

Industry **Metals**
Bloomberg **ASTRA IN**
BSE CODE **532830**

Structural changes will assist margin expansion

| RATING | BUY |
|------------------|------|
| CMP | 1209 |
| Price Target | 1380 |
| Potential Upside | 14% |

| | |
|-----------------|---|
| Rating Change | ↔ |
| Estimate Change | ↑ |
| Target Change | ↔ |

| STOCK INFO | |
|---------------------|----------|
| 52wk Range H/L | 1265/848 |
| Mkt Capital (Rs Cr) | 18229 |
| Free float (%) | 40% |
| Avg. Vol 1M (,000) | 100 |
| No. of Shares (Crs) | 15 |
| Promoters Pledged % | 0% |

3QFY20 Result update

- ASTRAL reported revenue of Rs. 664 Cr. grew by 4.8% YoY largely on account of volume growth of 15% YoY (inclusive of REX volume) in pipes segment while drop in realization by 7.3% YoY offset the same.
- Adhesive business contributed revenue of Rs. 156 Cr. grew by 2.6% YoY on the back of structural changes, distribution channels, logistics etc.
- Pipes business production as well as sales volume (inclusive Rex volume) grew by 15% YoY at 31637 MT and 32053 MT respectively. However, without Rex Business volume growth is around 6.5% YoY.
- Drop in realization by 7.3% YoY during the quarter was on the back of fall in PVC prices.
- Gross margin expansion by 400 bps to 39.6% was mainly due to structural change in the Resinova business while this doesn't shift towards EBITDA margin due to various structural changes, logistics, distribution channel etc.
- EBITDA in 3QFY20 is Rs. 118 Cr. with an EBITDA margin of 17.8% (up 30 bps QoQ and 300 bps YoY).
- PAT during the quarter stood at Rs. 68 Cr. led by lower finance cost and reduced tax rates.
- Current capacity utilization level is ~60% and management is targeting to expand the same to 75-80% utilization level. Incremental capex will be substantially low for FY21.
- Management is focusing of reducing the debt from current level (Rs. 140 Cr.) to nil by FY21.

View and Valuation

Margin expansion on sequential basis due to structural changes, favorable product mix and operating leverage benefits in 3QFY20. Extended monsoon impacted the volume growth in 3QFY20 however management expects double digit volume growth going ahead. Looking forward the capacity addition and current utilization level at 60% incremental Capex won't be higher in FY21. Management is focusing to expand the utilization level to 75-80%. Post completion of these structural changes, Adhesive Business is expected to outperform by double digit growth. We remain at our stance to BUY the stock with a target price of Rs. 1380 (at 29.5x FY21E EV/EBITDA).

Key Risks to our rating and target

- Revenue growth in adhesive business.
- Volatility in raw material prices continued.

Fig in Rs Cr

| KEY FINANCIAL/VALUATIONS | FY17 | FY18 | FY19 | FY20E | FY21E |
|--------------------------|-------|-------|-------|-------|-------|
| Net Sales | 1,889 | 2,106 | 2,507 | 2868 | 3364 |
| EBITDA | 264 | 317 | 385 | 497 | 555 |
| EBIT | 214 | 260 | 304 | 387 | 440 |
| PAT | 145 | 175 | 196 | 277 | 309 |
| EPS (Rs) | 12 | 15 | 16 | 23 | 26 |
| EPS growth (%) | 42 | 24 | 10 | 41 | 11 |
| ROE (%) | 17 | 17 | 15 | 18 | 17 |
| ROCE (%) | 22 | 23 | 21 | 23 | 22 |
| BV | 71 | 85 | 107 | 127 | 150 |
| P/B (X) | 7.74 | 9.87 | 10.86 | 9.50 | 9.20 |
| P/E (x) | 45.50 | 56.31 | 70.95 | 52.62 | 53.83 |

The views expressed above accurately reflect the personal views of the authors about the subject companies and its(their) securities. The authors have not and will not receive any compensation for providing a specific recommendation or view. Narnolia Financial Advisors Ltd. does and seeks to do business with companies covered in its research reports. As a result, investors should be aware that the firm may have a conflict of interest that could affect the objectivity of this report. Investors should consider this report as only a single factor in making their investment decision.

