

Indian Steel Industry: December 2022 – A Trend Report

The outlook for the domestic steel industry in the New Year remains somewhat promising with the macroeconimic fundamentals like manufacturing & services PMI, IIP, core infrastructure growth remaining strong and inflation staying within RBI's comfort zone. Any further spike in Covid-19 infections in the country and subsequent disruptions in the industry's operations also look very unlikely. However, global headwinds like slump in China's property market, both the US and Europe facing a recession, and supply-chain issues due to ongoing Rusia-Ukraine war are expected to keep the Indian Steel industry cautiously optimistic going ahead.

WORLD ECONOMY AT A GLANCE

- As per Markit Economics Reports, December 2022 saw the downturn in the global manufacturing sector continue. Although the rate of decline in production eased slightly, the level of new business fell at a sharper pace. The J.P.Morgan Global Manufacturing PMI fell to a 30-month low of 48.6 in December 2022 and remained below the neutral 50.0 mark for the fourth successive month.
- Only seven out of the 29 nations for which December data were available had a PMI reading in expansion territory ~ India, Russia, Mexico, Colombia, Indonesia, the Philippines and Australia. The US, the UK and Brazil were the largest nations ranking towards the lower reaches of the PMI league table.
- As per the report, the trend in demand fared worse, with new orders falling at the quickest pace for over two-and-a-half years and new export business declining to one of the greatest extents since mid-2020.

| Key Economic Figures | | | | |
|---|-----------|-------------------|---------------|--|
| Country | GDP 2021: | Manufacturing PMI | | |
| | %change* | November 2022 | December 2022 | |
| India | 8.2 | 55.7 | 57.8 | |
| China | 8.1 | 49.4 | 49 | |
| Japan | 1.7 | 49 | 48.9 | |
| USA | 5.7 | 47.7 | 46.2 | |
| Eurozone | 5.2 | 47.1 | 47.8 | |
| Brazil | 4.6 | 44.3 | 44.2 | |
| Russia | 4.7 | 53.2 | 53 | |
| South Korea | 4.0 | 49 | 48.2 | |
| Germany | 2.9 | 46.2 | 47.1 | |
| Turkey | 11.0 | 45.7 | 48.1 | |
| Italy | 6.6 | 48.4 | 48.5 | |
| Source: GDP: official releases; PMI- Markit Economics, *provisional | | | | |

GLOBAL CRUDE STEEL PRODUCTION

World crude steel production stood at 1,691.4 mt in January-November 2022, registering a decline of 3.7% year-on-year (yoy), according to provisional data released by World Steel Association (worldsteel). In the month of November 2022, world crude steel production stood at 139.1 mt, down 2.6% yoy.

| World Crude Steel Production (Prov) | | | | |
|-------------------------------------|-----------------------------|-------------------|--------------|--|
| Rank | Тор 10 | Jan-Nov. '22 (mt) | % yoy change | |
| 1 | China | 935.1 | (-)1.4 | |
| 2 | India | 114.2 | 6.0 | |
| 3 | Japan | 82.3 | (-)6.9 | |
| 4 | USA | 74.4 | (-)5.5 | |
| 5 | Russia | 65.9 | (-)7.0 | |
| 6 | South Korea | 60.6 | (-)6.1 | |
| 7 | Germany | 34.2 | (-)7.9 | |
| 8 | Turkey | 32.5 | (-)12.3 | |
| 9 | Brazil | 31.5 | (-)5.9 | |
| 10 | Iran | 27.9 | 8.5 | |
| Top 10 | Top 10 Total 1,458.5 (-)2.2 | | (-)2.2 | |
| World | | 1,691.4 | (-)3.7 | |
| Source: worldsteel | | | | |

Major observations:

