

India

**Overweight** (no change)

**Highlighted Companies**

**APL Apollo Tubes**

**ADD, TP Rs1611, Rs1317 close**

We expect a strong quarter for APL Apollo Tubes driven by higher sales volume salience of its new Raipur plant aiding a better sales mix and higher margins. We estimate EBITDA/t of Rs5,150 in 1QFY24F.

**Astral Ltd.**

**ADD, TP Rs1978, Rs1779 close**

We expect margin recovery in Astral across all its product segments, namely plastic products, adhesives, bathware and paints. The company is nearing capex completion, and we expect a significant improvement in FCF generation over FY24F-25F.

**Kajaria Ceramics**

**ADD, TP Rs1376, Rs1268 close**

Although sales volume growth of Kajaria Ceramics is still not in the best shape (high single-digit yoy), cheaper natural gas will lead to better margins for tiles business qoq. We also expect early signs of a recovery in revenue growth for bathware and plywood products in 1QFY24F.

**Summary Valuation Metrics**

P/E (x)	Mar22-A	Mar23-A	Mar24-F
APL Apollo Tubes	59.16	56.9	41.71
Astral Ltd.	73.88	101.14	82.46
Kajaria Ceramics	53.54	58.59	45.95

P/BV (x)	Mar22-A	Mar23-A	Mar24-F
APL Apollo Tubes	14.56	12.15	9.9
Astral Ltd.	15.3	17.63	14.95
Kajaria Ceramics	9.51	8.68	7.87

Dividend Yield	Mar22-A	Mar23-A	Mar24-F
APL Apollo Tubes	0.27%	0.38%	0.53%
Astral Ltd.	0.17%	0.13%	0.2%
Kajaria Ceramics	0.87%	0.71%	0.99%

**Analyst(s)**



**Rahul AGARWAL**

T (91) 22 4161 1553  
E rahul.agarwal@incredcapital.com

**Harshit SARAWAGI**

T (91) 22 4161 0000  
E harshit.sarawagi@incredcapital.com

# Industrial - Overall

## 1Q preview: Durables and building materials

- No more price hikes amid cheaper input prices would lead to our coverage universe witnessing weak revenue growth but higher margins yoy/qoq.
- Management interaction and channel check reveal weak summer sales in North/West India. Cable/wire, steel tube, bathware and PVC products did well.
- Good 1Q: Havells, Polycab, Finolex Cables, KEI, Astral, APL Apollo and Cera. Weak 1Q: CG Consumer, Orient Electric, Century Ply and Finolex Industries.

### Building materials fare better than consumer durables

B2C demand remained weak in 1QFY24 due to inflationary pressure as products were expensive owing to repeated price hikes taken in CY22. B2B/B2G demand has been supportive driven by public/private capex aiding cables, lighting, plastic pipe and steel tube sales volume growth in 1QFY24F. As regards summer sales, unseasonal rains negatively impacted sales of fans, coolers and room air-conditioners, more so in North and West India. South India saw a relatively better 1Q. We believe cables have done better vs. wires, switchgear continues to do well owing to decent real estate demand and also demand recovery for voltage stabilizers (room AC-related) and B2G lighting. As regards building materials, cheaper PVC and HRC prices boosted the demand for plastic pipes (agri season) and steel tubes (vs. low quality tubes). Bathware was stable while tiles and wood panel saw a relatively lower sales volume due to an oversupply problem.

### Expectations from consumer durable companies

We expect revenue growth of 10% yoy while a higher EBITDA/PAT growth of 20% yoy (on a low base) for our coverage universe cumulatively in 1QFY24F. C&W companies would see higher sales volume growth vs. durables, in our view. Flat selling prices yoy and cheaper input prices would lead to much higher gross/EBITDA margins yoy. We note that the base quarter (1QFY23) saw a significant margin erosion and hence, yoy performance appears to be optically better than average. We expect Havells, Polycab, KEI and Finolex Cables to report better results vs. CG Consumer and Orient Electric in 1QFY24F.

### Expectations from building material companies

We expect revenue growth of 15% yoy (6% excl. APL Apollo) and EBITDA/PAT growth of 25%+ yoy (16% excl. APL Apollo) for our coverage universe cumulatively. Cheaper PVC resin prices (down 15% qoq) led to strong sales volume growth of 20%+ yoy (good agri-season sales) for plastic pipe companies in 1Q, in our view. Raipur plant commissioning led to higher-than-average sales volume growth of 56% yoy for APL Apollo in 1Q. Cera's results should be in line with management's guidance while Kajaria Ceramics and Century Ply are likely to post sub-par sales volume growth yoy due to weakening demand trend.