Lower raw material cost improved margins

3QFY20 Results

Consolidated

Fig in Rs Cr

| FINANCIALS | 3QFY19 | 4QFY19 | 1QFY20 | 2QFY20 | 3QFY20 | YoY % | QoQ% | FY18 | FY19 | YoY % |
|------------------|--------|--------|--------|--------|--------|--------|--------|-------|-------|-------|
| Net Sales | 634 | 775 | 607 | 678 | 664 | 4.8% | -2.1% | 2,106 | 2507 | 19.1% |
| Other Income | 3 | 4 | 7 | 3 | 2 | -30.8% | -26.7% | 13 | 15 | 22% |
| Total Income | 637 | 779 | 613 | 681 | 666 | 4.6% | -2.2% | 2,119 | 2523 | 19.1% |
| COGS | 419 | 515 | 388 | 416 | 401 | -4.1% | -3.6% | 1,383 | 1648 | 19.1% |
| Employee Cost | 39 | 36 | 43 | 47 | 43 | 11.7% | -8.9% | 106 | 139 | 30.7% |
| Other Expenses | 83 | 105 | 83 | 96 | 102 | 22.5% | 6.1% | 299 | 336 | 12.1% |
| Expenditure | 540 | 656 | 514 | 559 | 546 | 1.1% | -2.4% | 1,789 | 2122 | 18.6% |
| EBITDA | 94 | 119 | 93 | 119 | 118 | 26.2% | -0.7% | 317 | 385 | 21.5% |
| EBITDAmargin | 14.8% | 15.4% | 15.3% | 17.5% | 17.8% | 20.4% | 1.5% | 15.0% | 15.4% | 2.1% |
| Depreciation | 20 | 22 | 24 | 27 | 27 | 35.7% | 0.7% | 57 | 81 | 42.5% |
| EBIT | 73 | 97 | 69 | 92 | 91 | 23.6% | -1.1% | 260 | 304 | 16.9% |
| Interest | 1 | 6 | 7 | 9 | 5 | 529.6% | -42.7% | 22 | 26 | 19.2% |
| PBT | 76 | 94 | 68 | 86 | 88 | 15.9% | 2.3% | 251 | 287 | 14.4% |
| Exceptional Item | 0 | 0 | 0 | 0 | 0 | - | - | - | 0 | - |
| Tax | 24 | 29 | 20 | 3 | 19 | -17.5% | 470.6% | 72 | 86 | 18.8% |
| PAT | 53 | 62 | 47 | 82 | 68 | 28.8% | -17.5% | 175 | 196 | 11.8% |

Operating Matrix

| PIPE | 4QFY18 | 1QFY19 | 2QFY19 | 3QFY19 | 4QFY19 | 1QFY20 | 2QFY20 | 3QFY20 | YoY % |
|---------------------|--------|--------|--------|--------|--------|--------|--------|--------|-------|
| Production (In M.T) | 29532 | 23288 | 26281 | 27563 | 35887 | 32752 | 35601 | 31637 | 14.8% |
| Sales (In M.T) | 31618 | 22476 | 27250 | 27882 | 38877 | 31729 | 34620 | 32053 | 15.0% |
| Sales (Rs.cr) | 504 | 344 | 438 | 444 | 606 | 473 | 545 | 520 | 17.2% |
| EBITDA (Rs.cr) | 89 | 62 | 75 | 79 | 98 | 79 | 103 | 102 | 29.2% |
| EBITDA margin (%) | 18% | 18% | 17% | 18% | 16% | 17% | 19% | 20% | 10.2% |
| PAT (Rs.cr) | 44 | 25 | 33 | 42 | 47 | 34 | 70 | 57.7 | 38.7% |

| ADHESIVES | 4QFY18 | 1QFY19 | 2QFY19 | 3QFY19 | 4QFY19 | 1QFY20 | 2QFY20 | 3QFY20 | YoY % |
|--------------------------|--------|--------|--------|--------|--------|--------|--------|--------|-------|
| Adhesives Sales (Rs.cr) | 156 | 141 | 158 | 152 | 184 | 145 | 148 | 156 | 2.6% |
| Adhesives EBITDA (Rs.cr) | 32 | 20 | 24 | 16 | 25 | 21 | 20 | 19 | 14.0% |
| EBITDA margin (%) | 20% | 14% | 15% | 11% | 14% | 14% | 14% | 12% | 11.1% |

Revenue growth of 4.8% YoY led by volume growth in pipe business

Net Sales during the quarter is at Rs. 664 Cr. largely driven by volume growth in Pipe segment business of 15% YoY inclusive of REX volumes. However, without REX volumes it's around 6.5% YoY. Meanwhile the fall in PVC prices dropped realization by 7.4% YoY. Adhesive business grew by 2% YoY due to structural changes yet expected to grow by 15-20% going ahead.

