

Getting its Act Together: SOBHA

September 10, 2025 | CMP: INR 1,429| Target Price: INR 1,800

Expected Share Price Return: 26.0% | Dividend Yield: 0.21% | Expected Total Return: 26.21%

BUY

Sector View: Positive

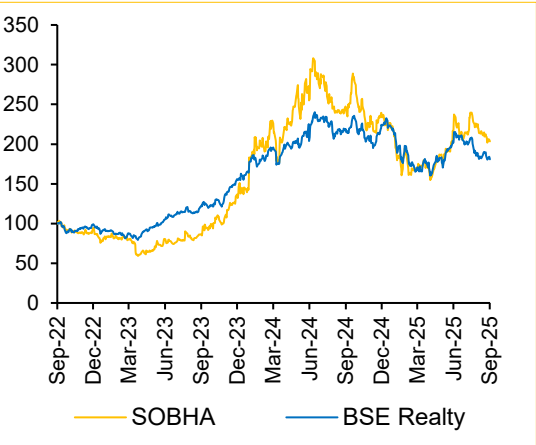
Change in Estimates	✓
Target Price Change	✓
Recommendation	✓

Company Info	
BB Code	SOBHA IN EQUITY
Face Value (INR)	10
52 W High/Low (INR)	2,066/1076
Mkt Cap (Bn)	INR 153.62 / \$1.73
Shares o/s (Mn)	106.9
3M Avg. Daily Volume	3,25,736

Key Financials					
INR Mn	FY24	FY25	FY26E	FY27E	FY28E
Revenue	30,970	40,387	55,976	64,608	74,728
YoY (%)	(6.4)	30.4	38.6	15.4	15.7
EBITDA	2,770	2,943	8,173	11,761	14,306
EBITDAM (%)	12.4	10.1	15.8	19.2	20.0
RPAT	491	947	3,738	6,283	8,169
EPS	5.2	8.9	35.0	58.8	76.4
ROE (%)	2.0	2.1	7.6	11.5	13.1
ROCE (%)	4.5	3.6	10.3	15.4	17.1

Shareholding Pattern (%)			
	Jun-25	Mar-25	Dec-24
Promoters	52.43	51.14	51.15
FIIIs	8.70	9.55	9.99
DIIIs	21.82	20.11	20.70
Public	17.05	19.20	18.15

Relative Performance (%)			
YTD	3Y	2Y	1Y
BSE REALTY	81.0	47.1	(16.6)
SOBHA	103.5	136.2	(16.3)



Prashanth Kumar Kota, CFA

Email: prashanth.kota@choiceindia.com
Ph: +91 22 6707 9887

Aayush Saboo

Email: aayush.saboo@choiceindia.com
Ph: +91 22 6707 9512

Strong Launch Pipeline Complements Expected Project Completions

We upgrade SOBHA to BUY rating with a revised TP of INR 1,800/sh. We believe the stock price correction of 47% from its high adequately prices in all the negatives. We expect FY26 and FY27 to be a be a launch heavy year which will drive healthy pre-sales growth and revenue recognition of 4 msf worth of deliveries in FY26/27 would materially lift reported financials. EBITDA margins (reported) would gradually move up as higher priced and higher margin projects start getting completed and get recognised in the reported financials.

Pre-sales decreased 6% in FY25 which worried the market, but FY26 to be a launch heavy year: SOBHA reported a decline in pre-sales during FY25, primarily due to approval delays, but has guided for a 30% YoY growth in FY26 and is targeting **INR 100Bn** in pre-sales by FY27E. In Q1 FY26, SOBHA achieved its highest-ever pre-sales of INR 20.8Bn and plans to launch 8 msf of projects over the next 3 quarters with a GDV of approximately INR 100Bn. From its ongoing and completed projects, Sobha expects to generate net cash flows of **INR 111Bn** over the next 4–5 years, while future projects are projected to yield INR 70.0Bn over the next 5–6 years from 18 msf of planned launches.

Expanding into new geographies: Sobha is slowly and gradually expanding its presence beyond the Southern market, as it is not in a hurry to increase its inventory within a short span of time. Sobha has already made an impressive start in the NCR region and also started investing in new geographies like Pune and Hyderabad and increasing its presence in Kerala. Sobha also has plans to penetrate into the MMR market, although it is at a nascent stage.

Rights issue of INR 20Bn to support future growth: SOBHA has raised INR 20Bn through rights issue, which will be used for funding certain project-related expenses for ongoing and forthcoming projects, capex, acquisition of land parcels and partial debt payment. Despite higher land prices across Tier-I and Tier II cities, we believe Sobha has the execution wherewithal to generate over 30% project-level EBITDA.

Valuation: Based on the SOTP valuation approach, we arrive at a target price of INR 1,800, factoring in the Residential Business, Commercial Rental, Contract & Manufacturing Business, as well as the land bank. **Risks:** A broad based slowdown in the domestic economy and delay due to legal and regulatory issues.