### What do we prefer?

On the back of P/E-G matrix, we prefer APL Apollo, Astral and Kajaria in our coverage universe. Market share gain, improving sales mix, unutilized capacity, improving margins, high RoCE and higher incremental FCF generation over FY24F-25F are key positives.

**Figure 1: 1QFY24F earnings estimates summary**

	Revenue	% yoy	EBITDA	% yoy	PAT	% yoy
Havells India	46,319	9.1	4,840	33.9	3,199	31.5
CG Consumer Electricals	19,776	6.2	2,343	6.6	1,448	19.7
V-Guard Industries	11,282	10.8	1,072	30.7	569	6.6
Orient Electric	6,147	-1.1	433	13.6	215	13.5
Polycab India	31,490	15.1	3,747	20.5	2,559	16.4
Finolex Cables	11,238	10.6	1,371	15.1	1,399	17.0
KEI Industries	17,439	11.4	1,787	12.0	1,219	17.5
Astral	12,822	5.7	2,180	27.0	1,276	43.5
Supreme Inds.	23,947	8.6	3,484	29.6	2,490	16.5
Finolex Inds.	11,486	-3.5	1,546	22.7	1,092	10.1
APL Apollo	45,565	32.5	3,405	75.6	2,080	94.2
Kajaria Ceramics	10,992	9.0	1,671	8.8	991	7.4
Cera Sanitaryware	4,578	15.2	732	16.6	527	33.3
Century Plywood	9,495	7.7	1,519	4.6	967	0.2
<b>Total</b>	<b>2,62,577</b>	<b>12.2</b>	<b>30,132</b>	<b>24.8</b>	<b>20,031</b>	<b>23.9</b>

SOURCE: INCRED RESEARCH, COMPANY REPORTS

Figure 2: Coverage universe - valuation summary

Company Name	Bloomberg ticker	Rating	Market cap US\$m	Closing price Rs/share	Price Target Rs/share	Upside [%]	P/E (x)		EV/E (x)		CAGR % (FY23-25F)		FY24F		FY25F	
							FY24F	FY25F	FY24F	FY25F	Revenue	EPS	RoE (%)	RoCE (%)	RoE (%)	RoCE (%)
<b>Building Materials</b>																
Astral Ltd.	ASTRA IN	ADD	6,582	1,779	1,978	11.2	82.5	67.5	48.9	41.2	12.5	9.9	19.6	23.8	20.3	25.0
Supreme Industries	SI IN	ADD	5,580	3,190	3,247	1.8	39.9	35.4	28.0	24.2	11.9	19.6	21.5	23.7	21.2	23.8
APL Apollo Tubes	APAT IN	ADD	5,029	1,317	1,611	22.3	41.7	29.4	26.4	19.4	17.0	36.0	26.2	29.3	30.2	36.8
Kajaria Ceramics	KJC IN	ADD	2,781	1,268	1,376	8.5	46.0	35.0	26.7	21.3	15.0	17.7	18.0	22.1	21.0	25.8
Finolex Industries	FNXP IN	REDUCE	1,469	172	177	2.8	12.6	17.5	12.7	11.3	2.7	12.9	9.1	12.6	10.7	13.1
Century Plyboards	CPBI IN	ADD	2,061	674	734	8.9	35.4	32.1	23.5	20.3	16.1	24.1	20.1	22.5	18.5	20.4
Cera Sanitaryware	CRS IN	HOLD	1,302	7,269	6,929	-4.7	38.9	32.5	25.9	21.6	18.0	23.5	19.3	24.6	20.1	25.7
<b>Simple Average</b>							<b>42.4</b>	<b>35.6</b>	<b>27.4</b>	<b>22.7</b>	<b>13.3</b>	<b>20.5</b>	<b>19.1</b>	<b>22.7</b>	<b>20.3</b>	<b>24.4</b>
<b>Electricals</b>																
Havells India	HAVL IN	ADD	11,282	1,308	1,488	13.8	57.7	48.3	37.3	31.3	14.5	18.2	20.2	25.3	21.5	27.1
Polycab India	POLYCAB IN	REDUCE	7,791	3,775	3,126	-17.2	43.5	38.6	27.3	24.0	12.6	13.9	18.3	24.5	18.1	24.2
KEI Industries	KEII IN	ADD	2,937	2,365	2,104	-11.0	35.5	30.3	24.1	20.5	15.5	19.8	21.0	27.4	20.3	26.8
CG Consumer Electricals	CROMPTON IN	ADD	2,614	297	320	7.9	33.7	27.8	21.0	18.0	11.9	6.3	19.9	20.5	21.6	23.7
Finolex Cables	FNXC IN	REDUCE	1,731	822	621	-24.5	16.9	15.8	15.6	12.9	13.0	15.3	13.9	13.9	15.0	14.9
V-Guard Industries	VGRD IN	ADD	1,734	291	290	-0.2	46.3	36.0	26.2	21.6	16.1	13.0	15.9	18.1	18.1	21.0
Orient Electric	ORIENTEL IN	ADD	758	258	250	-3.2	44.1	36.1	23.2	18.8	13.6	14.0	19.9	27.3	21.4	29.1
<b>Simple Average</b>							<b>39.7</b>	<b>33.3</b>	<b>25.0</b>	<b>21.0</b>	<b>13.9</b>	<b>14.4</b>	<b>18.4</b>	<b>22.4</b>	<b>19.4</b>	<b>23.8</b>

