	n/a	n/a	0	0	0	0	n/a	
No Shares (m)	n/a	n/a	4131	4131	4131	4131	n/a	
Per Share (Rs)	n/a	n/a	32	105	7	46	n/a	
PT (Rs)				47				

Source: Company data; UBS estimates; WPI = "what's price in"; * - refer to What's Priced In section in main body of note; ** - refer to Industry Tail section in main body of note. Please note "Base Case refers to mid-term (2-3 years) out so does not exactly agree with 1 forecast year.

Figure 49: Changes to estimates

Rs.m (unless stated)	FY15	FY16E	FY17E	FY18E	FY19E	FY20E	Comment
Revenue - new	459,520	395,577	435,135	479,464	528,309	582,461	Downgrades reflect poor performance in Q2 (weak markets and high inventory build); then financial leverage (higher levels of net debt than main peers, due to ongoing capex).
Revenue - old	459,520	424,710	460,103	519,341	586,206	646,292	
Change	0%	-7%	-5%	-8%	-10%	-10%	
EBITDA - new	49,874	2,817	23,860	39,472	48,613	66,842	
EBITDA - old	49,874	33,360	49,190	61,102	76,713	86,521	
Change	0%	-92%	-51%	-35%	-37%	-23%	
EPS - new (Rs)	5.44	-3.75	-1.33	0.84	1.71	4.57	
EPS - old (Rs)	5.44	2.76	3.58	4.77	6.81	7.90	
Change	0%	-236%	-137%	-82%	-75%	-42%	
Change in volume	0%	-11%	-11%	-11%	-11%	-11%	
Realisations (Rs/t)	39,275	34,500	34,500	35,363	36,247	38,059	Lower volumes reflect cautious approach to sales in tough environment and inventory build. We assume some stability in price through balance of FY16 to reflect co strategy.
Change	0%	5%	6%	4%	1%	1%	
Change (abs; Rs)	0	1500	2000	1238	415	436	
EBITDA _t (Rs)	4,263	246	1,892	2,911	3,335	4,368	
Change	0%	-91%	-46%	-27%	-29%	-13%	
Change (abs; Rs)	0	-2346	-1583	-1104	-1354	-669	

Source: Company data; UBS estimates e

Steel Authority of India (SAIL.BO)