SOTP Valuation (INR per share)

SOBHA Particulars	NAV Per Share
Residential Value	1,366
Land Value	440
Commercial Rental	30
Contract Mfg NAV (FY25E EV/EBIDTA10X)	31
Less Debt (FY26E)	64
Total Value (Target Price)	1,800
CMP	1,429
Upside (%)	26.0

Quarterly Highlights (INR Mn)

SOBHA Particulars	Q1FY26	Q1FY25	YoY (%)	Q4FY25	QoQ (%)
Presales (INR Mn)	20,790	18,737	11.0	18,360	13.2
Presales (mnsft)	1.4	1.2	22.0	1.6	(7.7)
Collection (INR Mn)	17,780	15,460	15.0	17,850	(0.4)
Average selling price (per sq ft)	14,935	15,941	(6.3)	11,781	26.8
Net Sales (incl OOI)	8,519	6,404	33.0	12,406	(31.3)
EBITDA	238	559	(57.4)	941	(74.7)
Depreciation	237	204	16.2	230	3.0
EBIT	2	356	(99.6)	711	(99.8)
Other Income	495	295	67.9	301	64.3
Interest Cost	310	539	(42.6)	450	(31.2)
PBT	187	111	68.1	562	(66.8)
Tax	50	50	(0.2)	154	(67.2)
RPAT	136	61	124.9	409	(66.7)
Adj EPS (INR)	1.3	6.4	(80.1)	3.8	(66.7)

Source: SOBHA, Choice Institutional Equities

Management Call - Highlights

Macro Environment

- SOBHA achieved its highest ever real estate sales in Q1 FY26.
- SOBHA has a strong pipeline of 17.67 msf across 17 residential projects in 9 cities, plus 0.7 msf of commercial projects, planned for launch in next 4-6 quarters.
- Management has guided for a 30% increase in Pre-sales over last financial year, with an expectation to reach INR 100Bn in Pre-sales in FY27.
- The real estate market shows stable demand conditions across key markets like Kerala, Bangalore and Gurgaon, with good interest from end-users.
- In Noida/Greater Noida specifically, there is strong demand but limited supply currently, which is driving prices higher.

Lunches and Pre-sales

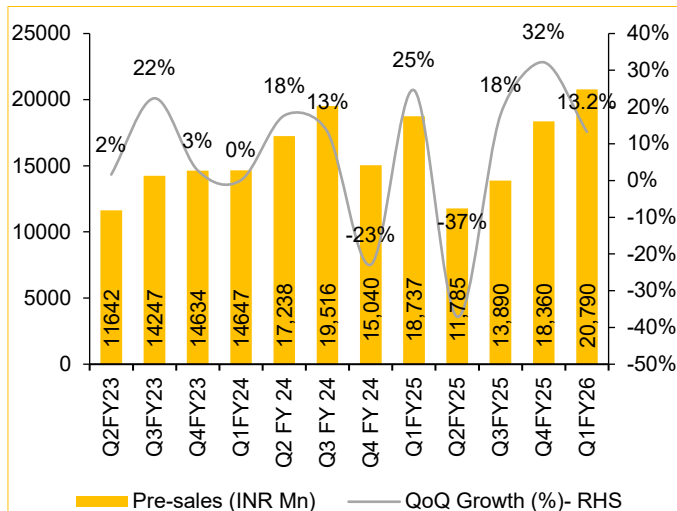
- SOBHA achieved its highest ever real estate sales in Q1 FY26, driven by the successful launch of SOBHA Aurum in Greater Noida, their first project in that market.
- In Q1, they launched 2 projects totaling 1.62 msf - SOBHA Aurum and Marina One (4 towers of 0.91 msf).
- SOBHA has a strong pipeline of 17.67 msf across 17 residential projects in 9 cities, plus 0.7 million square feet of commercial projects, planned for launch in next 4-6 quarters.
- 5 Bangalore projects faced delays in obtaining OCs due to authority-related fee issues, which impacted revenue recognition.
- For Q2 FY26, they plan to launch at least 1 project worth INR9.50Bn in Bannerghatta.

Pricing

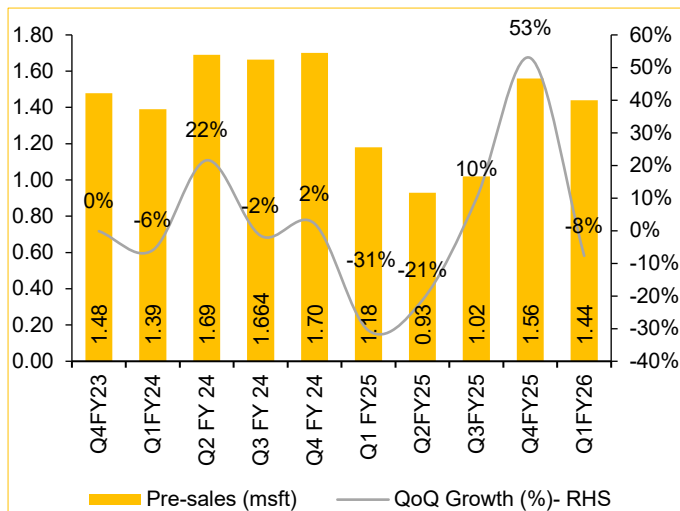
- For upcoming launches, they expect an average price of at least INR 12,000 per square foot.
- SOBHA is currently selling at INR 12,000-13,000 per square foot while recognizing revenue at about INR 7,000 per square foot.