SOURCE: INCRED RESEARCH, COMPANY REPORTS, PRICE AS OF 11 JUL 2023

Figure 3: Consumer durables sector 1QFY24F earnings preview

	1QFY24F	1QFY23	4QFY23	Change (%)		Comments
				yoy	qoq	
<b>FMEG</b>						
<b>Havells</b>						
Net Sales	46,319	42,445	48,592	9.1	-4.7	# Base quarter saw significant and sudden volatility in raw material prices, leading to
EBITDA	4,840	3,615	5,364	33.9	-9.8	destocking in a few product segments and sub-optimal margins.
EBITDA margin (%)	10.5	8.5	11.0	193bp	-252bp	# We expect muted revenue growth in 1QFY24F vs. full-year growth expectations, given
<b>Consolidated PAT</b>	<b>3,199</b>	<b>2,432</b>	<b>3,673</b>	<b>31.5</b>	<b>-12.9</b>	volatile summer season sales impacted by unseasonal rains. Also, please note that B2B demand was soft in the base quarter of 1QFY23. # Gross margin is expected to keep recovering qoq and is headed towards the pre-Covid level.
<b>CG Consumer (consolidated including Butterfly Gandhimathi)</b>						
Net Sales	19,776	18,629	17,910	6.2	10.4	# CG Consumer's strong presence in South India should yield relative benefits in terms of
EBITDA	2,343	2,199	2,114	6.6	10.8	revenue growth vs. peers as demand was relatively stable vs North and West India in
EBITDA margin (%)	11.9	11.8	11.8	5bp	0bp	1QFY24.
<b>Consolidated PAT</b>	<b>1,448</b>	<b>1,210</b>	<b>1,312</b>	<b>19.7</b>	<b>10.4</b>	# We expect Butterfly's revenue at Rs2.7bn with stable gross margin qoq. We expect EBITDA of Rs314m at a margin of 11.5% in 1Q. # Consolidated margin is expected to be flat yoy.
<b>V-Guard</b>						
Net Sales	11,282	10,183	11,401	10.8	-1.0	# South India saw relatively better demand for consumer durables vs North and West India.
EBITDA	1,072	820	987	30.7	8.6	# First full quarter consolidation for Sunflame. We expect a gradual revenue growth recovery
EBITDA margin (%)	9.5	8.1	8.7	144bp	-60bp	qoq over FY24F. 1QFY24F revenue: Rs740m.
<b>Consolidated PAT</b>	<b>569</b>	<b>534</b>	<b>527</b>	<b>6.6</b>	<b>8.0</b>	# We expect gross/EBITDA margins to improve yoy and qoq given softening of input prices and Sunflame's consolidation. # Acquisition debt of Rs4bn would lead to higher interest expenses yoy.
<b>Orient Electric</b>						
Net Sales	6,147	6,216	6,579	-1.1	-6.6	# Subdued summer season sales due to unseasonal rains. Fans and coolers' sales growth
EBITDA	433	382	464	13.6	-6.6	should be lower vs. lighting.
EBITDA margin (%)	7.1	6.1	7.0	91bp	-91bp	# Price hikes in Apr 2023 should marginally offset low sales volume growth in 1QFY24F
<b>Consolidated PAT</b>	<b>215</b>	<b>190</b>	<b>246</b>	<b>13.5</b>	<b>-12.7</b>	# Margins are a priority over sales growth, as per management. The quarter could see better gross/EBITDA margins vs. past 1Q trends on the back of lower raw material prices and efficiency in opex.
<b>C&amp;W</b>						
<b>Polycab</b>						
Net Sales	31,490	27,366	43,237	15.1	-27.2	# Wire and cable segment's volume growth is expected to be 15%+ yoy, given strong
EBITDA	3,747	3,111	6,095	20.5	-38.5	demand tailwinds from industrial and infrastructure capex.
EBITDA margin (%)	11.9	11.4	14.1	53bp	-273bp	# Average copper prices were down 11% yoy in 1QFY24.
<b>Consolidated PAT</b>	<b>2,559</b>	<b>2,198</b>	<b>4,247</b>	<b>16.4</b>	<b>-39.8</b>	# Based on management guidance, the FMEG segment is expected to see a meaningful recovery in revenue growth. However, subdued summer demand would lead to sub-optimal sales growth yoy.
<b>Finolex Cables</b>						
Net Sales	11,238	10,157	12,243	10.6	-8.2	# We expect a stable quarter for the C&W segment's sales.
EBITDA	1,371	1,191	1,457	15.1	-5.9	# FMEG demand trends were weak for the industry nationally. However, strong South India
EBITDA margin (%)	12.2	11.7	11.9	47bp	-17bp	presence could aid sales growth.
<b>Consolidated PAT</b>	<b>1,399</b>	<b>1,196</b>	<b>1,750</b>	<b>17.0</b>	<b>-20.1</b>	# We expect the EBITDA margin to be higher yoy and qoq led by gross margin expansion and operating leverage for communication cables. # Dividend income from Finolex Industries will be received in the next quarter or 2QFY24F.
<b>KEI Industries</b>						
Net Sales	17,439	15,654	19,545	11.4	-10.8	# Cables continue to witness strong demand from industrial and infrastructure segments,
EBITDA	1,787	1,596	2,038	12.0	-12.3	both from B2B and B2G customers.
EBITDA margin (%)	10.3	10.2	10.4	5bp	-23bp	# KEI's wire business continued to gain market share.
<b>Consolidated PAT</b>	<b>1,219</b>	<b>1,038</b>	<b>1,381</b>	<b>17.5</b>	<b>-11.7</b>	# Copper prices were down 11% yoy, impacting value growth, in 1QFY24. # We expect stable margins yoy and qoq # EHV cable sales are expected to see a recovery yoy.
<b>Cumulative Financials</b>						
Net Sales	1,43,692	1,30,649	1,59,508	10.0	-9.9	
EBITDA	15,595	12,915	18,519	20.8	-15.8	
EBITDA margin (%)	10.9	9.9	11.6	97bp	-173bp	
<b>Consolidated PAT</b>	<b>10,608</b>	<b>8,797</b>	<b>13,137</b>	<b>20.6</b>	<b>-19.2</b>	