Income statement (Rsm)	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
Revenues	449,745	469,377	459,520	395,577	-13.9	435,135	10.0	479,464	528,309	582,461
Gross profit	59,469	49,635	56,807	9,463	-83.3	30,676	224.2	46,601	56,714	77,099
EBITDA (UBS)	49,740	40,815	50,069	2,817	-94.4	23,860	NM	39,472	48,613	66,842
Depreciation & amortisation	(15,302)	(17,203)	(19,024)	(18,000)	-5.4	(19,000)	5.6	(20,500)	(22,000)	(22,000)
EBIT (UBS)	34,437	23,613	31,045	(15,183)	-	4,860	-	18,972	26,613	44,842
Associates & investment income	1,976	2,090	4,588	9,000	96.2	4,000	-55.6	2,000	0	0
Other non-operating income	0	0	0	0	-	0	-	0	0	0
Net interest	73	(4,304)	(10,107)	(11,397)	-12.8	(15,720)	-37.9	(16,318)	(17,220)	(17,884)
Exceptionals (incl goodwill)	(1,883)	12,059	(886)	0	-	0	-	0	0	0
Profit before tax	34,603	33,458	24,640	(17,580)	-	(6,860)	61.0	4,654	9,393	26,958
Tax	(11,312)	(6,934)	(3,059)	2,107	-	1,372	-34.9	(1,163)	(2,348)	(8,087)
Profit after tax	23,291	26,523	21,580	(15,473)	-	(5,488)	64.5	3,490	7,045	18,871
Preference dividends	0	0	0	0	-	0	-	0	0	0
Minorities	0	(2)	1	0	-	0	-	0	0	0
Extraordinary items	0	0	0	0	-	0	-	0	0	0
Net earnings (local GAAP)	23,291	26,521	21,582	(15,473)	-	(5,488)	64.5	3,490	7,045	18,871
Net earnings (UBS)	25,174	14,462	22,468	(15,473)	-	(5,488)	64.5	3,490	7,045	18,871
Tax rate (%)	32.7	20.7	12.4	0.0	-	0.0	-	25.0	25.0	30.0
Per share (Rs)	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
EPS (UBS, diluted)	6.09	3.50	5.44	(3.75)	-	(1.33)	64.5	0.85	1.71	4.57
EPS (local GAAP, diluted)	5.64	6.42	5.23	(3.75)	-	(1.33)	64.5	0.85	1.71	4.57
EPS (UBS, basic)	6.09	3.50	5.44	(3.75)	-	(1.33)	64.5	0.85	1.71	4.57
Net DPS (Rs)	2.00	2.02	2.00	2.00	0.0	2.00	0.0	2.00	2.00	2.00
Cash EPS (UBS, diluted) ¹	9.80	7.67	10.05	0.61	-93.9	3.27	NM	5.81	7.03	9.90
Book value per share	100.82	104.80	107.02	100.84	-5.8	97.08	-3.7	95.50	94.77	96.91
Average shares (diluted)	4,130.40	4,130.40	4,130.40	4,130.40	0.0	4,130.40	0.0	4,130.40	4,130.40	4,130.40
Balance sheet (Rsm)	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
Cash and equivalents	42,352	31,868	26,484	26,484	0.0	26,484	0.0	26,484	26,484	26,484
Other current assets	276,587	283,648	311,399	283,141	-9.1	291,576	3.0	301,707	312,625	322,675
Total current assets	318,940	315,516	337,882	309,624	-8.4	318,059	2.7	328,191	339,109	349,159
Net tangible fixed assets	545,449	621,335	670,638	724,017	8.0	768,207	6.1	799,301	808,099	806,497
Net intangible fixed assets	0	0	0	0	-	0	-	0	0	0
Investments / other assets	655	1,834	4,668	4,668	0.0	4,668	0.0	4,668	4,668	4,668
