# Wipro

# <u>Motilal Oswal</u>

S&P CNX

17,765

**BSE SENSEX** 59,636



#### Stock Info

Bloomberg	WPRO IN
Equity Shares (m)	5,693
M.Cap.(INRb)/(USDb)	3567.5 / 48.1
52-Week Range (INR)	740 / 342
1, 6, 12 Rel. Per (%)	-5/9/54
12M Avg Val (INR M)	5721

## Financials Snapshot (INR b)

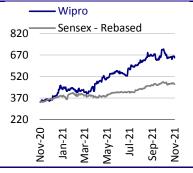
Y/E Mar	2021	2022E	2023E
Sales	619	791	919
EBIT Margin (%)	19.8	17.8	17.6
PAT	108	124	139
EPS (INR)	18.8	22.2	25.4
EPS Gr. (%)	14.3	18.4	14.2
BV/Sh. (INR)	97.9	101.2	100.8
Ratios			
RoE (%)	19.4	22.4	25.2
RoCE (%)	16.0	18.5	20.6
Payout (%)	93.3	85.0	85.0
Valuations			
P/E (x)	34.7	29.3	25.7
P/BV (x)	6.6	6.4	6.5
EV/EBITDA (x)	22.7	18.5	15.9
Div Yield (%)	0.2	2.9	3.3

### Shareholding pattern (%)

As On	Sep-21	Jun-21	Sep-20
Promoter	73.0	73.0	74.0
DII	2.1	5.7	6.5
FII	10.0	10.2	8.8
Others	14.9	11.1	10.7

FII Includes depository receipts

## Stock performance (one-year)



## CMP: INR651

# TP: INR710 (+9%)

## Neutral

# Focus on driving growth with stable margin

- We attended WPRO's Investor Day. The management commentary continues to point towards sustained growth momentum, with stable margin.
- The management indicated a strong and broad based demand environment. All industry verticals are witnessing good demand. Within geographies, its earlier growth driver – the US – continues to grow, while Europe (particularly continental Europe) has witnessed strong acceleration.
- WPRO aspires to be the orchestrator of choice for customers on Cloud deals, allowing it to partner both with clients and Hyperscalers. It reiterated its plan to invest USD1b in building its Fullstride Cloud service and plans to continue to invest in other high growth areas.
- Investment in the sales channels via: 1) lateral leadership hires (80% in market facing roles), 2) a large deals team, and 3) strategic partnerships, are expected to power growth.
- The acquisition of Capco has proved to be successful, with 22 joint go to market deal wins for WPRO. It has been able to open large opportunities with clients, where it was unable to fulfill the requirements earlier, and has seen an increase in wallet share at large BFSI clients.
- WPRO has been active in the M&A market, with six investments over the past one year, including Capco – its largest ever acquisition. The management indicated continued appetite for inorganic investments, and said it will also not shy away from large acquisitions if they make business sense.
- Its focus is to drive strong growth, with a large investment pipeline in both capability and sales. Margin benefits from offshore, fixed price productivity, pricing, utilization, and pyramid are expected to be re-invested in the business. The management indicated a stable margin outlook.
- WPRO expects the supply environment to stay tight, and hence has reoriented its appraisal system to incentivize high performers, along with a large fresher intake (25k in FY23). While it expects employees to return to work, it will operate in a hybrid environment, with greater flexibility. It said its crowdsourcing platform Topcoder will add dynamic workforce capabilities.

## Capco – smooth integration, powering growth

- The management commentary was upbeat on Capco. It indicated a smooth integration, strong success in joint deal wins, and robust future outlook, with a combined GTM and strong pipeline.
- Combination of WPRO and Capco provides both consulting and domain technology capabilities. Demand for the combined services of both companies is strong. Combined deal wins have been robust. Capco has won 120 deals in the first six months since the transaction's closure. This includes a few large transformation deals that were possible because of the combined capabilities of WPRO and Capco.

#### Mukul Garg – Research analyst (Mukul.Garg@MotilalOswal.com)

Research analyst: Akshay Ramnani (Akshay.Ramnani@MotilalOswal.com)/ Raj Prakash Bhanushali (raj.bhanushali@motilaloswal.com)

Investors are advised to refer through important disclosures made at the last page of the Research Report.

Motilal Oswal research is available on www.motilaloswal.com/Institutional-Equities, Bloomberg, Thomson Reuters, Factset and S&P Capital.

## MOTILAL OSWAL

- While there are differences in both company cultures. Post integration, the Capco team has discovered more similarities than differences. We see this as a positive sign of cultural integration.
- WPRO will integrate Capco's capability for its largest FS clients. Capco will spearhead front-end GTM for WPRO for large FS clients. We see this as a strategic step, which will enable growth in BFSI.