Margin expansion on account of reduced cost of material per ton

Gross margins expansion to 38.6% (up 90 bps QoQ and 560 bps YoY) in 3QFY20 on the basis of reduced raw material prices, structural changes (contributed 400 BPS in Resinova business) etc . However the same is not shifted towards EBITDA margin expansion due to these ongoing structural changes. EBITDA in 3QFY20 is Rs. 118 Cr. with an EBITDA margin of 17.8% (up 30 bps QoQ and 300 bps YoY).

PAT growth due to lower tax rates

PAT during the quarter stood at Rs. 68 Cr. with a PAT growth of 28.8% YoY due to lower tax expense and reduced finance cost. Higher depreciation further shrink PAT margin to 10.2% in 3QFY20.

Concall highlights

- Growth in piping business excluding REX volumes is around 6.5% YoY on account of CPVC, PVC pipes and new products (inclusive Rex business Volume growth is 15% YoY).
- Adhesive business changes have been made and structural change (change in distribution channel, verticals) in 1HFY20 had impacted negatively in 3QFY20. However, Management expects margins of 17-18% in Adhesive business going ahead.
- Management expects double digit growth in adhesive business from 1QFY20.
- Antidumping duties will not be impacting to CPVC business of the company.
- Gross margin expansion by 400 bps to 39.6% was mainly due to structural change in the Resinova business while this doesn't shift towards EBITDA margin due to various structural changes, logistics, distribution channel etc.
- Working capital cycle in pipes business improved to 26 days as compare to 31 days in 2QFY20, management is targeting to maintain it around 20 days going ahead.
- Receivable cycle of REX business reduced to 60 days in 3QFY20.
- Current capacity utilization level is ~60% and management is targeting to expand the same to 75-80% utilization level. Incremental capex will be substantially low for Fy21.
- Management is focusing of reducing the debt from current level (Rs. 140 Cr.) to nil in Fy21.
- New brand ambassador – Ranveer Singh is appointed for the next 3 years. Astral is also promoting its brand through IPL teams with – Mumbai Indians and Kolkata Knight Riders.

- **Expansion projects update:**
 - Hosur plant: The expansion is completed with respect to buying new machineries and added capacity along with few product lines. It will now make all products of Astral Pipes.
 - Ghiloth Plant: Expansion program started for double wall corrugated pipes is expected to complete by 4QFY21.
 - Orissa land was allotted in 2QFY20, started construction activity in 3QFY20 and is expected to run the same plant in next 9-10 months.
 - Sangli plant: Expansion program (adding, debottlenecking of few product line etc.) is going on and expected to complete by 4QFY20.
 - Santej plant: Automation to that plant (packaging, injection molding operation etc.) is ongoing along with capacity addition to Santej and Dholka plant. Injection molding capacity is also added to both the plants which will feed the requirement of 4QFY20.
 - Dholka plant: To make this an indigenous plant proving complete range of industrial and plumbing walls for which technology is procured through Europe in terms of plants available to manufacture the same.
 - Kenya plant: Land brought to expand the capacity earlier need to be sold which will reduce the interest burden and show positive returns.
- **Fittings business:** All products are available to Astral through in-house production. Management also added few PVC and CPVC fittings used for industrial purpose.
- PAX-A will be manufactured in-house in the next one year for which technology and machine sourcing will be completed in 4QFY20.

Exhibit: Net Sales (consol) and Growth Trend

Declining adhesive business revenue growth impacted the overall business growth..

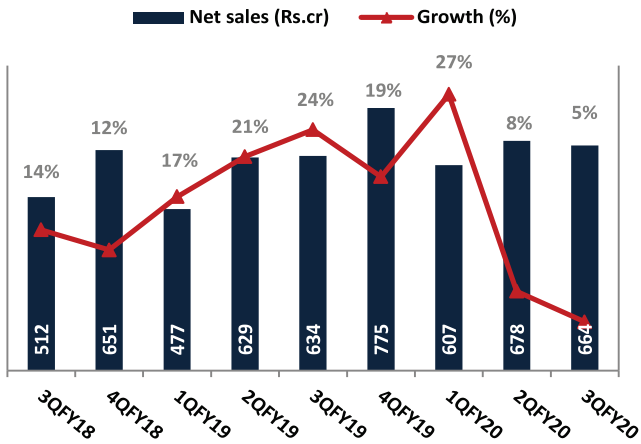


Exhibit: COGS (consol) and Gross Margin Trend

Lower raw material cost on per ton basis improved the Gross margins...

