### GAIL's heartline en route next leg of growth

#### Highlights of visit to GAIL's Vijaipur plant in Madhya Pradesh

GAIL's Vijaipur plant is a sprawling natural gas processing complex established in 1991, rated among the country's leading gas plants. The team showcased the HVJ pipeline's operational capabilities and shared details of key new energy initiatives: addition of large solar and green hydrogen facility with a Small-Scale LNG (SSLNG) plant which will steer the country's energy transition.

GAIL's heartline – Vijaipur natural gas pipeline - accounts for 60% of its overall network: GAIL contributes over 74% of India's natural gas transmission and operates the largest gas pipeline network in India, spanning approximately 16,080 km. The Central Region, including Vijaipur, manages nearly 50% (6,888 km) of this network. Its pipelines transmit ~33mmsmcd to key customers NFL (4.3mmscmd), CFCL (6.3mmscmd), DCM Shriram Kota (0.6mmscmd), OMCs, CGDs and connecting other pipeline networks. The plant processes 21mmscmd of C2C3, 15mmscmd of LPG (producing propane, LPG, pentane, and naphtha) used as feedstock at the PATA petchem plant (Gas processing unit block diagram cited below).

#### Vijaipur - epicenter of GAIL's presence and achievements in India

In Jan'24, the **C2C3 unit** achieved its highest single-day production of 3,207.59mt and also recorded the highest monthly gas processing volume (C2C3+LPG) at 1230.72mmscm (average 39.70mmscmd). **India's first SSLNG Unit was c**ommissioned in November 2023, with a capacity of 36TPD on an investment of Rs 1-1.5bn.

A **Green Hydrogen Project** with a capacity of 4.3TPD, India's largest green hydrogen plant that uses renewable energy sources, is a clean fuel with immense potential for decarbonization. At a solar power cost of Rs3/kw and ~50-55kw per kg of hydrogen, the green hydrogen cost could be ~USD4-4.5/kg (solar power cost is the main driver for reduction in green hydrogen). GAIL's Vijaipur successfully commenced 5% blending hydrogen in Indore's PNG network, furthering its commitment to cleaner energy solutions and paving the way forward for deeper research on hydrogen's potential in natural gas applications. Vijaipur is harnessing Solar Power with a three-pronged approach with a capacity of 20MW, which will significantly reduce reliance on conventional energy sources and promote environmental responsibility.

**Electrification of Gas Turbines project** focuses on reducing CO2 emissions by approximately 6,500TPA, it involves replacing gas turbines with high-efficiency motors and transitioning to electric drives.

Ongoing **Net Zero Initiatives are slated to be achieved by 2040**: gas turbines drives converted to electric drives, emission surveys, recovery of vapors in Naphtha TLG unit, sourcing green power and installing solar panels, offsetting carbon emissions through tree plantation and carbon credit purchases, to name a few.

#### Valuation

We believe GAIL's EBITDA will record 31% CAGR over FY23-26e led by 36% CAGR in gas transmission EBITDA. Gas transmission business is ripe with bright prospects (contributing ~52% to EBITDA in FY26e, expected to rise further) while commodity business is a bit volatile. Despite the recent stock price rally, we foresee an upside basis our valuation, and maintain a BUY rating on the stock with an unchanged TP of Rs236, valuing it on a sum-of-parts basis (core business at Rs204, 10x EV/EBITDA and investments at Rs32).