- China remained the leader in world crude steel production with an output of 935.1 mt in January-November 2022, a decline of 1.4% yoy. China's production in November 2022 stood at 74.5 mt, registering a yoy growth of 7.3%. The country accounted for 55.3% of world crude steel production during the January-November 2022 period.
- India was the 2nd largest producer of crude steel with an output of 114.2 mt in January-November 2022, showing a yoy growth of 6%. The country accounted for 6.8% of world crude steel production during the first 11 months of calendar year 2022. In November 2022, India's crude steel production stood at 10.4 mt, up by 5.7% yoy.
- Further, India and Iran were the only two countries among the top 10 steel producing countries in the world which registered growth in production during January-November 2022.
- Japan was the 3rd largest producer of crude steel with an output of 82.3 mt in January-November 2022 period, down by 6.9% yoy. Japan accounted for 4.9% of world crude steel production during the period. In November this year, the country's crude steel production stood at 7.2 mt, down by 10.7% yoy.

- With crude steel production of 74.4 mt (down 5.5% yoy), the USA was the 4th largest producer of crude steel during January-November 2022. In November 2022, the USA's crude steel production was 6.4 mt, which registered a yoy decline of 10.5%.
- Russia's crude steel production stood at 65.9 mt (down 7.0% yoy) in January-November 2022 period and the country was the 5th largest producer of crude steel. In November this year, the country's production stood at 5.6 mt, showing a yoy decline of 9.6%.
- The top 10 countries' cumulative production in January-November 2022 stood at 1,458.5 mt (down 2.2% yoy) and they accounted for 86.2% of world crude steel production during the period.
- Asian crude steel production stood at 1240.9 mt during January-November 2022, showing a 1.7% decline yoy, led primarily by China and India, with their respective shares of 75% and 9% in total Asian crude steel production during the period.

GLOBAL DRI PRODUCTION

India leads global DRI production in 2022 so far

World DRI production stood at 101.3 mt in January-November 2022 period, showing a yoy growth of 7.4%, according to provisional data released by worldsteel. In November 2022, world DRI production stood at 9.7 mt, up by 8.5% yoy.

| World DRI Production (Prov) | | | | |
|-----------------------------|--------------|-------------------|--------------|--|
| Rank | Тор 5 | Jan-Nov. '22 (mt) | % yoy change | |
| 1 | India | 38.1 | 6.8 | |
| 2 | Iran | 30.7 | 10.0 | |
| 3 | Russia | 6.9 | -2.0 | |
| 4 | Saudi Arabia | 6.2 | 11.7 | |
| 5 | Egypt | 5.5 | 13.8 | |
| Top 5 | Total | 87.4 | 7.9 | |
| World | | 101.3 | 7.4 | |
| Source: worldsteel | | | | |

Major observations:

- India remained the leader in world DRI production with an output of 38.1 mt (up 6.8% yoy) in January-November 2022 period. The country accounted for 37.6% of world DRI production during the first 11 months of 2022. In November this year, India's DRI production stood at 3.6 mt, up by 11.3% yoy.
- Iran was the 2nd largest producer of DRI with a cumulative production of 30.7 mt in January-November 2022 period (up 10% yoy). It accounted for 30.3% of world DRI production during the period. In November 2022, Iran's DRI production stood at 3.4 mt, showing a yoy growth of 27.1%.
- Russia ranked third in terms of DRI production with a cumulative output of 6.9 mt (down 2% yoy) during the first 11 months of 2022. The country accounted for 6.8% of world

DRI production during the period. In November 2022, the country's DRI production stood at 0.46 mt, down by 9.3% yoy.

• The top 5 countries accounted for nearly 86.3% of total world DRI production in January-November 2022 with a cumulative output of 87.4 mt, up by 7.9% yoy.