Guidance:

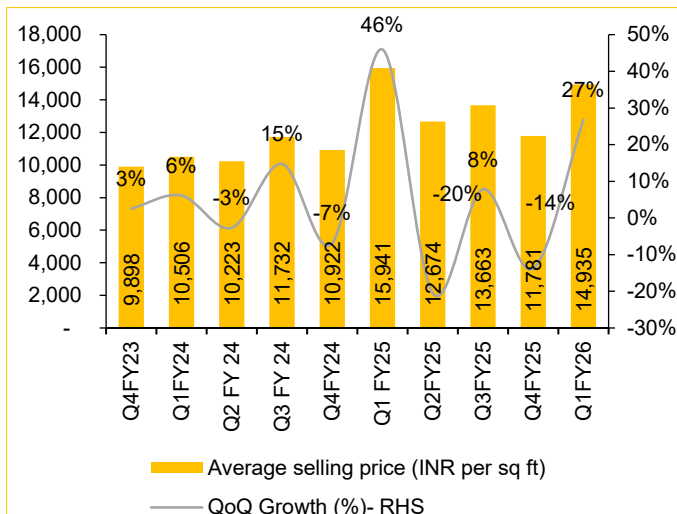
- Management has guided for 30% increase in pre-sales in FY26E.
- In FY27, SOBHA expects to reach INR 100Bn in Pre-sales driven by launches of 8 msf with approximately 50% of sales expected from new launches and 50% from existing inventory.

Pre-sales (INR Mn) up 13% QoQ and 11% YoY

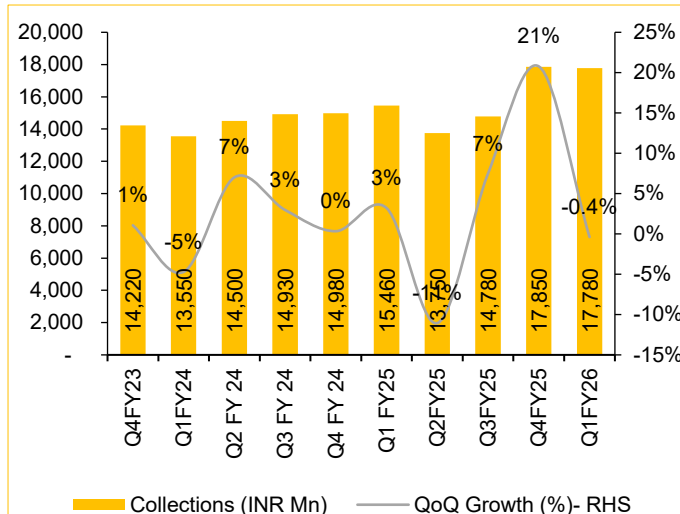
Source: SOBHA, Choice Institutional Equities

Pre-sales (msf) down 8% QoQ and up 22% YoY

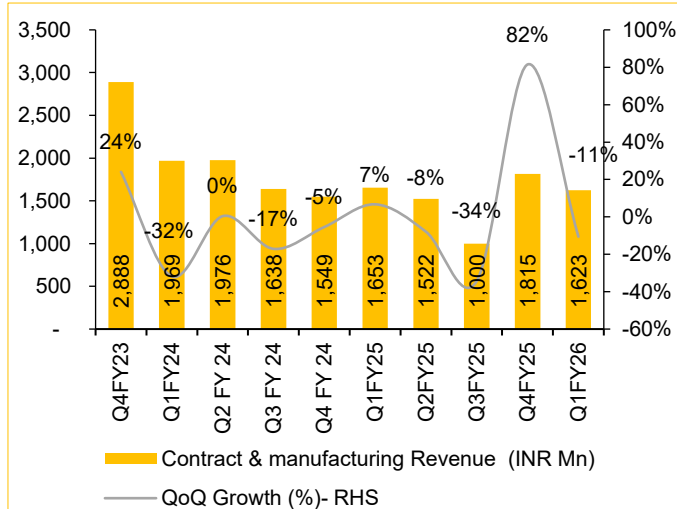
Source: SOBHA, Choice Institutional Equities

Average selling price up 27% QoQ and down 6% YoY

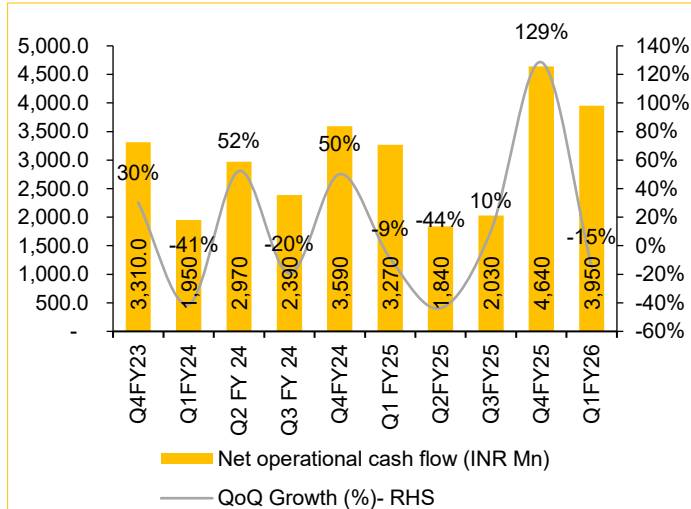
Source: SOBHA, Choice Institutional Equities