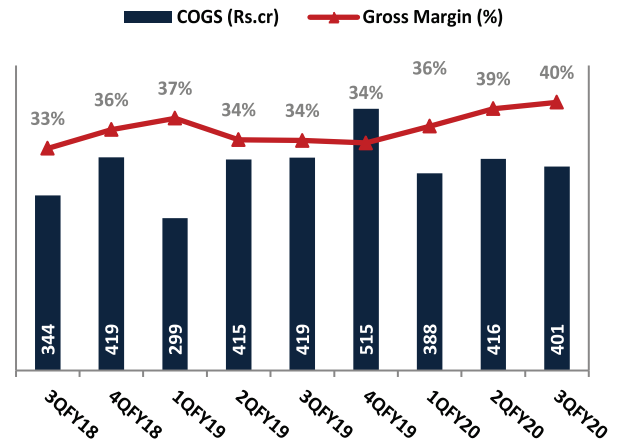


Exhibit: EBITDA (consol) and Margin Trend

Operating leverage benefit improved margins...

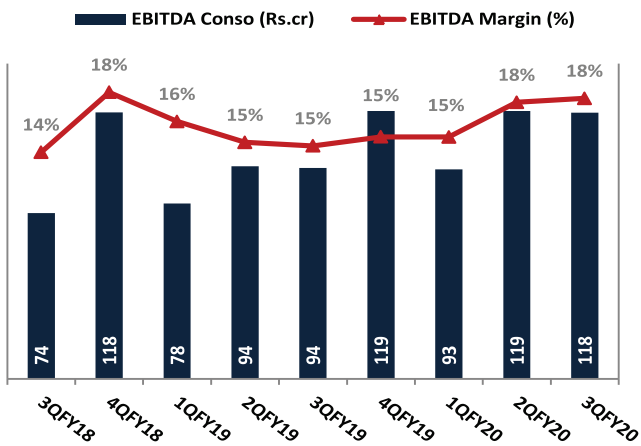


Exhibit: Pipe Business EBITDA and Margin Trend

Fall in realization off-set the reduced raw material prices halt margins from further expansion...

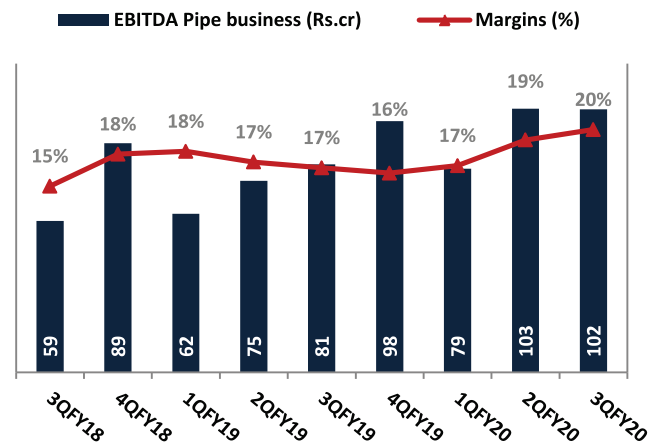


Exhibit: Adhesive Business EBITDA and Margin Trend

Margin declined due to structural changes yet it will drive higher margin going ahead....

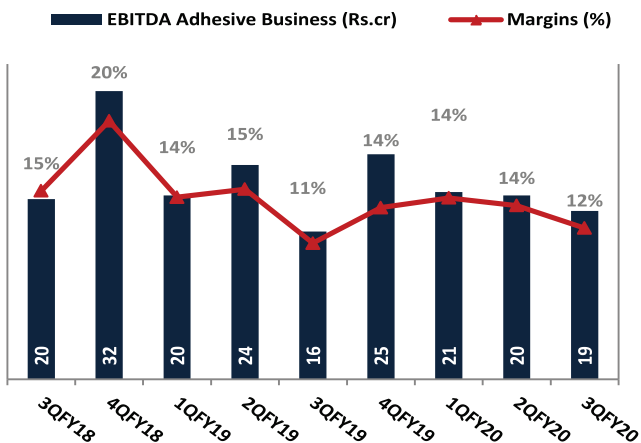
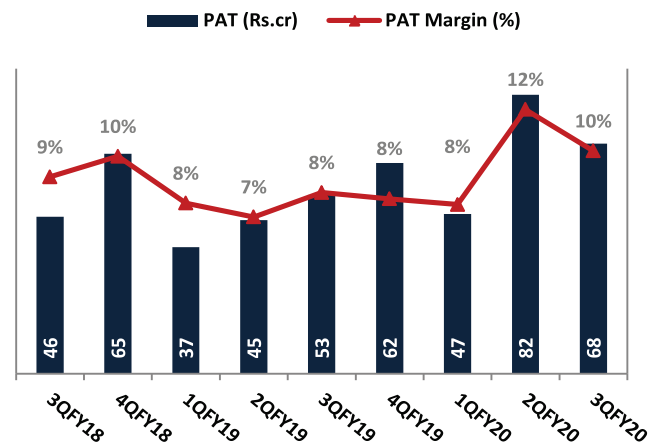