### Focus on large deals to drive traction in sales

- Demand continues to remain strong, with the pipeline being the highest in the recent past. Deal TCV was up 80% in the past four quarters. The company has signed mega deals in both Americas and Europe geography, with a potential for both to reach a TCV of USD1b.
- The management is focusing on sourcing large deals from the market. It is accelerating its focus on larger deals and expanding its market share in over USD200m and USD300m accounts.
- It has built a large deal team. Strong hiring in market facing roles will enable good sales traction. The management expects WPRO's participation and win rate in large programs to accelerate.

## **Strategic partnerships**

- WPRO is investing in its hyperscaler partnerships to drive leading solutions.
   Investments are in the area of Cloud-led modernization, AI, ML, industry-specific solutions, etc.
- It has hired senior leaders and each partnership is led by senior leaders.
- Key hyperscaler alliances include AWS, Azure, Google, Salesforce, SAP, and Service Now.
- Partners are also co-innovating and co-investing with WPRO.
- Order book in ACV terms is up 80% YoY across the top six partnerships.

## Appetite for inorganic investments

- The management sees M&A as a strategic pillar of the growth story.
- Its recent M&As have been to boost its local presence, enhance its global delivery capabilities, and improve its strategic positioning within clients.
- The company is investing in both change management and integration teams to enable smoother integration of inorganic investments.
- WPRO has undertaken six acquisitions in the past year, and will continue to invest in inorganic growth. The management has also indicated appetite for large acquisitions, if it makes business relevance.

## Stable margin trajectory

- The management indicated a strong investment pipeline led by capabilities (Cloud and Digital) and sales (large deals and partner ecosystem).
- Margin gains from growth and productivity improvement will be re-invested in the business, given the demand rich environment.
- Utilization, offshore, employee productivity, higher pricing, and pyramid rationalization are some of the operational levers that the management is working to enhance.

The management said it will sustain margin at current levels. Its focus is on driving stronger growth.

## Valuation and view – aptly priced

- In the past few years, WPRO has underperformed Tier I companies on growth due to its higher exposure to challenged verticals (such as Healthcare and ENU). Changes at the company level (restructuring in India/Middle East) have further constrained growth. We expect the refreshed strategy of the new management to make the organization leaner. Its growth-focused and client-centric approach would aid growth over the medium-to-long term.
- We maintain our Neutral stance as a successful turnaround from its growth is aptly priced into our estimates and valuation. Our TP implies 28x FY23E EPS.

## **Other key highlights**

## Technologies that will drive growth

- Trends like AI/ML, Big Data, Cloud, mixed reality, meta-verse, and tokenization, coupled with multi-Cloud infrastructure, Cyber Security, and 5G capabilities to support these trends, will drive demand over the next 3-5 years.
- The top five focus areas to tap this growth will be talent management, building autonomous systems, phygital environment, building network services for infrastructure, and creating trust with data and cyber security.
- WPRO's CTO office will focus on the emerging technologies, which will drive growth in the medium term and will enhance the company's capabilities around those technologies.

## **Traction in Cloud**

- WPRO is planning to invest USD1b in building its Cloud capabilities. As customers are no longer looking for just system integration, but also business transformation partners, WPRO will continue to make strategic investments in Data, AI, and Cyber Security, and build industry-specific capabilities.
- At present, 30-35% of the total loads are on Cloud and this could rise to as high as 70-75%. The management believes its revenue won't be linked with the Cloud adoption rate. Once majority of the Data is on the Cloud, it will create opportunities for Data analysis and other Cloud native solutions.
- The Cloud business has grown at 2x the company's average growth rate in the past 24 months. Cloud-related pipeline is one-third the total pipeline.

# **Financials and valuations**

Income Statement								(INR b)
Y/E March	FY16	FY17	FY18	FY19	FY20	FY21	FY22E	FY23E
Sales	512	550	545	586	610	619	791	919
Change (%)	9.1	7.4	-1.0	7.5	4.2	1.5	27.8	16.1
Operating Costs	357	392	386	413	436	423	553	644
SG&A	59	69	75	75	69	73	98	113
EBITDA	112	113	105	117	126	151	176	203
As a percentage of Net Sales	21.9	20.5	19.3	19.9	20.6	24.3	22.2	22.1
Depreciation and Amort.	15	23	21	19	21	28	35	41
EBIT	97	90	84	97	105	123	141	162
Margin	18.9	16.3	15.5	16.6	17.2	19.8	17.8	17.6
Other Income	18	21	18	18	17	16	16	18
РВТ	115	110	102	115	123	139	157	180
Тах	25	25	22	25	25	30	33	40
Rate (%)	22.1	22.8	21.8	21.9	20.2	21.8	20.8	22.5
РАТ	89	85	80	90	98	109	124	139
Minority Interest	0	0	0	0	0	1	0	0
Adjusted PAT	89	85	80	90	97	108	124	139
Change (%)	2.8	-4.5	-5.7	12.4	8.0	11.0	14.7	12.2