Collections down 0.4% QoQ and up 15% YoY

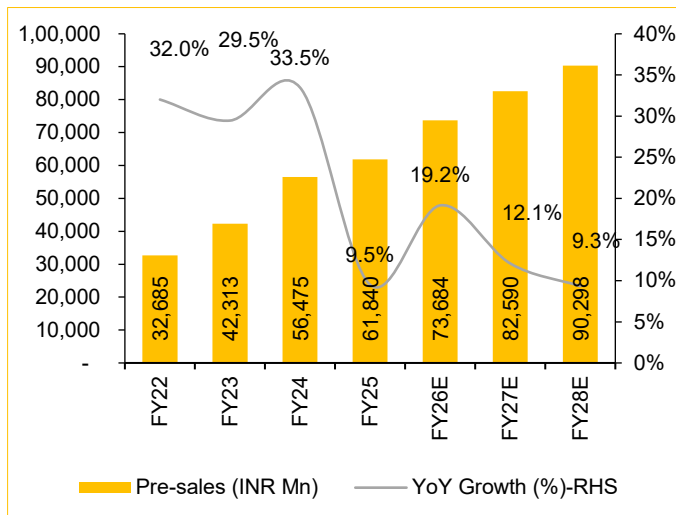
Source: SOBHA, Choice Institutional Equities

Contract manufacturing revenue down 11% QoQ and 2% YoY

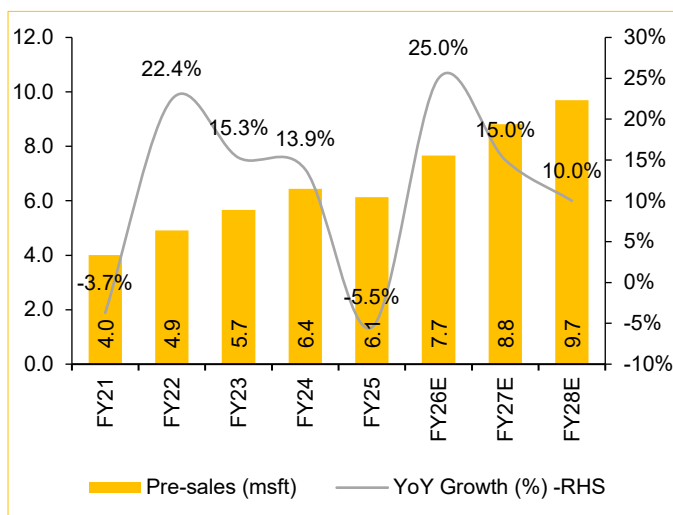
Source: SOBHA, Choice Institutional Equities

Net operational cash flow down 15% QoQ and up 21% YoY

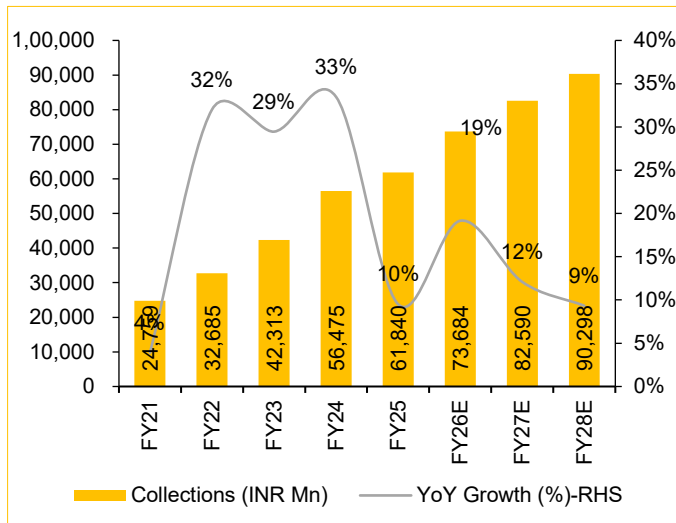
Source: SOBHA, Choice Institutional Equities

Pre-sales (INR Mn) to grow at 11% CAGR from FY26- FY28E

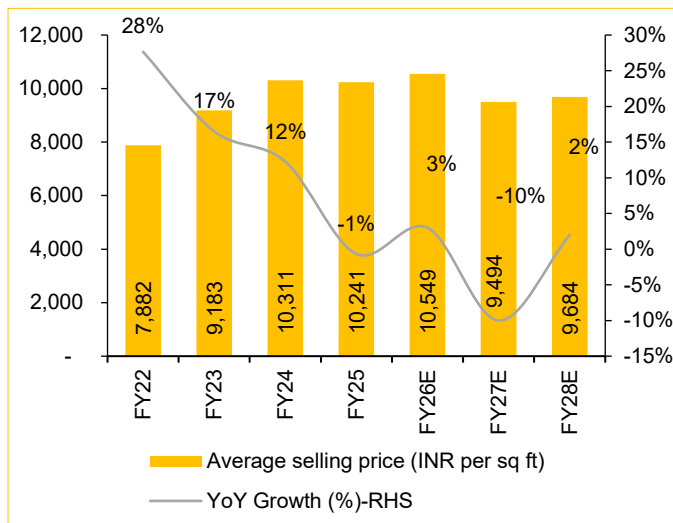
Source: SOBHA, Choice Institutional Equities