WORLD STEEL PRICE TRENDS

Global steel prices continued to remain under pressure from many sides in Dec 2022:

- a) the Russia-Ukraine conflict and its many-sided repercussions, from raw material supply to logistics to uncertainties in trade flows to the growing impact of sanctions
- b) developments in the Chinese market : fresh emergence of COVID-19 cases, persistent weakness in its property market where investment is falling at its fastest pace since early 2020, its earlier extreme heatwave conditions and its impact on disrupted power supply to manufacturing units and crippling demand and its overall bearish outlook
- c) fluctuations in prices of major raw materials for steel making which remained south bound at end of Q3 2022
- d) rising energy costs in Europe where persistence of high inflation is currently the biggest threat to financial stability and growth
- e) recessionary traits in the US and fear of the same sparking off a global recession
- f) concerns over a softening Chinese economy, where demand forecasts are being curtailed by leading agencies in view of its weak growth prospects and its possible adverse impact on the rest of Asia

Steel prices thus remained largely south-bound during Q3 2022 with rises if any, noted with caution and with most participants adopting a wait-and-watch outlook – for markets to stabilise before they return for significant volume of transactions. Relevant to note here that with the exception of India and Iran, global crude steel production in January-November 2022 remained on a declining trend in all the major steel producing markets.

Long Products

- Rebar / TMT prices have seen fluctuations in all the major markets, due to a mix of seasonal factors, local supply-demand imbalance and policy impact.
- Chinese rebar prices have suffered from severe demand crisis owing to raging COVID-19 (fresh cases have raised alarm), its extreme heatwave conditions earlier crippling demand and hampering power supply to steel units and its sinking property market impacting sentiments. Adding to the woes, World Bank has cut its China growth outlook for this year and next, citing the impact of the abrupt loosening of strict Covid-19 containment measures and persistent property sector weakness.

- Supply-demand imbalance and declining raw material prices have impacted rebar prices in the USA while stable demand for continuing construction season has kept Russian rebar prices steady.
- Demand in the European steel rebar market remained depressed amid weak enduser consumption, impact of Russian crisis and a continued wait-and-watch policy among buyers.



Flat Products

- HRC prices have started off 2022 on a slow note but have peaked in April 2022 (except China), dipping steadily thereafter till December 2022.
- The above peaking may well be attributed to the impact of the Russia-Ukraine crisis a feature noted for rebar prices as well.
- Chinese flat steel prices have been affected by the same set of pervasive and persistent factors as in case of long products while supply-demand imbalance has impacted flat prices in the USA largely.
- Like long products, European HRC prices too have been impacted by the Russian crisis, weak market conditions, surging energy costs and overall bearish sentiments.
- Russian HRC prices remained stable in view of slow but stable local market, with exports increasingly gaining traction.



[Source Credit: Fastmarkets Metal Bulletin]

RAW MATERIAL SCENARIO

Prices of major raw materials for steel making – iron ore, scrap, coal - have peaked in March 2022, soon after the onset of the Russia-Ukraine war and have largely slipped thereafter, impacted by dull demand-supply conditions in most markets around the globe.



[Source Credit: Fastmarkets Metal Bulletin, Platts, JPC (India news)]

NEWS AROUND THE GLOBE

- ArcelorMittal is to acquire Riwald Recycling, a Netherlands-based ferrous scrap metal recycling business, the steelmaker announced recently. This will be AreclorMittal's third scrap processor acquisition this year as it seeks to reinforce the role that scrap can play in its efforts to decarbonize.
- South Korea's POSCO plans to have all 18 steel mills at its Pohang Works fully operational by end January 2023, the steelmaker said recently, after it had to shut all 18 plants in September 2022 due to flooding caused by Typhoon Hinnamnor.
- China's largest steelmaker Baowu Group gaining approval from the State Council to absorb Sinosteel Group is likely to drive supply chain consolidation in the steel industry as companies seek greater influence over steel-related raw material prices.