Balance Sheet								(INR b)
Y/E March	FY16	FY17	FY18	FY19	FY20	FY21	FY22E	FY23E
Share Capital	5	5	9	12	11	11	11	11
Reserves	460	515	474	556	546	542	542	540
Net Worth	465	520	483	568	557	553	553	551
Minority Interest and others	23	24	19	22	38	41	49	57
Loans	125	142	138	99	78	83	71	61
Capital Employed	613	687	640	690	674	677	673	669
Gross Block	150	178	194	220	268	299	315	329
Less: Depreciation	85	108	130	149	170	198	233	274
Net Block	65	70	64	71	98	102	82	55
Investments	5	7	13	13	11	12	12	12
Intangible Assets	118	142	136	131	147	152	152	152
Other non-current assets	33	36	41	47	41	42	47	51
Curr. Assets	503	539	506	572	520	523	588	640
Debtors	148	140	143	123	130	121	152	163
Inventories	5	4	3	4	2	1	2	2
Cash and Bank Balance	99	53	45	159	144	170	173	187
Adv., Other Current Assets	46	50	65	46	54	55	66	71
Investments	204	292	249	240	190	176	196	216
Current Liab. and Prov.	111	107	121	143	143	154	208	242
Net Current Assets	392	432	386	429	377	369	380	398
Application of Funds	613	687	640	690	674	677	673	669