Pre-sales (msft) to grow at a 16% CAGR from FY26-28E

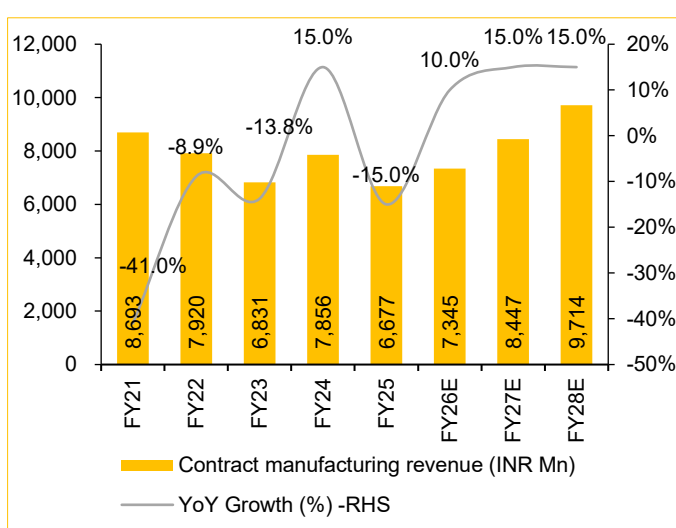
Source: SOBHA, Choice Institutional Equities

Collections to grow at a 11% CAGR form FY26-FY28E

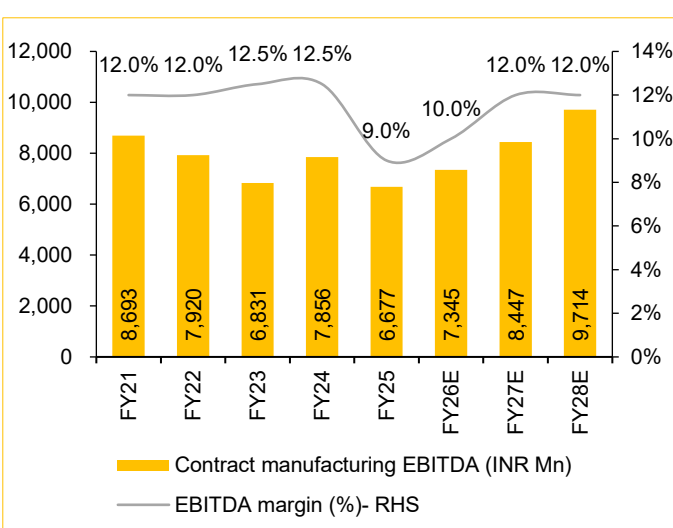
Source: SOBHA, Choice Institutional Equities

Average Selling Price (INR) to marginally decrease

Source: SOBHA, Choice Institutional Equities

Contract manufacturing revenue to pick up from FY26E

Source: SOBHA, Choice Institutional Equities

Contract manufacturing EBITDA to pick up from FY26E

Source: SOBHA, Choice Institutional Equities

Income Statement (Consolidated in INR Mn)

Particulars	FY24	FY25	FY26E	FY27E	FY28E
Revenue	30,970	40,387	55,976	64,608	74,728
Gross Profit	21,151	23,398	55,976	64,608	74,728
EBITDA	2,770	2,943	8,173	11,761	14,306
Depreciation	782	898	1,949	2,201	2,352
EBIT	1,988	2,045	6,224	9,560	11,954
Interest Expense	2,455	1,956	1,684	1,384	1,084
Other Income	1,209	1,241	800	800	800
PBT	742	1,330	5,340	8,976	11,669
Reported PAT	491	947	3,738	6,283	8,169
EPS	5.2	8.9	35.0	58.8	76.4

Ratio Analysis	FY24	FY25	FY26E	FY27E	FY28E
Growth Ratios					
Revenue (%)	(6.4)	30.4	38.6	15.4	15.7
EBITDA (%)	(25.0)	6.2	177.7	43.9	21.6
PAT (%)	(52.9)	92.7	294.8	68.1	30.0
Margins					
Gross Profit Margin	68.3	57.9	67.5	68.1	68.7
EBITDA Margin	12.4	10.1	15.8	19.2	20.0
PAT Margin	1.5	2.3	6.6	9.6	10.8
Profitability					
Return On Equity (ROE)	2.0	2.1	7.6	11.5	13.1
Return On Capital Employed (ROCE)	4.5	3.6	10.3	15.4	17.1
Working Capital					
Inventory Days	900	750	700	580	580
Debtor Days	12	13	12	10	10
Payable Days	56	60	65	65	70
Cash Conversion Cycle	856	703	647	525	520
Financial Stability					
Net Debt to Equity (x)	0.7	0.2	0.1	0.1	0.1
Net Debt to EBITDA (x)	6.5	3.4	0.4	0.4	0.6
Interest Cover (x)	0.8	1.0	3.7	6.9	11.0
Valuation Metrics					
PE(x)	296.2	173.3	43.9	26.1	20.1
EV/EBITDA (x)	59.0	59.1	9.3	6.6	5.7
Price to BV (x)	5.8	3.6	3.3	3.0	2.6
EV/OCF (x)	25.3	87.1	6.8	19.1	(42.4)