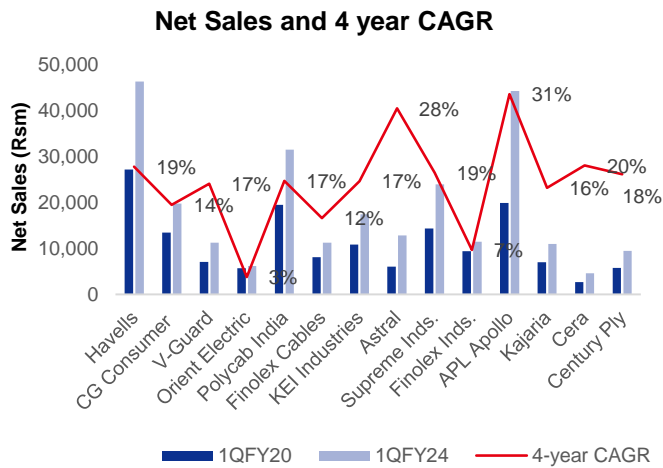
SOURCE: INCRED RESEARCH ESTIMATES, COMPANY REPORTS

**Figure 4: Building material sector's 1QFY24F earnings preview**

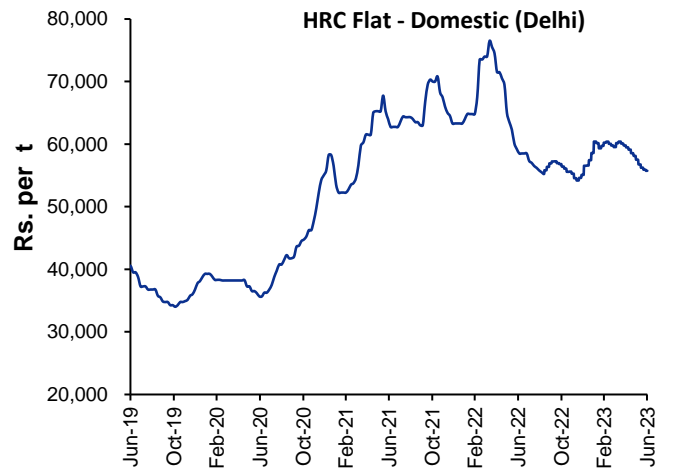
	1QFY24F	1QFY23A	4QFY23A	Change (%)		Comments
				yoy	qoq	
<b>Plastic Pipes</b>						
<b>Astral</b>						
Net Sales	12,822	12,129	15,062	5.7	-14.9	# PVC/CPVC resin prices have largely been stable or declined marginally qoq aiding good demand from customers.
EBITDA	2,180	1,717	3,089	27.0	-29.4	
EBITDA margin (%)	17.0	14.2	20.5	284bp	-351bp	# We expect plastic products' sales volume at ~45kt in 1QFY24F.
<b>Consolidated APAT</b>	<b>1,276</b>	<b>889</b>	<b>2,075</b>	<b>43.5</b>	<b>-38.5</b>	# Bathware segment's EBITDA loss is expected to decline qoq towards a path of breakeven by the end of Mar 2024F. # We expect adhesives and paints segments' sales revenue growth at 12% yoy and the EBITDA margin at 15%.
<b>Supreme Industries</b>						
Net Sales	23,947	22,060	25,983	8.6	-7.8	# We expect plastic pipe sales volume of 110kt, +42% yoy. Consolidated sales volume at 147kt, +30% yoy.
EBITDA	3,484	2,689	4,803	29.6	-27.5	
EBITDA margin (%)	14.6	12.2	18.5	236bp	-393bp	# Realization across segments is expected to decline in line with PVC price decline.
<b>Consolidated APAT</b>	<b>2,490</b>	<b>2,139</b>	<b>3,594</b>	<b>16.5</b>	<b>-30.7</b>	# We estimate consolidated EBITDA/t of Rs24k.
<b>Finolex Industries</b>						
Net Sales	11,486	11,898	11,411	-3.5	0.7	# We expect PVC resin sales volume of 64kt, flat yoy, while realization would decline by 40% yoy.
EBITDA	1,546	1,259	2,174	22.7	-28.9	
EBITDA margin (%)	13.5	10.6	19.1	287bp	-560bp	# We expect strong performance of the pipes and fittings division with a sales volume of 90kt, +25% yoy.
<b>Consolidated APAT</b>	<b>1,092</b>	<b>992</b>	<b>1,665</b>	<b>10.1</b>	<b>-34.4</b>	# The PVC-EDC and PVC-VCM spreads were adverse on a qoq basis.
<b>Steel Pipes</b>						
<b>APL Apollo Tubes</b>						
Net Sales	45,565	34,386	44,311	32.5	2.8	# Sales volume of 661kt was disclosed in the quarterly business update on 1 Jul 2023.
EBITDA	3,405	1,939	3,229	75.6	5.4	Rajpur plant's sales volume was not disclosed separately.
EBITDA margin (%)	7.5	5.6	7.3	183bp	18bp	# HRC prices were flat qoq. Hence, most realization/t improvement expected qoq will be driven by the sales mix.