Reco	:	BUY
СМР	:	Rs 189
Target Price	:	Rs 236
Potential Return	:	+25.1%

#### Stock data (as on March 07, 2024)

Nifty	22,494
52 Week h/l (Rs)	196 / 102
Market cap (Rs/USD mn)	1239735 / 14984
Outstanding Shares (mn)	6,575
6m Avg t/o (Rs mn):	2,803
Div yield (%):	2.8
Bloomberg code:	GAIL IN
NSE code:	GAIL

#### Stock performance



Shareholding pattern (As of Dec'23 end)	
Promoter	51.5%
FII+DII	41.2%
Others	6.5%

#### **Financial Summary**

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(Rs bn)	FY23	FY24E	FY25E	FY26E
Revenue	1,442.5	1,209.0	1,250.8	1,246.6
YoY %	57.4	(16.2)	3.5	(0.3)
EBIDTA	67.0	122.5	137.2	149.1
OPM %	4.6	10.1	11.0	12.0
PAT	53.0	81.0	89.5	96.2
YoY %	(48.8)	52.7	10.5	7.5
ROE	9.5	13.5	13.7	13.6
EPS	8.1	12.3	13.6	14.6
P/E	13.0	15.3	13.9	12.9
BV	84.6	91.5	99.3	108.0
EV/EBITDA	4.4	10.6	6.1	5.9

HARSHRAJ AGGARWAL Lead Analyst harshraj.aggarwal@ysil.in

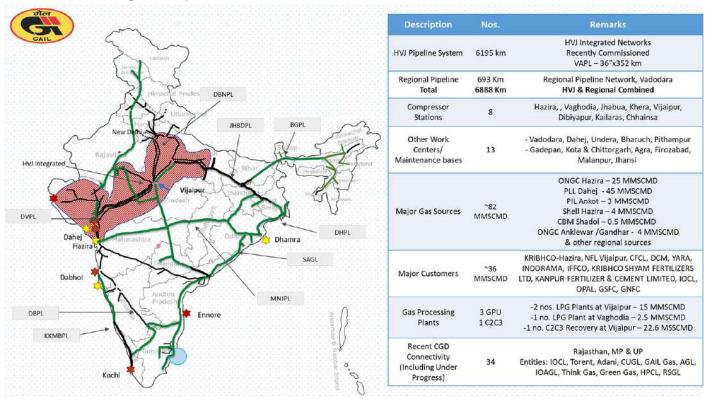




#### Overview of GAIL's Vijaipur units and production capacities:

- Units: LPG TR-11 (1991), LPG TR-12 (1992), C2C3 (2015), SSLNG (2023)
- Products: LPG, Propane, Pentane, Naphtha, C2C3, LNG
- Annual Design Production: LHC 557 TMT, C2C3 952 TMT

#### **Exhibit 1: Central Region Footprint on National Gas Grid**

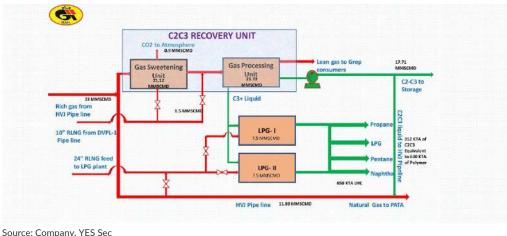


Source: Company, YES Sec

#### **Key recent achievements**

- Record-breaking Production: The C2C3 unit achieved its highest single-day production of 3207.59mt on January 31, 2024. Additionally, it recorded the highest monthly gas processing volume (C2C3+LPG) at 1230.72mmscm (average 39.70mmscmd) in January 2024.
- Product Recovery Improvement Project: Aimed at enhancing efficiency, this project will increase the capacities of LPG and C2C3.

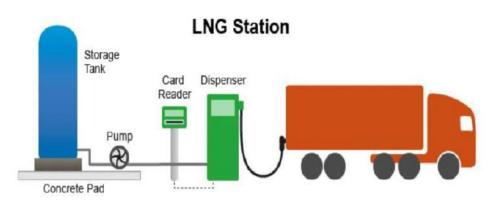
#### **Exhibit 2: Gas Processing Unit Block Diagram**





- Electrification of Gas Turbines: This project focuses on reducing CO2 emissions by approximately 6,500TPA. It involves replacing gas turbines with high-efficiency motors and transitioning to electric drives.
- India's First SSLNG Unit: Commissioned end 2023, this marks a significant milestone for GAIL Vijaipur. With a capacity of 36TPD (2 trains of 18tpd each) and an investment of Rs 1bn, this unit strengthens India's self-sufficiency in clean LNG production. It was started on 16<sup>th</sup> Nov'23 and so far, 36 tanker loads of 18 tonnes each have been dispatched since Nov'23.
- LNG Transport Fuel Station: A first-of-its-kind project by GAIL, this station located near Vijaipur on A.B Road Highway will have a capacity of 56KL. This initiative promotes the adoption of LNG as a clean transportation fuel.