- Some euro 45 billion EU steel exports are still at risk despite a revision to the EU's Emissions Trading System which sets stronger incentives for the uptake of clean technologies, European steel association Eurofer said.
- Danieli will construct a new bar and wire rod mill for Indian steel roller Tata Steel Long Products. Danieli will produce 500,000 mt/year of bars and wire rod.
- Tosyali Algerie, a subsidiary of Turkish steelmaker Tosyali Holdings, plans to start production at its 2 million mt/year flat steel mill in Algeria in 2024.
- A World Trade Organisation panel determined that US' steel and aluminium tariffs are inconsistent with international trade obligations and recommended that modifications to the duty programme be made, the WTO said.
- The European Commission has initiated the review of safeguard measures concerning the import of 26 steel products to determine whether they should be terminated in mid-2023, a year earlier than planned.
- Hot-rolled coil prices in the United States climbed past \$35 per hundredweight on the last business day of the year despite the market remaining quiet and the price direction for 2023 unclear.
- Seaborne iron ore prices increased slightly in end-2022 with the Chinese government's intensified support for the real estate sector in the country, according to market sources.
- China's Tariff Committee of the State Council said that it will restart imposing coal import tariffs from April 1, 2023 after adopting a zero-tariff rate policy for eleven months. This includes coking coal. From April 1, 2023, the tariff rate for coking coal will be 3%. Depending on coal types, tariffs will range from 3% to 6%.

INDIAN STEEL MARKET ROUND-UP

The following is a status report on the performance of Indian steel industry during April-November 2022, based on provisional data released by Joint Plant Committee (JPC) in its MIS Report for April-November 2022. It is to be noted that total finished steel includes both non-alloy and alloy (including stainless steel) and all comparisons are made with regard to same period of last year.

| ltem | Performance of Indian steel industry | | | |
|--|--------------------------------------|----------------|---------|--|
| | April-November | April-November | % | |
| | 2022*(mt) | 2021 (mt) | change* | |
| Crude Steel Production | 81.962 | 77.586 | 5.6 | |
| Hot Metal Production | 52.361 | 51.159 | 2.4 | |
| Pig Iron Production | 3.942 | 3.911 | 0.8 | |
| Sponge Iron Production | 28.117 | 25.859 | 8.7 | |
| Total Finished Steel (alloy/stainless + non-alloy) | | | | |
| Production | 78.090 | 73.021 | 6.9 | |
| Import | 3.751 | 3.063 | 22.5 | |

| Export | 4.299 | 9.531 | -54.9 | |
|--|--------|--------|-------|--|
| Consumption | 75.340 | 67.325 | 11.9 | |
| Source: JPC: *provisional: mt=million tonnes | | | | |

Overall Production

- Crude Steel: Production at 81.962 million tonnes (mt), up by 5.6%.
- Hot Metal: Production at 52.361 mt, up by 2.4%.
- **Pig Iron:** Production at 3.942 mt, up by 0.8%.
- **Sponge Iron:** Production at 28.117 mt, up by 8.7%, led by coal-based route (81% share).
- **Total Finished Steel:** Production at 78.090 mt, up by 6.9%.

Contribution of Other Producers

- **Crude Steel:** SAIL, RINL, TSL Group, AM/NS, JSWL & JSPL together produced 49.543 mt (60% share) during this period, up by 3.1%. The rest (32.419 mt) came from the Other Producers, up by 9.8%.
- Hot Metal: SAIL, RINL, TSL Group, AM/NS, JSWL & JSPL together produced 47.511 mt (91% share) up by 4%. The rest (4.85 mt) came from the Other Producers, down by 11.5%.
- **Pig Iron:** SAIL, RINL, TSL Group, AM/NS, JSWL & JSPL together produced 0.918 mt (23% share) down by 12.7%. The rest (3.024 mt) came from the Other Producers, up by 5.8%.
- **Total Finished Steel:** SAIL, RINL, TSL Group, AM/NS, JSWL & JSPL together produced 44.493 mt (57% share) up by 6.1%. The rest (33.597 mt) came from the Other Producers, up by 8.1%.

Contribution of Public Sector Units (PSU)

- **Crude Steel:** With 83% share, the Private Sector (67.759 mt, up by 7.9%) led crude steel production compared to the 17% contribution of the PSUs (down by 3.9%).
- **Hot Metal:** With 71% share, the Private Sector (37.221 mt, up by 6.1%) led hot metal production, compared to the 29% contribution of the PSUs (down by 5.8%).
- **Pig Iron:** With 92% share, the Private Sector (3.642 mt, up by 5.1%) led pig iron production, compared to the 8% contribution of the PSUs (down by 32.8%).
- **Total Finished Steel:** With 85% share, the Private Sector (66.197 mt, up by 7.2%) led production of total finished steel, compared to the 15% contribution of the PSUs (up by 5.5%).