E: MOFSL estimates

# **Financials and valuations**

Ratios								
Y/E March	FY16	FY17	FY18	FY19	FY20	FY21	FY22E	FY23E
Basic (INR)								
EPS	13.6	13.0	12.5	14.6	16.4	18.8	22.2	25.4
Cash EPS	15.9	16.7	16.0	18.2	20.2	23.9	29.0	32.8
Book Value	71.2	80.6	76.5	94.8	95.6	97.9	101.2	100.8
DPS	12.0	2.0	1.0	1.0	1.0	1.0	18.9	21.6
Payout (%)	88.2	44.6	145.3	6.7	113.9	93.3	85.0	85.0
Valuation (x)								
P/E	48.0	49.9	52.0	44.6	39.7	34.7	29.3	25.7
Cash P/E	41.0	39.0	40.7	35.7	32.2	27.2	22.4	19.8
EV/EBITDA	36.4	35.5	37.5	30.8	28.1	22.7	18.5	15.9
EV/Sales	8.0	7.3	7.3	6.2	5.8	5.5	4.1	3.5
Price/Book Value	9.1	8.1	8.5	6.9	6.8	6.6	6.4	6.5
Dividend Yield (%)	1.8	0.3	0.2	0.2	0.2	0.2	2.9	3.3
Profitability Ratios (%)								
RoE	20.4	17.2	16.0	17.1	17.3	19.4	22.4	25.2
RoCE	16.1	13.0	11.9	13.1	13.7	16.0	18.5	20.6
Turnover Ratios								
Debtors (Days)	105	93	96	77	78	72	70	65
Debitors (Days)	105	50						
Asset Turnover (x)	0.8	0.7	0.7	0.7	0.7	0.8	0.9	1.0
. , ,			0.7	0.7	0.7	0.8	0.9	1.0
. , ,			0.7		0.7	0.8	0.9	1.0 (INR b)
Asset Turnover (x)			0.7 FY18	0.7 FY19	0.7 FY20	0.8 FY21	0.9 FY22E	(INR b)
Asset Turnover (x) Cash Flow Statement	0.8	0.7	-					(INR b) FY23E
Asset Turnover (x) Cash Flow Statement Y/E March	0.8 FY16	0.7 FY17	FY18	FY19	FY20	FY21	FY22E	(INR b) FY23E 180
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations	0.8 <b>FY16</b> 85	0.7 FY17 88	<b>FY18</b> 85	<b>FY19</b> 89	<b>FY20</b> 124	<b>FY21</b> 125	<b>FY22E</b> 159	(INR b) FY23E 180
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital	0.8 FY16 85 -6	0.7 FY17 88 5	<b>FY18</b> 85 -1	<b>FY19</b> 89 27	<b>FY20</b> 124 -24	<b>FY21</b> 125 23	<b>FY22E</b> 159 16	(INR b) FY23E 180 19 199
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF	0.8 FY16 85 -6 79	0.7 FY17 88 5 93	FY18 85 -1 84	<b>FY19</b> 89 27 <b>116</b>	FY20 124 -24 101	<b>FY21</b> 125 23 <b>148</b>	<b>FY22E</b> 159 16 <b>175</b>	(INR b) FY23E 180 19 199 -14
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA	0.8 FY16 85 -6 79 -13	0.7 FY17 88 5 93 -16	FY18 85 -1 84 -21	<b>FY19</b> 89 27 <b>116</b> -21	FY20 124 -24 101 -22	FY21 125 23 148 -19	<b>FY22E</b> 159 16 <b>175</b> -16	(INR b) FY23E 180 19 199 -14
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments	0.8 FY16 85 -6 79 -13	0.7 FY17 88 5 93 -16	FY18 85 -1 84 -21	<b>FY19</b> 89 27 <b>116</b> -21	FY20 124 -24 101 -22	FY21 125 23 148 -19	<b>FY22E</b> 159 16 <b>175</b> -16	(INR b) FY23E 180 19 199 -14
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary	0.8 FY16 85 -6 79 -13 -125	0.7 FY17 88 5 93 -16 -100	<b>FY18</b> 85 -1 <b>84</b> -21 56	<b>FY19</b> 89 27 <b>116</b> -21 71	<b>FY20</b> 124 -24 <b>101</b> -22 56	FY21 125 23 148 -19 27	<b>FY22E</b> 159 16 <b>175</b> -16 -20	(INR b) FY23E 180 199 -14 -20 -34
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary Net Cash from Invest.	0.8 FY16 85 -6 79 -13 -125 -138	0.7 FY17 88 5 93 -16 -100 -116	FY18 85 -1 84 -21 56 36	<b>FY19</b> 89 27 <b>116</b> -21 71 <b>50</b>	FY20 124 -24 101 -22 56 34	FY21 125 23 148 -19 27 8	<b>FY22E</b> 159 16 <b>175</b> -16 -20 <b>-36</b>	(INR b) FY23E 180 199 -14 -20 -34 0
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary Net Cash from Invest. Issue of Shares/Other adj.	0.8 FY16 85 -6 79 -13 -125 -138 0	0.7 FY17 88 5 93 -16 -100 -116 0	<b>FY18</b> 85 -1 <b>84</b> -21 56 <b>36</b> 0	<b>FY19</b> 89 27 <b>116</b> -21 71 <b>50</b> 0	<b>FY20</b> 124 -24 <b>101</b> -22 56 <b>34</b> 0	FY21 125 23 148 -19 27 8 8 0	<b>FY22E</b> 159 16 <b>175</b> -16 -20 <b>-36</b> 0	(INR b) FY23E 180 199 -14 -20 -34 0 -13
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary Net Cash from Invest. Issue of Shares/Other adj. Proceeds from LTB/STB	0.8 FY16 85 -6 79 -13 -125 -138 0 34	0.7 FY17 88 5 93 -16 -100 -116 0 11	<b>FY18</b> 85 -1 <b>84</b> -21 56 <b>36</b> 0 -14	<b>FY19</b> 89 27 <b>116</b> -21 71 <b>50</b> 0 -44	FY20 124 -24 101 -22 56 34 0 -143	FY21 125 23 148 -19 27 8 8 0 -122	<b>FY22E</b> 159 16 <b>175</b> -16 -20 <b>-36</b> 0 -13	(INR b) FY23E 180 199 199 -14 -20