Total assets	865,043	938,685	1,013,189	1,038,310	2.5	1,090,934	5.1	1,132,160	1,151,876	1,160,325
Trade payables & other ST liabilities	135,056	162,199	174,116	135,514	-22.2	149,266	10.1	160,944	174,251	188,132
Short term debt	83,839	118,875	161,352	197,152	22.19	241,552	22.52	267,651	267,056	242,792
Total current liabilities	218,895	281,073	335,468	332,666	-0.8	390,819	17.5	428,595	441,306	430,924
Long term debt	141,549	141,330	144,381	197,816	37.0	207,816	5.1	217,816	227,816	237,816
Other long term liabilities	88,156	83,436	91,311	91,311	0.0	91,311	0.0	91,311	91,311	91,311
Preferred shares	0	0	0	0	-	0	-	0	0	0
Total liabilities (incl pref shares)	448,600	505,840	571,160	621,793	8.9	689,946	11.0	737,722	760,433	760,051
Common s/h equity	416,443	432,846	442,029	416,516	-5.8	400,988	-3.7	394,438	391,443	400,273
Minority interests	0	0	0	0	-	0	-	0	0	0
Total liabilities & equity	865,043	938,685	1,013,189	1,038,310	2.5	1,090,934	5.1	1,132,160	1,151,876	1,160,325
Cash flow (Rsm)	03/13	03/14	03/15	03/16E	% ch	03/17E	% ch	03/18E	03/19E	03/20E
Net income (before pref divs)	23,291	26,521	21,582	(15,473)	-	(5,488)	64.5	3,490	7,045	18,871
Depreciation & amortisation	15,303	17,203	19,025	18,000	-5.4	19,000	5.6	20,500	22,000	22,000
Net change in working capital	(22,362)	23,136	(17,980)	(10,344)	42.5	5,317	-	1,546	2,388	3,832
Other operating	12,101	(8,504)	(441)	(15,379)	NM	(7,189)	53.3	(3,595)	(797)	(399)
Operating cash flow	28,332	58,357	22,185	(23,196)	-	11,640	-	21,942	30,635	44,304
Tangible capital expenditure	(91,765)	(89,222)	(63,340)	(65,000)	-2.6	(60,000)	7.7	(50,000)	(30,000)	(20,000)
Intangible capital expenditure	0	0	0	0	-	0	-	0	0	0
Net (acquisitions) / disposals	0	0	0	0	-	0	-	0	0	0
Other investing	4	8,991	3,877	9,000	-	4,000	-	2,000	0	0
Investing cash flow	(91,761)	(80,231)	(59,463)	(56,000)	5.8	(56,000)	0.0	(48,000)	(30,000)	(20,000)
Equity dividends paid	(11,616)	(11,889)	(8,840)	(10,040)	-13.6	(10,040)	0.0	(10,040)	(10,040)	(10,040)
Share issues / (buybacks)	7	3	279	0	-	0	-	0	0	0
Other financing	151	13	14	0	-	0	-	0	0	0
Change in debt & pref shares	50,034	32,135	46,194	0	-	0	-	0	0	0
Financing cash flow	38,577	20,262	37,646	(10,040)	-	(10,040)	0.0	(10,040)	(10,040)	(10,040)
Cash flow inc/(dec) in cash	(24,852)	(1,613)	368	(89,236)	-	(54,400)	39.0	(36,098)	(9,405)	14,264
FX / non cash items	112	(8,871)	(5,752)	89,236	-	54,400	-39.0	36,098	9,405	(14,264)
Balance sheet inc/(dec) in cash	(24,741)	(10,484)	(5,384)	0	-	0	-	0	0	0