Exhibit: PAT (consol) and Margin Trend

Lower tax rates benefit availed in 2QFY20 reduced sequential PAT Margins..



Financial Details (Consolidated)

Balance Sheet

Fig in Rs Cr

| Y/E March | FY14 | FY15 | FY16 | FY17 | FY18 | FY19 | FY20E | FY21E |
|-------------------------------|------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|
| Share Capital | 11 | 12 | 12 | 12 | 12 | 12 | 15 | 15 |
| Reserves | 304 | 607 | 696 | 835 | 1,006 | 1,266 | 1,520 | 1,793 |
| Networth | 315 | 619 | 708 | 847 | 1,018 | 1,278 | 1,535 | 1,808 |
| Debt | 98 | 139 | 131 | 157 | 123 | 193 | 180 | 225 |
| Other Non Cur Liab | - | 0 | 0 | - | - | - | - | - |
| Total Capital Employed | 414 | 758 | 839 | 1,004 | 1,141 | 1,471 | 1,715 | 2,033 |
| Net Fixed Assets (incl CWIP) | 297 | 369 | 446 | 534 | 681 | 932 | 952 | 957 |
| Non Cur Investments | - | - | - | - | - | 0 | - | - |
| Other Non Cur Asst | - | - | 16 | 10 | 6 | 27 | 27 | 27 |
| Non Curr Assets | 308 | 597 | 690 | 787 | 932 | 1,228 | 1,256 | 1,368 |
| Inventory | 195 | 266 | 277 | 272 | 357 | 396 | 453 | 531 |
| Debtors | 145 | 233 | 227 | 339 | 307 | 339 | 388 | 455 |
| Cash & Bank | 1 | 12 | 50 | 17 | 44 | 98 | 282 | 445 |
| Other Curr Assets | 0 | 2 | 46 | 35 | 25 | 28 | 32 | 38 |
| Curr Assets | 387 | 568 | 614 | 675 | 743 | 871 | 1,166 | 1,482 |
| Creditors | 185 | 266 | 316 | 293 | 349 | 390 | 446 | 523 |
| Provisions (both) | 7 | 9 | 2 | 2 | 3 | 6 | 5 | 6 |
| Other Curr Liab | 77 | 99 | 30 | 35 | 32 | 39 | 44 | 52 |
| Curr Liabilities | 268 | 372 | 427 | 417 | 486 | 557 | 635 | 746 |
| Net Curr Assets | 119 | 196 | 187 | 259 | 257 | 315 | 531 | 736 |
| Total Assets | 694 | 1,165 | 1,304 | 1,462 | 1,675 | 2,099 | 2,422 | 2,850 |