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary Net Cash from Invest. Issue of Shares/Other adj. Proceeds from LTB/STB Dividend Payments	0.8 FY16 85 -6 79 -13 -125 -138 0 34 -35	0.7 FY17 88 5 93 -16 -100 -110 0 11 -34	FY18 85 -1 84 -21 56 36 0 -14 -116	<b>FY19</b> 89 27 <b>116</b> -21 71 <b>50</b> 0 -44 -5	FY20 124 -24 101 -22 56 34 0 -143 -8	FY21 125 23 148 -19 27 27 8 0 -122 -6	<b>FY22E</b> 159 16 <b>175</b> -16 -20 <b>-36</b> 0 -13 -121	(INR b) FY23E 180 19 199 -14 -20 -34 0 -13 -138
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary Net Cash from Invest. Issue of Shares/Other adj. Proceeds from LTB/STB Dividend Payments Net CF from Finan.	0.8 FY16 85 -6 79 -13 -125 -138 0 34 -35 -2	0.7 FY17 88 5 93 -16 -100 -116 0 111 -34 -23	FY18 85 -1 84 -21 56 36 0 -14 -116 -130	<b>FY19</b> 89 27 <b>116</b> -21 71 <b>50</b> 0 -44 -5 <b>-49</b>	FY20 124 -24 101 -22 56 34 0 -143 -8 -151	FY21 125 23 148 -19 27 27 8 8 0 -122 -6 -129	<b>FY22E</b> 159 16 <b>175</b> -16 -20 <b>-36</b> 0 -13 -121 -121 <b>-134</b>	(INR b) FY23E 180 19 199 -14 -20 -34 0 -13 -138 -138 -151 185
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary Net Cash from Invest. Issue of Shares/Other adj. Proceeds from LTB/STB Dividend Payments Net CF from Finan. Free Cash Flow	0.8 FY16 85 -6 79 -13 -125 -138 0 34 -35 -2 66	0.7 FY17 88 5 93 -16 -100 -116 0 11 -34 -23 77	FY18 85 -1 84 -21 56 36 0 -14 -116 -130 64	<b>FY19</b> 89 27 <b>116</b> -21 71 <b>50</b> 0 -44 -5 <b>-49</b> 95	FY20 124 -24 101 -22 56 34 0 -143 -8 -151 78	FY21 125 23 148 -19 27 27 8 8 0 0 -122 -6 -129 129	<b>FY22E</b> 159 16 <b>175</b> -16 -20 <b>-36</b> 0 -13 -121 -121 <b>-134</b> 159	(INR b) FY23E 180 199 -14 -20 -34 0 -13 -138 -138 -138 -138 185 14
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary Net Cash from Invest. Issue of Shares/Other adj. Proceeds from LTB/STB Dividend Payments Net CF from Finan. Free Cash Flow Net Cash Flow	0.8 FY16 85 -6 79 -13 -125 -138 0 34 -35 -2 66 -61	0.7 FY17 88 5 93 -16 -100 -116 0 11 -34 -23 77 -46	FY18 85 -1 84 -21 56 36 0 -14 -116 -130 64 -10	FY19 89 27 116 -21 71 50 0 -44 -5 -49 95 117	FY20 124 -24 101 -22 56 34 0 -143 -8 -151 78 -16	FY21 125 23 148 -19 27 27 8 8 0 0 -122 -6 -129 129 26	FY22E 159 16 175 -16 -20 -36 0 -13 -121 -134 159 5	(INR b) FY23E 180 199 -14 -20 -34 0 -13 -138 -138 -138 -151 185 14 0
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary Net Cash from Invest. Issue of Shares/Other adj. Proceeds from LTB/STB Dividend Payments Net CF from Finan. Free Cash Flow Forex difference	0.8 FY16 85 -6 79 -13 -125 -138 0 34 -35 -2 66 -61 1	0.7 FY17 88 5 93 -16 -100 -116 0 11 -34 -23 77 -46 -1	FY18 85 -1 84 -21 56 36 0 -14 -116 -130 64 -10 0	FY19 89 27 116 -21 71 50 0 -44 -5 -49 95 117 1	FY20 124 -24 101 -22 56 34 0 -143 -8 -151 78 -16 2	FY21 125 23 148 -19 27 8 0 0 -127 8 0 0 -122 -6 -129 129 26 -1	FY22E 159 16 175 -16 -20 -36 0 -13 -121 -134 159 5 0	(INR b) FY23E 180 199 -14 -20 -34 -34 0 -13 -138 -151
Asset Turnover (x) Cash Flow Statement Y/E March CF from Operations Cash for Wkg. Capital Net Operating CF Net Purchase of FA Other change in investments Dividend from Subsidiary Net Cash from Invest. Issue of Shares/Other adj. Proceeds from LTB/STB Dividend Payments Net CF from Finan. Free Cash Flow Forex difference Opening Cash Bal.	0.8 FY16 85 -6 79 -13 -125 -138 0 34 -35 -2 66 -61 1 1 157	0.7 FY17 88 5 93 -16 -100 -116 0 11 -34 -23 77 -46 -1 97	FY18 85 -1 84 -21 56 36 0 -14 -116 -130 64 -10 0 49	FY19 89 27 116 -21 71 50 0 -44 -5 -49 95 117 1 39	FY20 124 -24 101 -22 56 34 0 -143 -8 -151 78 -16 2 157	FY21 125 23 148 -19 27 8 0 -127 8 0 -122 -6 -129 129 26 -1 142	FY22E 159 16 175 -16 -20 -36 0 -13 -121 -134 159 5 0 0 168	(INR b) FY23E 180 199 -14 -20 -34 0 -13 -138 -138 -138 -151 185 14 0 0 173