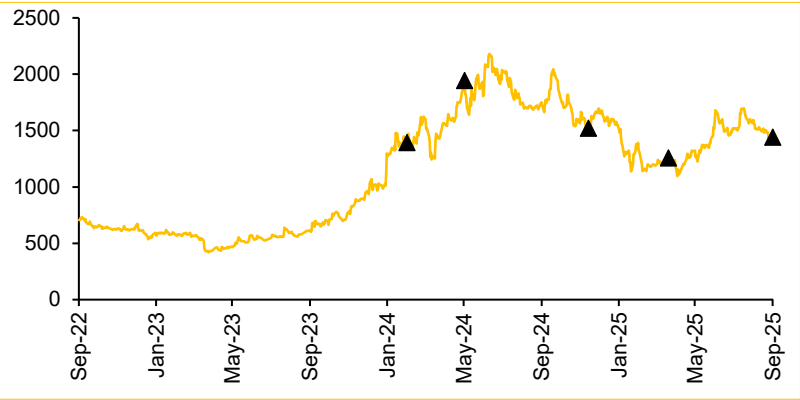
Balance Sheet (Consolidated in INR Mn)

Particulars	FY24	FY25	FY26E	FY27E	FY28E
Net worth	25,141	45,605	48,969	54,824	62,565
Total Debt	19,135	11,309	11,309	7,309	7,309
Deferred Tax	149	1,184	258	258	258
Other Liabilities & Provisions	459	668	1,430	710	710
Total Net Worth & Liabilities	44,884	58,766	61,966	63,101	70,842
Net Block	4,788	5,291	4,242	3,541	2,089
Investment Property	4,501	4,545	5,500	6,300	6,300
Investment	5,650	5,692	7,000	8,300	8,300
Cash & Bank Balance	1,137	1,266	7,994	11,557	22,935
Other Non Current Assets	14,099	14,570	14,570	14,570	14,570
Net Current Assets	20,347	33,214	36,153	36,689	45,882
Total Assets	44,884	58,766	61,966	63,101	70,842

Cash Flows (INR Mn)	FY24	FY25	FY26E	FY27E	FY28E
Cash Flows From Operations	6,474	2,000	11,161	12,895	13,789
Cash Flows From Investing	(4,749)	(11,799)	(2,208)	(2,800)	(900)
Cash Flows From Financing	(3,382)	9,928	(2,223)	(6,532)	(1,512)

Source: SOBHA, Choice Institutional Equities

Historical share price chart: Sobha Ltd (SOBHA)



Date	Rating	Target Price
Feb 08, 2024	NEUTRAL	1,360
May 18, 2024	REDUCE	1,861
Nov 16, 2024	SELL	1,421
Feb 10, 2025	SELL	1,200
Sept 10, 2025	BUY	1,800

Institutional Research Team			
Utsav Verma, CFA	Head of Institutional Research	utsav.verma@choiceindia.com	+91 22 6707 9440
Prashanth Kumar Kota, CFA	Analyst – Basic Materials	prashanth.kota@choiceindia.com	+91 22 6707 9887
Mehul Mehta	Analyst – Industrials	mehul.mehta@choiceindia.com	+91 22 6707 9930
Dhanshree Jadhav	Analyst – Technology	dhanshree.jadhav@choiceindia.com	+91 22 6707 9535
Karan Kamdar	Analyst – SMID	karan.kamdar@choiceindia.com	+91 22 6707 9930
Deepika Murarka	Analyst – Healthcare	deepika.murarka@choiceindia.com	+91 22 6707 9513
Putta Ravi Kumar	Analyst – Defence	ravi.putta@choiceindia.com	+91 22 6707 9908
Maitri Sheth	Analyst – Pharmaceuticals	maitri.sheth@choiceindia.com	+91 22 6707 9511
Ashutosh Murarka	Analyst – Cement & Infrastructure	ashutosh.murarka@choiceindia.com	+91 22 6707 9887
Dhaval Popat	Analyst – Energy	dhaval.popat@choiceindia.com	+91 22 6707 9949
Aayush Saboo	Sr. Associate– Real Estate	aayush.saboo@choiceindia.com	+91 22 6707 9512
Bharat Kumar Kudikyala	Sr. Associate – Building Materials and Mining	bharat.kudikyala@choiceindia.com	+91 22 6707 9887
Avi Jhaveri	Sr. Associate – Technology	avi.jhaveri@choiceindia.com	+91 22 6707 9216
Kunal Bajaj	Sr. Associate – Technology	kunal.bajaj@choiceindia.com	+91 22 6707 9884
Abhinav Kapadia	Sr. Associate – Capital Goods	abhinav.kapadia@choiceindia.com	+91 22 6707 9707
Vikrant Shah, CFA (ICFAI)	Sr. Associate – Banks	vikrant.shah@choiceindia.com	+91 22 6707 9887
Vinay Rawal	Associate – SMID	vinay.rawal@choiceindia.com	+91 22 6707 9887
Heer Gogri	Associate – SMID	heer.gogri@choiceindia.com	+91 22 6707 9707
Heet Chheda	Associate – Auto	heet.chheda@choiceindia.com	+91 22 6707 9952
Rushil Katiyar	Associate – Technology	rushil.katiyar@choiceindia.com	+91 22 6707 9887