Source: Company accounts, UBS estimates. (UBS) metrics use reported figures which have been adjusted by UBS analysts.¹Cash EPS (UBS, diluted) is calculated using UBS net income adding back depreciation and amortization.

Steel Authority of India (SAIL.BO)

Valuation (x)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
P/E (local GAAP, diluted)	15.2	9.1	15.4	NM	NM	54.1	26.8	10.0
P/E (UBS, diluted)	14.1	16.6	14.8	(12.2)	(34.4)	54.1	26.8	10.0
P/CEPS	8.8	7.6	8.0	74.8	14.0	7.9	6.5	4.6
Equity FCF (UBS) yield %	(17.9)	(12.8)	(12.4)	(46.7)	(25.6)	(14.8)	0.3	12.9
Net dividend yield (%)	2.3	3.5	2.5	4.4	4.4	4.4	4.4	4.4
P/BV x	0.9	0.6	0.8	0.5	0.5	0.5	0.5	0.5
EV/revenues (core)	1.2	1.0	1.3	1.4	1.4	1.3	1.2	1.1
EV/EBITDA (core)	10.8	11.4	12.1	>100	25.4	16.3	13.4	9.6
EV/EBIT (core)	15.6	19.8	19.6	NM	NM	NM	24.5	14.2
EV/OpFCF (core)	11.2	12.1	12.7	NM	28.8	17.6	14.3	10.0
EV/op. invested capital	1.0	0.7	0.9	0.7	0.8	0.8	0.8	0.7
Enterprise value (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Market cap.	354,172	240,635	332,418	188,966	188,966	188,966	188,966	188,966
Net debt (cash)	183,036	228,337	279,249	368,485	422,885	458,984	468,388	454,125
Buy out of minorities	0	0	0	0	0	0	0	0
Pension provisions/other	0	0	0	0	0	0	0	0
Total enterprise value	537,208	468,971	611,667	557,450	611,851	647,949	657,354	643,090
Non core assets	(655)	(1,834)	(4,668)	(4,668)	(4,668)	(4,668)	(4,668)	(4,668)
Core enterprise value	536,553	467,137	606,998	552,782	607,183	643,281	652,686	638,422
Growth (%)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Revenue	-3.4	4.4	-2.1	-13.9	10.0	10.2	10.2	10.3
EBITDA (UBS)	-21.3	-17.9	22.7	-94.4	NM	65.4	23.2	37.5
EBIT (UBS)	-25.6	-31.4	31.5	-	-	NM	40.3	68.5
EPS (UBS, diluted)	-34.9	-42.6	55.4	-	64.5	-	101.8	167.9
Net DPS	0.0	1.0	-1.0	0.0	0.0	0.0	0.0	0.0
Margins & Profitability (%)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Gross profit margin	13.2	10.6	12.4	2.4	7.0	9.7	10.7	13.2
EBITDA margin	11.1	8.7	10.9	0.7	5.5	8.2	9.2	11.5
EBIT margin	7.7	5.0	6.8	-3.8	1.1	4.0	5.0	7.7
Net earnings (UBS) margin	5.6	3.1	4.9	NM	NM	0.7	1.3	3.2
ROIC (EBIT)	6.2	3.8	4.5	(2.0)	0.6	2.3	3.1	5.3
ROIC post tax	4.3	2.5	4.0	NM	0.6	1.7	2.3	3.7
ROE (UBS)	6.1	3.4	5.1	(3.6)	(1.3)	0.9	1.8	4.8
Capital structure & Coverage (x)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Net debt / EBITDA	3.7	5.6	5.6	NM	17.7	11.6	9.6	6.8
Net debt / total equity %	44.0	52.8	63.2	88.5	105.5	116.4	119.7	113.5
Net debt / (net debt + total equity) %	30.5	34.5	38.7	46.9	51.3	53.8	54.5	53.2
Net debt/EV %	34.1	48.9	46.0	66.7	69.6	71.4	71.8	71.1
Capex / depreciation %	NM	NM	NM	NM	NM	NM	136.4	90.9
Capex / revenue %	20.4	19.0	13.8	16.4	13.8	10.4	5.7	3.4
EBIT / net interest	NM	5.5	3.1	NM	0.3	1.2	1.5	2.5
Dividend cover (UBS)	3.0	1.7	2.7	-	-	0.4	0.9	2.3
Div. payout ratio (UBS) %	32.8	57.7	36.8	-	-	236.7	117.3	43.8
Revenues by division (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Steel (Net)	449,745	469,377	459,520	395,577	435,135	479,464	528,309	582,461
Other Businesses (Net)	0	0	0	0	0	0	0	0
Others	0	0	0	0	0	0	0	0
Total	449,745	469,377	459,520	395,577	435,135	479,464	528,309	582,461
EBIT (UBS) by division (Rsm)	03/13	03/14	03/15	03/16E	03/17E	03/18E	03/19E	03/20E
Others	34,437	23,613	31,045	(15,183)	4,860	18,972	26,613	44,842
Total	34,437	23,613	31,045	(15,183)	4,860	18,972	26,613	44,842

Source: Company accounts, UBS estimates. (UBS) metrics use reported figures which have been adjusted by UBS analysts.

Tata Steel Investment case

The debate around Tata Steel has focused on the progress of its Kalinganagar expansion, conditions in Europe (and the sale of its long products business), and the high levels of debt. We expect these issues to clear on a one- to two-year view. Kalinganagar adds capacity in attractive segments in India, although market conditions in the short term are to remain tough. UBS is relatively positive on Europe as a market and post the long products disposal, we believe Tata Steel should have more profitable exposure. Union issues in the UK are also be close to final resolution in our view. All this benefits cash flow and we believe the anticipated improvement in cash flow and debt represents an interesting turning point.

JSW Steel Investment case

We believe JSW presents a balanced way to play the favourable long-term prospects in the Indian steel market. It is focused on India with a successful programme of capacity expansion almost complete. It is a market leader in terms of efficiency and profitability which leaves it well positioned to drive earnings/cash if market conditions remain tepid. And while debt is high relative to history, this is set to reduce from FY16E. We see risks remain over its relative lack of raw material security compared with some peers, although this has been an advantage in a period of low prices.