<b>Consolidated APAT</b>	<b>2,080</b>	<b>1,071</b>	<b>2,018</b>	<b>94.2</b>	<b>3.1</b>	# Gross margin is expected to marginally improve qoq on the back of higher VAP sales mix. # We estimate EBITDA/t of approx. Rs5,150.
<b>Sanitaryware &amp; Tiles</b>						
<b>Kajaria Ceramics</b>						
Net Sales	10,992	10,082	12,048	9.0	-8.8	# We expect tile sales volume of 25.3msm, +8% yoy.
EBITDA	1,671	1,536	1,759	8.8	-5.0	# Based on our channel check, no price cuts for tiles in 1QFY24. Channel incentives continued qoq to aid sales volume of Kajaria.
EBITDA margin (%)	15.2	15.2	14.6	-3bp	60bp	
<b>Consolidated APAT</b>	<b>991</b>	<b>923</b>	<b>1,124</b>	<b>7.4</b>	<b>-11.8</b>	# We estimate bathware and plywood revenue at Rs814m, +14% yoy and at Rs211m, +3.5% yoy, respectively, in 1QFY24F. # We expect a higher gross margin, in line with the past 1Q trends, in the current fiscal. The EBITDA margin should improve qoq owing to lower fuel cost.
<b>Cera Sanitaryware</b>						
Net Sales	4,578	3,972	5,325	15.2	-14.0	# We expect a steady revenue growth of 15-17% yoy for sanitaryware and faucets in 1QFY24F.
EBITDA	732	628	872	16.6	-16.0	
EBITDA margin (%)	16.0	15.8	16.4	18bp	-38bp	# Gross and EBITDA margins are expected to be steady yoy and qoq.
<b>Consolidated APAT</b>	<b>527</b>	<b>395</b>	<b>678</b>	<b>33.3</b>	<b>-22.3</b>	# New faucet plant is expected to start commercial production anytime now.
<b>Plywood</b>						
<b>Century Plyboards</b>						
Net Sales	9,495	8,815	9,618	7.7	-1.3	# Demand trend was weaker for wood panels in 1QFY24F. We expect revenue decline in plywood and laminate segments yoy.
EBITDA	1,519	1,453	1,626	4.6	-6.6	
EBITDA margin (%)	16.0	16.5	16.9	-48bp	-90bp	# Expanded capacity of MDF at Punjab plant would lead to sales volume growth of 23% yoy. We expect flat realization qoq.
<b>Consolidated APAT</b>	<b>967</b>	<b>965</b>	<b>1,127</b>	<b>0.2</b>	<b>-14.2</b>	# Timber prices hardened while chemical prices declined in 1QFY24. Consolidated gross margin to decline qoq.
<b>Cumulative Financials</b>						
Net Sales	1,18,885	1,03,341	1,23,758	15.0	-3.9	
EBITDA	14,537	11,221	17,552	29.5	-17.2	
EBITDA margin (%)	12.2	10.9	14.2	137bp	-196bp	
<b>Consolidated APAT</b>	<b>9,422</b>	<b>7,373</b>	<b>12,280</b>	<b>27.8</b>	<b>-23.3</b>	