CHOICE RATING DISTRIBUTION & METHODOLOGY	
Large Cap*	
BUY	The security is expected to generate upside of 15% or more over the next 12 months
ADD	The security is expected to show upside returns from 5% to less than 15% over the next 12 months
REDUCE	The security is expected to show upside or downside returns by 5% to -5% over the next 12 months
SELL	The security is expected to show downside of 5% or more over the next 12 months
Mid & Small Cap*	
BUY	The security is expected to generate upside of 20% or more over the next 12 months
ADD	The security is expected to show upside returns from 5% to less than 20% over the next 12 months
REDUCE	The security is expected to show upside or downside returns by 5% to -10% over the next 12 months
SELL	The security is expected to show downside of 10% or more over the next 12 months
Other Ratings	
NOT RATED (NR)	The stock has no recommendation from the Analyst
UNDER REVIEW (UR)	The stock is under review by the Analyst and rating may change
Sector View	
POSITIVE (P)	Fundamentals of the sector look attractive over the next 12 months
NEUTRAL (N)	Fundamentals of the sector are expected to be in statis over the next 12 months
CAUTIOUS (C)	Fundamentals of the sector are expected to be challenging over the next 12 months

*Large Cap: More Than INR 20,000Cr Market Cap
*Mid & Small Cap: Less Than INR 20,000Cr Market Cap

Disclaimer

Research Disclaimer and Disclosure inter-alia as required under Securities and Exchange Board of India (Research Analysts) Regulations, 2014

Choice Equity Broking Private Limited-Research Analyst - INH000000222. (CIN. NO.: U65999MH2010PTC198714). Reg. Add.: Sunil Patodia Tower, J B Nagar, Andheri(East), Mumbai 400099. Tel. No. 022-6707 9999

Compliance Officer--Prashant Salian, Email Id – Prashant.salian@choiceindia.com Contact no. 022- 67079999- Ext-2310

Grievance officer-Deepika Singhvi Tel.022-67079999- Ext-834. Email- ig@choiceindia.com

Investment in securities market are subject to market risks. Read all the related documents carefully before investing. Registration granted by SEBI, and certification from NISM in no way guarantee performance of the intermediary or provide any assurance of returns to investors

This Research Report (hereinafter referred as "Report") has been prepared by Choice Equity Broking Private Limited as a Research Entity (hereinafter referred as "CEBPL RE" Limited). The Research Analysts, strategists are principally responsible for the preparation of "CEBPL RE" research. The research analysts have received compensation based upon various factors, which may include quality of research, investor client feedback, stock picking, competitive factors and firm revenues etc.

Whilst CEBPL has taken all reasonable steps to ensure that this information is correct, CEBPL does not offer any warranty as to the accuracy or completeness of such information. Any person placing reliance on the report to undertake trading does so entirely at his or her own risk and CEBPL does not accept any liability as a result. Securities and Derivatives markets may be subject to rapid and unexpected price movements and past performance is not necessarily an indication of future performance.

These information / opinions / views are not meant to serve as a professional investment guide for the readers. No action is solicited based upon the information provided herein. Recipients of this "Report" should rely on information/data arising out of their own Study/investigations. It is advised to seek independent professional advice and arrive at an informed trading/investment decision before executing any trades or making any investments. This 'Report' has been prepared on the basis of publicly available information, internally developed data and other sources believed by CEBPL to be reliable. CEBPL or its directors, employees, affiliates or representatives shall not be responsible for, or warrant for the accuracy, completeness, adequacy and reliability of such information / opinions / views. Though due care has been taken to ensure that the disclosures and opinions given are fair and reasonable, none of the directors, employees, affiliates or representatives of CEBPL shall be liable for any direct, indirect, special, incidental, consequential, punitive or exemplary damages, including lost profits arising in any way whatsoever from the information / opinions / views contained in this report.

The price and value of the investments referred to in this Report and the income from them may tend to go down as well as up, and investors may incur losses on any investments. Past performance shall not be a guide for future performance. CEBPL does not provide tax advice to its clients, and all investors are strongly advised to take advice of their tax advisers regarding taxation aspects of any potential investment. Opinions are based on the current scenario as of the date appearing on this 'Report' only. CEBPL does not undertake to advise you as to any change of our views expressed in this "Report" may differ on account of differences in research methodology, personal judgment and difference in time horizons for which recommendations are made. User should keep this risk in mind and not hold CEBPL, its employees and associates responsible for any losses, damages of any type whatsoever.