# ΝΟΤΕS

Explanation of Investment Rating				
Investment Rating	Expected return (over 12-month)			
BUY	>=15%			
SELL	< - 10%			
NEUTRAL	< - 10 % to 15%			
UNDER REVIEW	Rating may undergo a change			
NOT RATED	We have forward looking estimates for the stock but we refrain from assigning recommendation			

\*In case the recommendation given by the Research Analyst is inconsistent with the investment rating legend for a continuous period of 30 days, the Research Analyst shall within following 30 days take appropriate measures to make the recommendation consistent with the investment rating legend.

#### Disclosures

The following Disclosures are being made in compliance with the SEBI Research Analyst Regulations 2014 (herein after referred to as the Regulations).

Motilal Oswal Financial Services Ltd. (MOFSL) is a SEBI Registered Research Analyst having registration no. INH000000412. MOFSL, the Research Entity (RE) as defined in the Regulations, is engaged in the business of providing Stock broking services, Investment Advisory Services, Depository participant services & distribution of various financial products. MOFSL is a subsidiary company of Passionate Investment Management Pvt. Ltd.. (PIMPL). MOFSL is a listed public company, the details in respect of which are available on www.motilaloswal.com. MOFSL (erstwhile Motilal Oswal Securities Limited - MOSL) is registered with the Securities & Exchange Board of India (SEBI) and is a registered Trading Member with National Stock Exchange of India Ltd. (NSE) and Bombay Stock Exchange Limited (BSE), Multi Commodity Exchange of India Limited (MCX) and National Commodity & Derivatives Exchange Limited (NCDEX) for its stock broking activities & is Depository participant with Central Depository Services Limited (CDSL) National Securities Depository Limited (NSDL), NERL, COMRIS and CCRL and is member of Association of Mutual Funds of India (AMFI) for distribution of financial products and Insurance Regulatory & Development Authority of India (IRDA) as Corporate Agent for insurance products. Details of associate entities of Motilal Oswal Financial Services Limited are available on the website at http://onlinereports.motilaloswal.com/Dormant/documents/List%20of%20Associate%20companies.pdf

MOFSL 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 MOFSL even though there might exist an inherent conflict of interest in some of the stocks mentioned in the research report

MOFSL and / or its affiliates do and seek to do business including investment banking with companies covered in its research reports. As a result, the recipients of this report should be aware that MOFSL 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. Details of pending Enquiry Proceedings of Motilal Oswal Financial Services Limited are available on the website at https://galaxy.motilaloswal.com/ResearchAnalyst/PublishViewLitigation.aspx

A graph of daily closing prices of securities is available at www.nseindia.com, www.bseindia.com. Research Analyst views on Subject Company may vary based on Fundamental research and Technical Research. Proprietary trading desk of MOFSL or its associates maintains arm's length distance with Research Team as all the activities are segregated from MOFSL research activity and therefore it can have an independent view with regards to Subject Company for which Research Team have expressed their views.

#### **Regional Disclosures (outside India)**

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 MOFSL & its group companies to registration or licensing requirements within such jurisdictions. For Hong Kong:

#### This report is distributed in Hong Kong by Motilal Oswal capital Markets (Hong Kong) Private Limited, a licensed corporation (CE AYY-301) licensed and regulated by the Hong Kong Securities and Futures Commission (SFC) pursuant to the Securities and Futures Ordinance (Chapter 571 of the Laws of Hong Kong) "SFO". As per SEBI (Research Analyst Regulations) 2014 Motilal Oswal Securities (SEBI Reg No. INH000000412) has an agreement with Motilal Oswal capital Markets (Hong Kong) Private Limited for distribution of research report in Hong Kong. This report is intended for distribution only to "Professional Investors" as defined in Part I of Schedule 1 to SFO. Any investment or investment activity to which this document relates is only available to professional investor and will be engaged only with professional investors." Nothing here is an offer or solicitation of these securities, products and services in any jurisdiction where their offer or sale is not qualified or exempt from registration. The Indian Analyst(s) who compile this report is/are not located in Hong Kong & are not conducting Research Analysis in Hong Kong.