Income Statement

Fig in Rs Cr

| Y/E March | FY14 | FY15 | FY16 | FY17 | FY18 | FY19 | FY20E | FY21E |
|----------------------------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|--------------|
| Revenue from Operation | 1,080 | 1,429 | 1,678 | 1,889 | 2,106 | 2,507 | 2,868 | 3,364 |
| Change (%) | 31% | 32% | 17% | 13% | 11% | 19% | 14% | 17% |
| Other Income | 2 | 4 | 2 | 9 | 13 | 15 | 14 | 10 |
| EBITDA | 155 | 168 | 208 | 264 | 317 | 385 | 497 | 555 |
| Change (%) | 35% | 8% | 24% | 27% | 20% | 22% | 29% | 12% |
| Margin (%) | 14% | 12% | 12% | 14% | 15% | 15% | 17% | 16% |
| Depr & Amor. | 22 | 36 | 42 | 50 | 57 | 81 | 110 | 115 |
| EBIT | 133 | 131 | 166 | 214 | 260 | 304 | 387 | 440 |
| Int. & other fin. Cost | 31 | 25 | 30 | 18 | 22 | 26 | 23 | 29 |
| EBT | 105 | 110 | 138 | 204 | 251 | 287 | 372 | 413 |
| Exp Item | 0 | 0 | -1 | -1 | 0 | 0 | 0 | 0 |
| Tax | 25 | 31 | 30 | 56 | 72 | 86 | 94 | 104 |
| Minority Int & P/L share of Ass. | 0 | 2 | -6 | -3 | -2 | -2 | 0 | 0 |
| Reported PAT | 79 | 76 | 102 | 145 | 175 | 196 | 277 | 309 |
| Adjusted PAT | 79 | 76 | 103 | 146 | 175 | 196 | 277 | 309 |
| Change (%) | 30% | -4% | 33% | 42% | 21% | 12% | 41% | 12% |
| Margin(%) | 7% | 5% | 6% | 8% | 8% | 8% | 10% | 9% |

Financial Details (Consolidated)

Key Ratios

| Y/E March | FY14 | FY15 | FY16 | FY17 | FY18 | FY19 | FY20E | FY21E |
|--------------------|--------|--------|--------|--------|--------|--------|--------|--------|
| ROE | 25.03% | 12.27% | 14.30% | 17.02% | 17.53% | 15.31% | 18.05% | 17.09% |
| ROCE | 33.65% | 17.75% | 19.76% | 22.05% | 22.87% | 21.07% | 22.96% | 22.29% |
| Asset Turnover | 1.55 | 1.23 | 1.29 | 1.29 | 1.26 | 1.19 | 1.18 | 1.18 |
| Debtor Days | 49 | 59 | 49 | 65 | 53 | 49 | 49 | 49 |
| Inv Days | 66 | 68 | 60 | 53 | 62 | 58 | 58 | 58 |
| Payable Days | 63 | 68 | 69 | 57 | 61 | 57 | 57 | 57 |
| Int Coverage | 4.28 | 5.16 | 5.48 | 11.61 | 12.03 | 11.80 | 16.54 | 15.03 |
| P/E | 33.13 | 69.11 | 49.59 | 45.50 | 56.31 | 70.95 | 52.62 | 53.83 |
| Price / Book Value | 8.29 | 8.48 | 7.09 | 7.74 | 9.87 | 10.86 | 9.50 | 9.20 |
| EV/EBITDA | 17.37 | 31.92 | 24.59 | 25.25 | 31.96 | 36.22 | 29.07 | 29.47 |
| Div Yield | 0.4% | 0.1% | 0.1% | 0.0% | 0.1% | 0.1% | 0.1% | 0.2% |

Cash Flow Statement

Fig in Rs Cr

| Y/E March | FY14 | FY15 | FY16 | FY17 | FY18 | FY19 | FY20E | FY21E |
|--------------------------------|------------|-------------|-------------|-------------|-------------|-------------|-------------|-------------|
| PBT | 105 | 110 | 131 | 201 | 248 | 283 | 372 | 413 |
| (inc)/Dec in Working Capital | -66 | -31 | 43 | -106 | 16 | 31 | (41) | (150) |
| Non Cash Op Exp | 52 | 65 | 81 | 64 | 81 | 103 | 134 | 144 |
| Int Paid (+) | 31 | 25 | 30 | 18 | 22 | 32 | 23 | 29 |
| Tax Paid | -23 | -26 | -29 | -44 | -63 | -77 | (94) | (104) |
| others | | | | | | | | |
| CF from Op. Activities | 67 | 117 | 226 | 114 | 282 | 342 | 371 | 303 |
| (inc)/Dec in FA & CWIP | -92 | -85 | -134 | -160 | -184 | -220 | (130) | (120) |
| Free Cashflow | -25 | 32 | 91 | -45 | 98 | 122 | 241 | 183 |
| (Pur)/Sale of Inv | 1 | 0 | 1 | 1 | 1 | 1 | 0 | - |
| others | | | | | | | | |
| CF from Inv. Activities | -91 | -343 | -203 | -158 | -185 | -293 | -130 | -120 |
| inc/(dec) in NW | 0 | 236 | 59 | 0 | 0 | 0 | - | - |
| inc/(dec) in Debt | 48 | 31 | -4 | 32 | -99 | -94 | (13) | 45 |
| Int. Paid | -31 | -25 | -30 | -19 | -21 | -31 | (23) | (29) |
| Div Paid (inc tax) | -4 | -5 | -9 | -3 | -8 | -9 | (22) | (36) |
| others | | | | | | 0 | - | - |
| CF from Fin. Activities | 13 | 237 | 16 | 10 | -71 | -5 | -59 | -20 |
| Inc(Dec) in Cash | -11 | 11 | 38 | -33 | 25 | 44 | 183 | 163 |
| Add: Opening Balance | 12 | 1 | 11 | 50 | 18 | 43 | 98 | 282 |
| Closing Balance | 1 | 12 | 50 | 16 | 43 | 89 | 281 | 445 |