SOURCE: INCRED RESEARCH ESTIMATES, COMPANY REPORTS

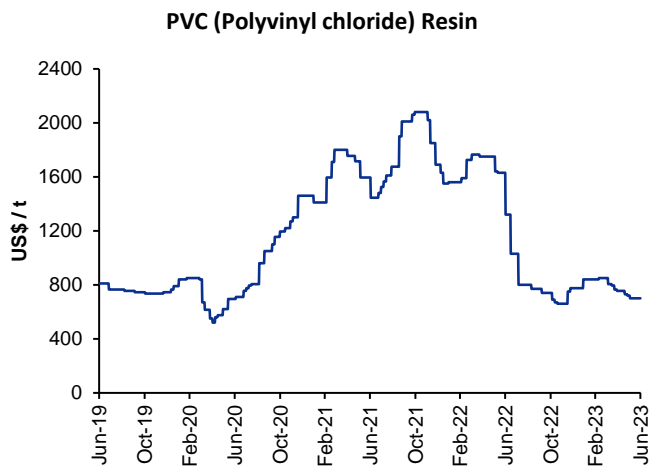
Figure 5: Commodity price trend



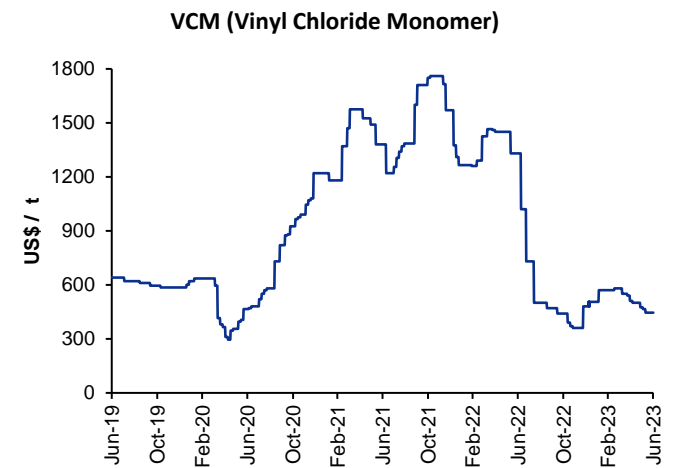
SOURCE: INCRED RESEARCH



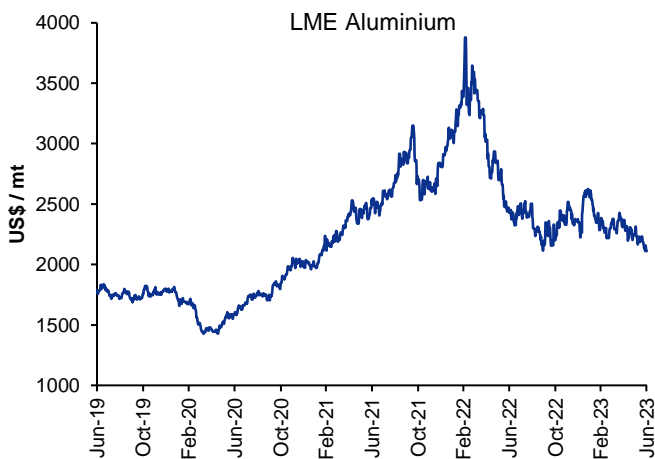
SOURCE: INCRED RESEARCH



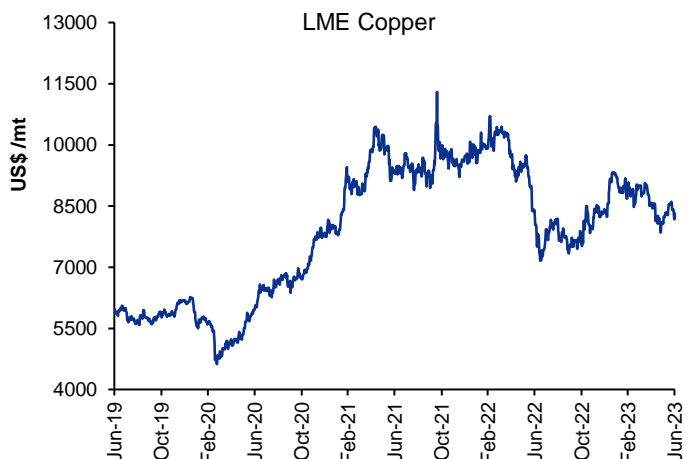
SOURCE: INCRED RESEARCH



SOURCE: INCRED RESEARCH



SOURCE: INCRED RESEARCH



SOURCE: INCRED RESEARCH



---

## DISCLAIMER

---

This report (including the views and opinions expressed therein, and the information comprised therein) has been prepared by Incred Research Services Private Ltd. (formerly known as Earnest Innovation Partners Private Limited) (hereinafter referred to as "IRSPL"). IRSPL is registered with SEBI as a Research Analyst vide Registration No. INH000007793. Pursuant to a trademark agreement, IRSPL has adopted "Incred Equities" as its trademark for use in this report.

The term "IRSPL" shall, unless the context otherwise requires, mean IRSPL and its affiliates, subsidiaries and related companies. 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 IRSPL and its affiliates/group companies to registration or licensing requirements within such jurisdictions.

This report is being supplied to you strictly on the basis that it will remain confidential. No part of this report may be (i) copied, photocopied, duplicated, stored or reproduced in any form by any means; or (ii) redistributed or passed on, directly or indirectly, to any other person in whole or in part, for any purpose without the prior written consent of IRSPL.

The information contained in this report is prepared from data believed to be correct and reliable at the time of issue of this report.

IRSPL is not required to issue regular reports on the subject matter of this report at any frequency and it may cease to do so or change the periodicity of reports at any time. IRSPL is not under any obligation to update this report in the event of a material change to the information contained in this report. IRSPL has not any and will not accept