#### For U.S.

Motilal Oswal Financial Services Limited (MOFSL) is not a registered broker - dealer under the U.S. Securities Exchange Act of 1934, as amended (the"1934 act") and under applicable state laws in the United States. In addition MOFSL is not a registered investment adviser under the U.S. Investment Advisers Act of 1940, as amended (the "Advisers Act" and together with the 1934 Act, the "Acts), and under applicable state laws in the United States. Accordingly, in the absence of specific exemption under the Acts, any brokerage and investment services provided by MOFSL, including the products and services described herein are not available to or intended for U.S. persons. This report is intended for distribution only to "Major Institutional Investors" as defined by Rule 15a-6(b)(4) of the Exchange Act and interpretations thereof by SEC (henceforth referred to as "major institutional investors"). This document must not be acted on or relied on by persons who are not major institutional investors. Any investment or investment activity to which this document relates is only available to major institutional investors and will be engaged in only with major institutional investors. In reliance on the exemption from registration provided by Rule 15a-6 of the U.S. Securities Exchange Act of 1934, as amended (the "Exchange Act") and interpretations thereof by the U.S. Securities and Exchange Commission ("SEC") in order to conduct business with Institutional Investors based in the U.S., MOFSL has entered into a chaperoning agreement with a U.S. registered brokerdealer, Motilal Oswal Securities International Private Limited. ("MOSIPL"). Any business interaction pursuant to this report will have to be executed within the provisions of this chaperoning agreement.

The Research Analysts contributing to the report may not be registered /qualified as research analyst with FINRA. Such research analyst may not be associated persons of the U.S. registered broker-dealer, MOSIPL, and therefore, may not be subject to NASD rule 2711 and NYSE Rule 472 restrictions on communication with a subject company, public appearances and trading securities held by a research analyst account.

#### For Singapore

In Singapore, this report is being distributed by Motilal Oswal Capital Markets Singapore Pte Ltd ("MOCMSPL") (Co.Reg. NO. 201129401Z) which is a holder of a capital markets services license and an exempt financial adviser in Singapore As per the approved agreement under Paragraph 9 of Third Schedule of Securities and Futures Act (CAP 289) and Paragraph 11 of First Schedule of Financial Advisors Act (CAP 110) provided to MOCMSPL by Monetary Authority of Singapore. Persons in Singapore should contact MOCMSPL in respect of any matter arising from, or in connection with this report/publication/communication. This report is distributed solely to persons who qualify as "Institutional Investors", of which some of whom may consist of "accredited" institutional investors as defined in section 4A(1) of the Securities and Futures Act, Chapter 289 of Singapore ("the SFA"). Accordingly, if a Singapore person is not or ceases to be such an institutional investor, such Singapore Person must immediately discontinue any use of this Report and inform MOCMSPL.

#### Specific Disclosures

- MOFSL, Research Analyst and/or his relatives does not have financial interest in the subject company, as they do not have equity holdings in the subject company.
- MOFSL, Research Analyst and/or his relatives do not have actual/beneficial ownership of 1% or more securities in the subject company
- MOFSL, Research Analyst and/or his relatives have not received compensation/other benefits from the subject company in the past 12 months 4 MOFSL, Research Analyst and/or his relatives do not have material conflict of interest in the subject company at the time of publication of research report
- Research Analyst has not served as director/officer/employee in the subject company
- 6
- MOFSL has not received compensation for investment banking/ merchant banking/brokerage services from the subject company in the past 12 months
- MOFSL has not received compensation for other than investment banking/merchant banking/brokerage services from the subject company in the past 12 months
- MOFSL has not received any compensation or other benefits from third party in connection with the research report
- MOFSL has not engaged in market making activity for the subject company

#### The associates of MOFSL may have:

- financial interest in the subject company
- actual/beneficial ownership of 1% or more securities in the subject company
- received compensation/other benefits from the subject company in the past 12 months
- 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 MOFSL even
  though there might exist an inherent conflict of interest in some of the stocks mentioned in the research report.
- acted as a manager or co-manager of public offering of securities of the subject company in past 12 months
- 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)
- received compensation from the subject company in the past 12 months for investment banking / merchant banking / brokerage services or from other than said services.

#### The associates of MOFSL has not received any compensation or other benefits from third party in connection with the research report

Above disclosures include beneficial holdings lying in demat account of MOFSL which are opened for proprietary investments only. While calculating beneficial holdings, It does not consider demat accounts which are opened in name of MOFSL for other purposes (i.e holding client securities, collaterals, error trades etc.). MOFSL also earns DP income from clients which are not considered in above disclosures.

#### 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.

#### Terms & Conditions:

This report has been prepared by MOFSL and is meant for sole use by the recipient and not for 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 MOFSL. 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. Though disseminated to all the customers simultaneously, not all customers may receive this report at the same time. MOFSL will not treat recipients as customers by virtue of their receiving this report.