Steel Authority of India Investment case

As market leader and a pure-play on the Indian market and an SOE, SAIL is particularly geared to the infrastructure/urbanisation story which is a priority of the Modi BJP government. In a sustained growth environment, we also see operational and financial leverage. Yet in the short term, we expect residual capex from the capacity expansion programme to slow FCF improvement and weigh on the valuation / investor sentiment. We see relatively safer ways to play many of the same themes in the short/medium term, such as JSW Steel.

Jindal Steel & Power Investment case

We like the asset base in both power and steel, so we believe JSPL will be well placed into the long term for a demand recovery in India. But regulatory noise around fuel availability in coal in particular, high levels of debt and a CBI (Central Bureau of Investigation) investigation into the chairman are of greater current concern to investors, in our view. From an equity perspective, we believe this means the risk reward bands are very wide. A weaker growth environment than we anticipate or an equity raising to repair the balance sheet could suggest >50% downside. Yet an option remains on these issues being resolved and deleveraging driving material equity upside. We do not think the risk reward is compelling in either direction, which drives our Neutral rating.

Statement of Risk

We believe the major risks for the steel sector are: 1) Steel prices—earnings are highly sensitive to steel prices, which are in turn significantly influenced by the international markets. A significant slowdown/recession in China can have an adverse impact on steel prices and hence on the company's financials. 2) Regulatory issues—To execute its day-to-day business, a steel company has to deal with several government agencies and statutory bodies in various states, as well as at the centre. Regime changes and retrospective amendments to laws/rules can have a significant impact on a company's business. 3) Demand environment—A slowdown in India in general and more specifically a slowdown in steel consumption could pose a significant problem to the company's business. 4) Raw materials—Steel companies source raw materials domestically as well as internationally, which form a large portion of the company's cost structure. There could be several incidents, including adverse weather, which can cause a significant spike in the prices of such raw materials, and could potentially derail a company's profitability.

Tata Steel—is exposed to a variety of residual risks relating to its acquisition of Corus in 2007. These include weak performance in long products and the ongoing sales process of this unit, a pension deficit in the UK and associated industrial action, patchy economic recovery across the Eurozone, and currency.

JSW Steel—has almost no captive raw material supply, which limits its control over its operations and reduces operational gearing into any recovery in global raw material / steel prices.

JSPL—continues to work through a number of residual regulatory issues. These mainly relate to raw material supply in both steel and power, and include Indian FBI charges against its chairman, Mr Naveen Jindal, and de-allocation of coal blocks won in the recent coal auction process.

SAIL—remains majority-owned by the government. While implicit state support is positive there is a risk of direct intervention in operations or financial policy which could be detrimental to minority shareholders.

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12-Month Rating	Definition	Coverage ¹	IB Services ²
Buy	FSR is > 6% above the MRA.	49%	33%
Neutral	FSR is between -6% and 6% of the MRA.	40%	26%
Sell	FSR is > 6% below the MRA.	12%	18%
Short-Term Rating	Definition	Coverage ³	IB Services ⁴
Buy	Stock price expected to rise within three months from the time the rating was assigned because of a specific catalyst or event.	less than 1%	less than 1%
Sell	Stock price expected to fall within three months from the time the rating was assigned because of a specific catalyst or event.	less than 1%	less than 1%

Source: UBS. Rating allocations are as of 30 September 2015.

1:Percentage of companies under coverage globally within the 12-month rating category. 2:Percentage of companies within the 12-month rating category for which investment banking (IB) services were provided within the past 12 months.