Disclaimers in respect of jurisdiction: This report is not directed to, 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 or regulation or which would subject "CEBPL RE" to any registration or licensing requirement within such jurisdiction(s). No action has been or will be taken by "CEBPL RE" in any jurisdiction (other than India), where any action for such purpose(s) is required. Accordingly, this 'Report' shall not be possessed, circulated and/or distributed in any such country or jurisdiction unless such action is in compliance with all applicable laws and regulations of such country or jurisdiction. "CEBPL" requires such recipient to inform himself about and to observe any restrictions at his own expense, without any liability to "CEBPL". Any dispute arising out of this Report shall be subject to the exclusive jurisdiction of the Courts in Mumbai (India). Statements on ownership and material conflicts of interest, compensation - CEBPL and Associates reciprocates to the best of the knowledge and belief of CEBPL/ its Associates/ research Analyst who is preparing this report.

Disclosures of Interest (Additional):

1. "CEBPL", its research Analyst(s), or its associates or relatives of the Research Analyst does not have any financial interest in the company(ies) covered in this report.
2. "CEBPL" its research Analyst, or its associates or relatives of the research analyst affiliates collectively do not hold more than 1 of the securities of the company(ies) covered in this report as of the end of the month immediately preceding the distribution of the research report.
3. "CEBPL", its research analyst, his/her associate, his/her relative, do not have any other material conflict of interest at the time of publication of this research report.
4. "CEBPL", its research analyst, and its associates have not received compensation for investment banking or merchant banking or brokerage services or for any other products or services from the company(ies) covered in this report, in the past twelve months.
5. "CEBPL", its research analyst, or its associates have not managed or co-managed in the previous twelve months, a private or public offering of securities for the company (ies) covered in this report.
7. "CEBPL", or its associates have not received compensation or other benefits from the company(ies) covered in this report or from any third party, in connection with the research report.
8. CEBPL research analyst has not served as an Officer, Director, or employee of the company (ies) covered in the Research report.
9. "CEBPL", its research analyst has not been engaged in market making activity for the company(ies) covered in the Research report.

Details of Associates of CEBPL and Brief History of Disciplinary action by regulatory authorities are available on our website i.e. <https://choiceindia.com/research-listing>

Sr. No.	Particulars	Yes / No
1.	Whether compensation has been received from the company(ies) covered in the Research report in the past 12 months for investment banking transaction by CEBPL	No
2	Whether Research Analyst, CEBPL or its associates or relatives of the Research Analyst affiliates collectively hold more than 1 of the company(ies) covered in the Research report	No
3.	Whether compensation has been received by CEBPL or its associates from the company(ies) covered in the Research report	No
4.	CEBPL or its affiliates have managed or co-managed in the previous twelve months a private or public offering of securities for the company(ies) covered in the Research report	No
5.	CEBPL, its research analyst, his associate, or its associates have received compensation for investment banking or merchant banking or brokerage services or for any other products or services from the company(ies) covered in the Research report, in the last twelve months	No

Copyright: The copyright in this research report belongs exclusively to CEBPL. All rights are reserved. Any unauthorized use or disclosure is prohibited. No reprinting or reproduction, in whole or in part, is permitted without the CEBPL's prior consent, except that a recipient may reprint it for internal circulation only and only if it is reprinted in its entirety.

This "Report" is for distribution only under such circumstances as may be permitted by applicable law. This "Report" has no regard to the specific investment objectives, financial situation or particular needs of any specific recipient, even if sent only to a single recipient. This "Report" is not guaranteed to be a complete statement or summary of any securities, markets, reports or developments referred to in this research report. Neither CEBPL nor any of its directors, officers, employees or agents shall have any liability, however arising, for any error, inaccuracy or incompleteness of fact or opinion in this "report" or lack of care in this report's preparation or publication, or any losses or damages which may arise from the use of this research report.

Information barriers may be relied upon by CEBPL, such as "Chinese Walls" to control the flow of information within the areas, units, divisions, groups, or affiliates of CEBPL.

Investing in any non-U.S. securities or related financial instruments (including ADINR) discussed in this research report may present certain risks. The securities of non-U.S. issuers may not be registered with, or be subject to the regulations of, the U.S. Securities and Exchange Commission. Information on such non-U.S. securities or related financial instruments may be limited. Foreign companies may not be subject to audit and reporting standards and regulatory requirements comparable to those in effect within the United States. The value of any investment or income from any securities or related financial instruments discussed in this research report denominated in a currency other than U.S. dollars is subject to exchange rate fluctuations that may have a positive or adverse effect on the value of or income from such securities or related financial instruments.

Past performance is not necessarily a guide to future performance and no representation or warranty, express or implied, is made by CEBPL with respect to future performance. Income from investments may fluctuate. The price or value of the investments to which this research report relates, either directly or indirectly, may fall or rise against the interest of investors. Any recommendation or opinion contained in this research report may become outdated as a consequence of changes in the environment in which the issuer of the securities under analysis operates, in addition to changes in the estimates and forecasts, assumptions and valuation methodology used herein.

No part of the content of this research report may be copied, forwarded or duplicated in any form or by any means without the prior written consent of CEBPL and CEBPL accepts no liability whatsoever for the actions of third parties in this respect.

The details of CEBPL, its research analyst and its associates pertaining to the companies covered in the Research report are given above.