#### Disclaimer:

The report and information contained herein is strictly confidential and meant solely for the selected recipient 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. This report and information herein is solely for informational purpose and may not be used or considered as an offer document or solicitation of offer to buy or sell or subscribe for securities or other financial instruments. 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. This may not be taken in substitution for the exercise of independent judgment by any recipient. 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 its own advisors to determine the merits and risks of such an investment. The investment discussed or views expressed may not be suitable for all investors. 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. No representation or warranty, express or implied, is made as to the accuracy, completeness or fairness of the information and opinions contained in this document. The Disclosures of Interest Statement incorporated in this document is provided solely to enhance the transparency and should not be treated as endorsement of the views expressed in the report. This information is subject to change without any prior notice. The Company reserves the right to make modifications and alternations to this statement as may be required from time to time without any prior approval. MOFSL, its associates, their directors and the employees may from time to time, effect or have effected an own account transaction in, or deal as principal or agent in or for the securities mentioned in this document. They may perform or seek to perform investment banking or other services for, or solicit investment banking or other business from, any company referred to in this report. Each of these entities functions as a separate, distinct and independent of each other. The recipient should take this into account before interpreting the document. This report has been prepared on the basis of information that is already available in publicly accessible media or developed through analysis of MOFSL. The views expressed are those of the analyst, and the Company may or may not subscribe to all the views expressed therein. This document is being supplied to you solely for your information and may not be reproduced, redistributed or passed on, directly or indirectly, to any other person or published, copied, in whole or in part, for any purpose. This report is not directed or intended for distribution to, or use by, any person or entity who is a citizen or resident of or located in any locality, state, country or other jurisdiction, where such distribution, publication, availability or use would be contrary to law, regulation or which would subject MOFSL to any registration or licensing requirement within such jurisdiction. The securities described herein may or may not be eligible for sale in all jurisdictions or to certain category of investors. Persons in whose possession this document may come are required to inform themselves of and to observe such restriction. Neither the Firm, 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 that may arise from or in connection with the use of the information. The person accessing this information specifically agrees to exempt MOFSL or any of its affiliates or employees from, any and all responsibility/liability arising from such misuse and agrees not to hold MOFSL or any of its affiliates or employees responsible for any such misuse and further agrees to hold MOFSL 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.

Registered Office Address: Motilal Oswal Tower, Rahimtullah Sayani Road, Opposite Parel ST Depot, Prabhadevi, Mumbai-400025; Tel No.: 022 71934200/ 022-71934263; Website www.motilaloswal.com.CIN no.: L67190MH2005PLC153397.Correspondence Office Address: Palm Spring Centre, 2nd Floor, Palm Court Complex, New Link Road, Malad(West), Mumbai-400 064. Tel No: 022 7188 1000.

Registration Nos.: Motilal Oswal Financial Services Limited (MOFSL)\*: INZ000158836(BSE/NSE/MCX/NCDEX); CDSL and NSDL: IN-DP-16-2015; Research Analyst: INH00000412. AMFI: ARN - 146822; Investment Adviser: INA000007100; Insurance Corporate Agent: CA0579;PMS:INP000006712. Motilal Oswal Asset Management Company Ltd. (MOAMC): PMS (Registration No.: INP00000670); PMS and Mutual Funds are offered through MOAMC which is group company of MOFSL. Motilal Oswal Asset Management Company Ltd. (MOAMC): PMS (Registration No.: INP00000670); PMS and Mutual Funds are offered through MOAMC which is group company of MOFSL. Motilal Oswal Wealth Management Ltd. (MOWML): PMS (Registration No.: INP000004409) is offered through MOWML, which is a group company of MOFSL. Motilal Oswal Financial Services Limited is a distributor of Mutual Funds, PMS, Fixed Deposit, Bond, NCDs,Insurance Products and IPOs.Real Estate is offered through Motilal Oswal Real Estate Investment Advisors II Pvt. Ltd. which is a group company of MOFSL. Private Equity is offered through Motilal Oswal Private Equity Investment Advisors Pvt. Ltd which is a group company of MOFSL. Private Equity is offered through Motilal Oswal Private Equity Investment Advisors Pvt. Ltd which is a group company of MOFSL. Note: a surance or guarantee of the returns. Investment in securities market is subject to market risk, read all the related documents carefully before investing. Details of Compliance Officer: Name: Neeraj Agarwal, Email ID: na@motilaloswal.com, Contact No::022-71881085.

\* MOSL has been amalgamated with Motilal Oswal Financial Services Limited (MOFSL) w.e.f August 21, 2018 pursuant to order dated July 30, 2018 issued by Hon'ble National Company Law Tribunal, Mumbai Bench.