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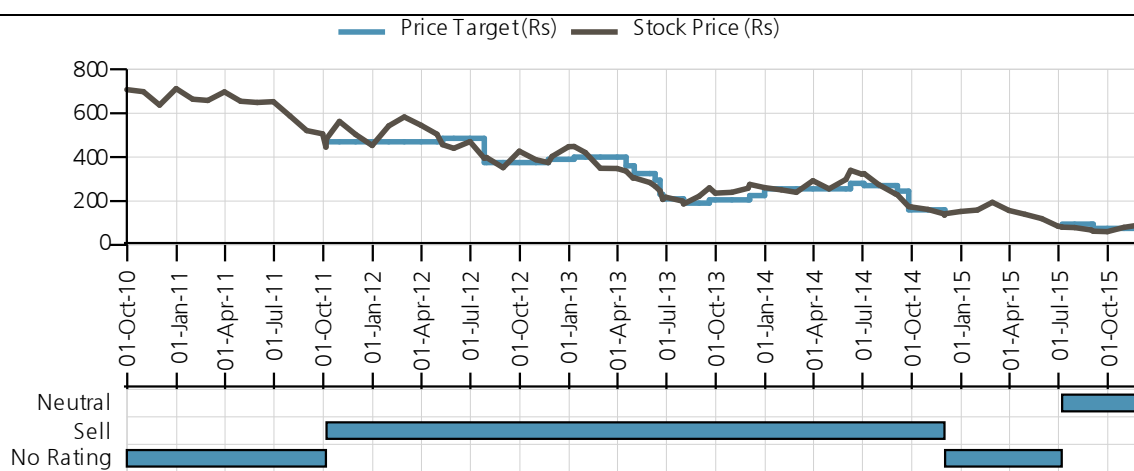
Company Name	Reuters	12-month rating	Short-term rating	Price	Price date
Jindal Steel & Power	JNSP.BO	Neutral	N/A	Rs91.10	30 Nov 2015
JSW Steel	JSTL.BO	Buy	N/A	Rs904.35	30 Nov 2015
Steel Authority of India	SAIL.BO	Neutral	N/A	Rs45.75	30 Nov 2015
Tata Steel	TISC.BO	Buy	N/A	Rs230.05	30 Nov 2015

Source: UBS. All prices as of local market close.

Ratings in this table are the most current published ratings prior to this report. They may be more recent than the stock pricing date

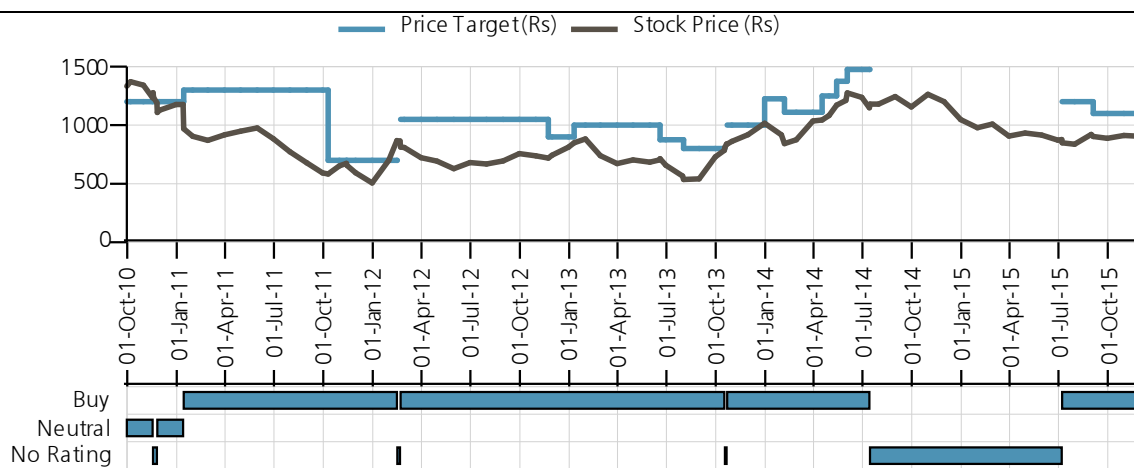
Unless otherwise indicated, please refer to the Valuation and Risk sections within the body of this report.