any, obligation to (i) check or ensure that the contents of this report remain current, reliable or relevant; (ii) ensure that the content of this report constitutes all the information a prospective investor may require; (iii) ensure the adequacy, accuracy, completeness, reliability or fairness of any views, opinions and information, and accordingly, IRSPL and its affiliates/group companies (and their respective directors, associates, connected persons and/or employees) shall not be liable in any manner whatsoever for any consequences (including but not limited to any direct, indirect or consequential losses, loss of profits and damages) of any reliance thereon or usage thereof.

Unless otherwise specified, this report is based upon reasonable sources. Such sources will, unless otherwise specified, for market data, be market data and prices available from the main stock exchange or market where the relevant security is listed, or, where appropriate, any other market. Information on the accounts and business of company(ies) will generally be based on published statements of the company(ies), information disseminated by regulatory information services, other publicly available information and information resulting from our research. Whilst every effort is made to ensure that statements of facts made in this report are accurate, all estimates, projections, forecasts, expressions of opinion and other subjective judgments contained in this report are based on assumptions considered to be reasonable as of the date of the document in which they are contained and must not be construed as a representation that the matters referred to therein will occur. Past performance is not a reliable indicator of future performance. The value of investments may go down as well as up and those investing may, depending on the investments in question, lose more than the initial investment. No report shall constitute an offer or an invitation by or on behalf of IRSPL and its affiliates/group companies to any person to buy or sell any investments.