Narnolia Financial Advisors Ltd. is a SEBI registered Research Analyst having SEBI Registration No. INH300006500. The Company/Analyst (s) does/do not have any holding in the stocks discussed but these stocks may have been recommended to clients in the past. Clients of Narnolia Financial Advisors Ltd. may be holding aforesaid stocks.

The stocks recommended are based on our analysis which is based on information obtained from public sources and sources believed to be reliable, but no independent verification has been made nor is its accuracy or completeness guaranteed.

Disclosures: Narnolia Financial Advisors Ltd. (NFAL) (Formerly Microsec Capital Ltd.) is a SEBI Registered Research Analyst having registration no. INH300006500. NFAL is engaged in the business of providing Stock Broking, Depository Participant, Merchant Banking, Portfolio Management & distribution of various financial products. Details of associate entities of NFAL is available on the website at www.narnolia.com

No penalties have been levied on NFAL by any Regulatory/Statutory authority. NFAL, its associates, Research Analyst or their relative may have financial interest in the subject company. NFAL and/or its associates and/or Research Analyst may have beneficial ownership of 1% or more securities in the subject company at the end of the month immediately preceding the date of publication of the Research Report. NFAL and its associate company(ies), their directors and Research Analyst and their relatives may; (a) from time to time, have a long or short position in, act as principal in, and buy or sell the securities or derivatives thereof of companies mentioned herein. (b) be engaged in any other transaction involving such securities and earn brokerage or other compensation or act as a market maker in the financial instruments of the company(ies) discussed herein or act as an advisor or lender/borrower to such company(ies) or may have any other potential conflict of interests with respect to any recommendation and other related information and opinions; however the same shall have no bearing whatsoever on the specific recommendations made by the analyst(s), as the recommendations made by the analyst(s) are completely independent of the views of the associates of NFAL even though there might exist an inherent conflict of interest in some of the stocks mentioned in the research report. Research Analyst may have served as director/officer, etc. in the subject company in the last 12 month period. NFAL and/or its associates may have received compensation from the subject company in the past 12 months. In the last 12 months period ending on the last day of the month immediately preceding the date of publication of this research report, NFAL or any of its associates may have: a) managed or co-managed public offering of securities from subject company of this research report, b) received compensation for investment banking or merchant banking or brokerage services from subject company of this research report, c) received compensation for products or services other than investment banking or merchant banking or brokerage services from the subject company of this research report. d) Subject Company may have been a client of NFAL or its associates during 12 months preceding the date of distribution of the research report. NFAL and its associates have not received any compensation or other benefits from the Subject Company or third party in connection with the research report. NFAL and / or its affiliates may do and seek to do business including Investment Banking with companies covered in the research reports. As a result, the recipients of this report should be aware that NFAL may have a potential conflict of interest that may affect the objectivity of this report. Compensation of Research Analysts is not based on any specific Merchant Banking, Investment Banking or Brokerage service transactions. Research Analyst's views on Subject Company may vary based on Fundamental research and Technical Research. Proprietary trading desk of NFAL or its associates maintains arm's length distance with Research Team as all the activities are segregated from NFAL research activity and therefore it can have an independent view with regards to subject company for which Research Team have expressed their views.

Analyst Certification The views expressed in this research report accurately reflect the personal views of the analyst(s) about the subject securities or issues, and no part of the compensation of the research analyst(s) was, is, or will be directly or indirectly related to the specific recommendations and views expressed by research analyst(s) in this report.

Disclosure of Interest Statement-

| | |
|---|-----|
| Analyst's ownership of the stocks mentioned in the Report | NIL |
|---|-----|

A graph of daily closing prices of securities is available at www.nseindia.com, www.bseindia.com.