Jindal Steel & Power (Rs)



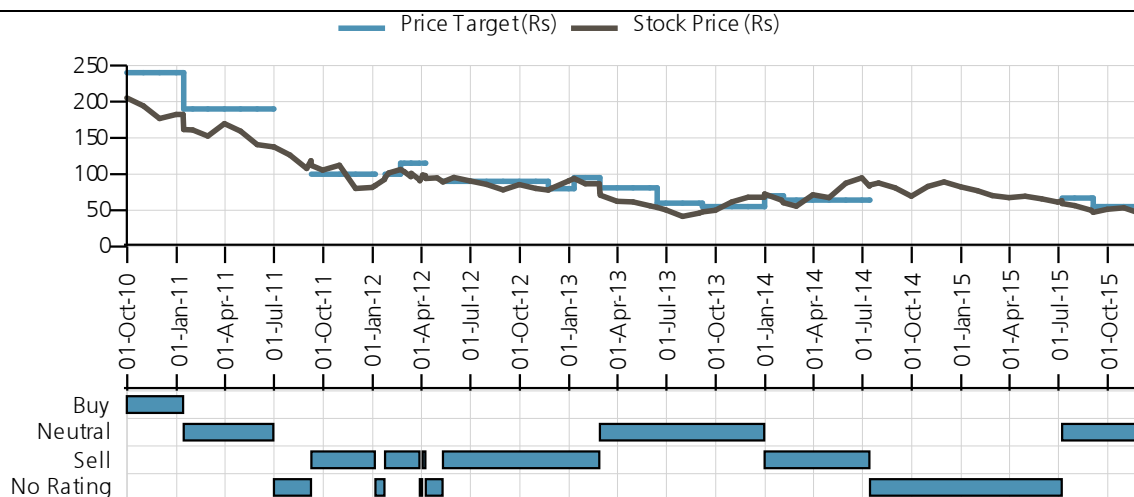
Source: UBS; as of 30 Nov 2015

JSW Steel (Rs)



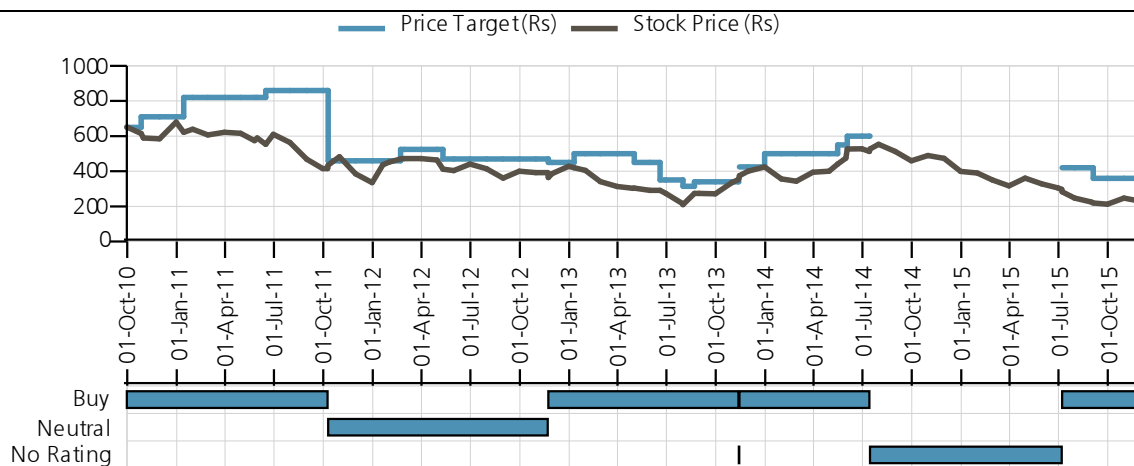
Source: UBS; as of 30 Nov 2015

Steel Authority of India (Rs)



Source: UBS; as of 30 Nov 2015

Tata Steel (Rs)



Source: UBS; as of 30 Nov 2015

Additional Prices: Bank of Baroda, Rs179.85 (30 Nov 2015); HDFC Bank, Rs1,075.95 (30 Nov 2015); IndusInd Bank, Rs933.50 (30 Nov 2015); Axis Bank, Rs468.85 (30 Nov 2015); Federal Bank, Rs58.60 (30 Nov 2015); State Bank of India, Rs250.45 (30 Nov 2015); ICICI Bank, Rs274.10 (30 Nov 2015); Punjab National Bank, Rs144.65 (30 Nov 2015); YES Bank, Rs766.50 (30 Nov 2015); Source: UBS. All prices as of local market close.

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