Contribution of Flat /Non-Flat in Finished Steel

- **Production**: Non-flat products accounted for 54% share (up by 8.7%), the rest 46% was the share of flats (up by 5%).
- **Import**: Flat products accounted for 93% share (up by 25.4%), the rest 7% was the share of non-flats (down by 7.8%).
- **Export**: Flat products accounted for 86% share (down by 50.8%), the rest 14% was the

share of non-flats (down by 69.9%).

• **Consumption**: Led by Non-flat steel (54% share; up by 8.5%) while the rest 46% was the share of flat steel (up by 16.2%).

Finished Steel Production Trends

- At 78.090 mt, production of total finished steel was up by 6.9%.
- Contribution of the non-alloy steel segment stood at 71.941 mt (92% share, up by 5.2%), while the rest was the contribution of the alloy steel segment (including stainless steel).
- In the non-alloy, non-flat segment, in volume terms, major contributor to production of total finished steel was Bars & Rods (32.382 mt, up by 8.1%) while growth in the non-alloy, flat segment was led by HRC (29.766 mt, up by 1.6%) during this period.

Finished Steel Export Trends

- Overall exports of total finished steel at 4.299 mt, down by 54.9%.
- Volume wise, HR Coil/Strip (2.277 mt) was the item most exported (53% share in total finished steel). Major share (60%) of such exports was from Alloy/Stainless.
- Vietnam (0.623 mt) was the largest export market for India.

Finished Steel Import Trends

- Overall imports of total finished steel at 3.751 mt, up by 22.5%.
- India was a net exporter of total finished steel in April-November 2022.
- Volume wise, HR Coil/Strip (1.22 mt) was the item most imported (33% share in total finished steel).
- Korea (1.495 mt) was the largest import market for India (40% share in total).

Finished Steel Consumption Trends

- At 75.340 mt, consumption of total finished steel was up by 11.9%.
- Contribution of the non-alloy steel segment stood at 69.744 mt (93% share, up by 11.9%), while the rest was the contribution of the alloy steel segment (including stainless steel).
- In the non-alloy, non-flat segment, in volume terms, major contributor to consumption of total finished steel was Bars & Rods (31.697 mt, up by 7.8%) while growth in the non-alloy, flat segment was led by HRC (28.977 mt, up by 18.3%) during this period.



INDIAN ECONOMY – HIGHLIGHTS OF PERFORMANCE

GDP: As per provisional estimates of the Central Statistics Office (CSO), Ministry of Statistics and Programme Implementation, Real Gross Domestic Product (GDP) at Constant (2011-12) Prices in Q2 2022-23 is estimated to attain a level of \gtrless 38.17 lakh crore, as against $\end{Bmatrix}$ 35.89 lakh crore in Q2 2021-22, showing a growth of 6.3 per cent. Barring *Manufacturing* and *Mining & Quarrying*, all the other sectors reported growth during this period, with *Trade, Hotels, Transport, Communications and Services related to Broadcasting* sector reporting the highest growth (14.7%) and *Manufacturing* sector, the lowest (-4.3%).

Industrial Production: Provisional CSO data show that the overall Index of Industrial Production (IIP) for April-October 2022 rose by 5.3% over same period of last year, encouraged by similar high levels of growth trends noted for the various sectors/subsectors.

Infrastructure Growth: Provisional data released by the DPIIT indicate that the Index for the Eight Core Infrastructure Industries saw a growth of 8% during April-November 2022 with all the sectors, barring only crude oil, reporting increase in output.

Inflation: The rate of inflation based on Consumer Price Index stood at 5.88% and that on Wholesale Price Index stood at 5.85% in November 2022. Both the inflation rates came down compared with October 2022.

Prepared by: Joint Plant Committee