Correspondence Office Address: Arch Waterfront, 5th Floor, Block GP, Saltlake, Sector 5, Kolkata 700 091; Tel No.: 033-40541700; www.narnolia.com.

Registered Office Address: Marble Arch, Office 201, 2nd Floor, 236B, AJC Bose Road, Kolkata 700 020; Tel No.: 033-4050 1500; www.narnolia.com

Compliance Officer: Manish Kr Agarwal, Email Id: mkagarwal@narnolia.com, Contact No.:033-40541700.

Registration details of Company: Narnolia Financial Advisors Ltd. (NFAL): SEBI Stock Broker Registration: INZ000166737 (NSE/BSE/MSEI); NSDL/CDSL: IN-DP-380-2018; Research Analyst: INH300006500, Merchant Banking: (Registration No.: INM000010791), PMS: (Registration No.: INP000002304), AMFI Registered Mutual Fund distributor: ARN 3087

Registration Details of Group entities: G. Raj & Company Consultants Ltd (G RAJ)-BSE Broker INZ260010731; NSDL DP: IN-DP-NSDL-371-2014 || Narnolia Commerce Limited (Formerly Microsec Commerce Ltd.)-MCX/NCDEX Commodities Broker: INZ000051636 || NarnoliaVelox Advisory Ltd.- SEBI Registered PMS: INP000005109 || Eastwind Capital Advisors Pvt Ltd. (EASTWIND)-SEBI Registered Investment Adviser: INA300005439 || Narnolia Insurance Brokers Limited (Formerly Microsec Insurance Brokers Ltd.)-IRDA Licensed Direct Insurance Broker (Life & Non-Life) Certificate No. 134, License No. DB046/02 || Narnolia Securities Ltd. (NSL)-AMFI Registered Mutual Fund distributor: ARN 20558, PFRDA NPS POP: 27092018 || Narnolia Capital Advisors Pvt. Ltd. - RBI Registered NBFC:B.05.02568.

Disclaimer:

This report has been prepared by Narnolia Financial Advisors Ltd. (NFAL) and is meant for sole use by the recipient and not for public circulation. The report and information contained herein is strictly confidential and may not be altered in any way, transmitted to, copied or distributed, in part or in whole, to any other person or to the media or reproduced in any form, without prior written consent of NFAL. The report is based on the facts, figures and information that are considered true, correct, reliable and accurate. The intent of this report is not recommendatory in nature. The information is obtained from publicly available media or other sources believed to be reliable. Such information has not been independently verified and no guaranty, representation of warranty, express or implied, is made as to its accuracy, completeness or correctness. All such information and opinions are subject to change without notice. The report is prepared solely for informational purpose and does not constitute an offer document or solicitation of offer to buy or sell or subscribe for securities or other financial instruments for the clients. Nothing in this report constitutes investment, legal, accounting and tax advice or a representation that any investment or strategy is suitable or appropriate to your specific circumstances. The securities discussed and opinions expressed in this report may not be suitable for all investors, who must make their own investment decisions, based on their own investment objectives, financial positions and needs of specific recipient. Certain transactions -including those involving futures, options, another derivative products as well as non-investment grade securities - involve substantial risk and are not suitable for all investors. Each recipient of this document should make such investigations as it deems necessary to arrive at an independent evaluation of an investment in the securities of companies referred to in this document (including the merits and risks involved), and should consult his/her/its own advisors to determine the merits and risks of such an investment. Though disseminated to all the customers simultaneously, not all customers may receive this report at the same time. NFAL will not treat recipients as customers by virtue of their receiving this report. Neither the Company, not its directors, employees, agents or representatives shall be liable for any damages whether direct or indirect, incidental, special or consequential including lost revenue or lost profits or lost opportunities that may arise from or in connection with the use of the information/report. The person accessing this information specifically agrees to exempt NFAL or any of its affiliates or employees from, any and all responsibility/liability arising from such misuse and agrees not to hold NFAL or any of its affiliates or employees responsible for any such misuse and further agrees to hold NFAL or any of its affiliates or employees free and harmless from all losses, costs, damages, expenses that may be suffered by the person accessing this information due to any errors and delays.

This report is not directed or intended for distribution to or use by any person or entity resident in a state, country or any jurisdiction, where such distribution, publication, availability or use would be contrary to law, regulation or which would subject NFAL & its group companies to registration or licensing requirements within such jurisdictions.