The opinions expressed are based on information which are believed to be accurate and complete and obtained through reliable public or other non-confidential sources at the time made. (Information barriers and other arrangements may be established where necessary to prevent conflicts of interests arising. However, the analyst(s) may receive compensation that is based on his/their coverage of company(ies) in the performance of his/their duties or the performance of his/their recommendations. In reviewing this report, an investor should be aware that any or all of the foregoing, among other things, may give rise to real or potential conflicts of interest. Additional information is, subject to the duties of confidentiality, available on request. The report is not a "prospectus" as defined under Indian Law, including the Companies Act, 2013, and is not, and shall not be, approved by, or filed or registered with, any Indian regulator, including any Registrar of Companies in India, SEBI, any Indian stock exchange, or the Reserve Bank of India. No offer, or invitation to offer, or solicitation of subscription with respect to any such securities listed or proposed to be listed in India is being made, or intended to be made, to the public, or to any member or section of the public in India, through or pursuant to this report.

The research analysts, strategists or economists principally responsible for the preparation of this research report are segregated from the other activities of IRSPL. Information barriers and other arrangements have been established, as required, to prevent any conflicts of interests.

The research analysts, strategists or economists principally responsible for the preparation of this research report are segregated from the other activities of IRSPL. Information barriers and other arrangements have been established, as required, to prevent any conflicts of interests.

IRSPL may have issued other reports (based on technical analysis, event specific, short term views etc.) that are inconsistent with and reach different conclusion from the information presented in this report.

Holding of Analysts/Relatives of Analysts, IRSPL and Associates of IRSPL in the covered securities, as on the date of publishing of this report

	Analyst/ Relative	Entity/ Associates
any financial interests in the company covered in this report (subject company) and nature of such financial interest	NO	NO
actual/beneficial ownership of 1% or more in securities of the subject company at the end of the month immediately preceding the date of publication of the research report or date of the public appearance;	NO	NO
any other material conflict of interest at the time of publication of the research report or at the time of public appearance	NO	NO
received any compensation from the subject company in the past twelve months for investment banking or merchant banking or brokerage services or investment advisory or depository or distribution from the subject company in the last twelve months for products/services other than investment banking or merchant banking or broker- age services or investment advisory or depository or distribution from the subject company in the last twelve months	NO	NO
managed or co-managed public offering of securities for the subject company in the last twelve months	NO	NO
received any compensation or other benefits from the subject company or third party in connection with the research report	NO	NO
served as an officer, director or employee of the subject company	NO	NO
been engaged in market making activity for the subject company	NO	NO

**Analyst declaration**

- The analyst responsible for the production of this report hereby certifies that the views expressed herein accurately and exclusively reflect his or her personal views and opinions about any and all of the issuers or securities analysed in this report and were prepared independently and autonomously in an unbiased manner.
- No part of the compensation of the analyst(s) was, is, or will be directly or indirectly related to the inclusion of specific recommendations(s) or view(s) in this report or based any specific investment banking transaction.
- The analyst(s) has(have) not had any serious disciplinary action taken against him/her(them).
- The analyst, strategist, or economist does not have any material conflict of interest at the time of publication of this report.
- The analyst(s) has(have) received compensation based upon various factors, including quality, accuracy and value of research, overall firm performance, client feedback and competitive factors.

IRSPL and/or its affiliates and/or its Directors/employees may own or have positions in securities of the company(ies) covered in this report or any securities related thereto and may from time to time add to or dispose of, or may be materially interested in, any such securities.

IRSPL and/or its affiliates and/or its Directors/employees may do and seek to do business with the company(ies) covered in this research report and may from time to time (a) buy/sell the securities covered in this report, from time to time and/or (b) act as market maker or have assumed an underwriting commitment in securities of such company(ies), and/or (c) may sell them to or buy them from customers on a principal basis and/or (d) may also perform or seek to perform significant investment banking, advisory, underwriting or placement services for or relating to such company(ies) and/or (e) solicit such investment, advisory or other services from any entity mentioned in this report and/or (f) act as a lender/borrower to such company and may earn brokerage or other compensation. However, Analysts are forbidden to acquire, on their own account or hold securities (physical or uncertificated, including derivatives) of companies in respect of which they are compiling and producing financial recommendations or in the result of which they play a key part.