#### Exhibit 3: GAIL's first LNG Transport Fuel dispensing station



"Making strides in Clean Energy through developing LNG as Transport Fuel - As a New Vertical of GAIL"



Source: Company, YES Sec

**Pioneering Hydrogen Blending:** GAIL Vijaipur successfully commenced blending 5% hydrogen in Indore's PNG network. This initiative demonstrates a commitment to cleaner energy solutions and will promote further research on hydrogen's potential in natural gas applications.



**Green Hydrogen Project:** This project will establish India's largest green hydrogen plant with a capacity of 4.3TPD with an investment of Rs 2.31bn. Green hydrogen, produced using renewable energy sources, is a clean fuel with immense potential for decarbonization. This project reflects GAIL's commitment to sustainable practices. The PEM electrolyzer delivery at site is expected by end Mar'24, and commissioning by May'24. At a solar power cost of Rs3/kw and ~50-55kw required for 1kg of hydrogen, the green hydrogen cost could be ~USD4-4.5/kg (solar power cost is the main driver for reduction in green hydrogen).



#### Exhibit 4: India's largest Green hydrogen plant with 4.3TPD capacity

Source: Company, YES Sec

- Harnessing Solar Power: GAIL Vijaipur is embracing solar energy with a three-pronged approach:
- A 10MW ground-mounted solar project with an investment of Rs 625.7mn.
- A 7.8MW floating solar power plant constructed at a cost of Rs 630mn.
- An additional 1.8MW solar project.
- These initiatives will significantly reduce reliance on conventional energy sources and promote environmental responsibility.
- Enhancing LPG Storage Capacity: To ensure efficient storage and distribution of LPG, GAIL
  Vijaipur has increased its storage capacity by 3208mt with addition of LPG Mounded Bullets.

#### Exhibit 5: LHC storage



Source: Company, YES Sec



#### **Net Zero Initiatives**

GAIL Vijaipur is committed to achieving net zero emissions by 2040. Roadmap includes:

- Operational Decarbonization: Implementing measures to achieve energy efficiency equivalent to 20mmscm fuel by 2040. This includes blending hydrogen, replacing natural gas with renewable energy sources, and converting gas turbines to electric drives.
- **Energy Transition:** Utilizing renewable energy sources like compressed biogas and solar power, and offsetting carbon emissions through tree plantation and carbon credit purchases.
- **Carbon Capture, Utilization, and Storage:** Capturing vented CO2 for use in production processes and carbon capture storage projects.

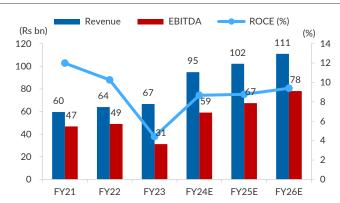
#### **Ongoing Net Zero Initiatives**

Several initiatives are underway to support GAIL Vijaipur's net zero goals, including:

- Conversion of gas turbine drives to electric drives for compressors.
- Pilot study for co-firing hydrogen in gas turbines.
- Implementing fugitive emission surveys to reduce greenhouse gas emissions.
- Exploring electrification of natural gas driven equipment.
- Recovering vapors in the Naphtha TLG unit.
- Sourcing green power and installing solar panels.



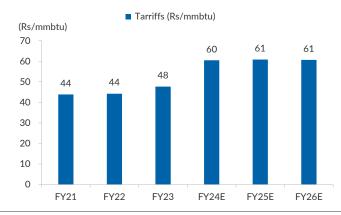




#### Exhibit 6: Gas Transmission business

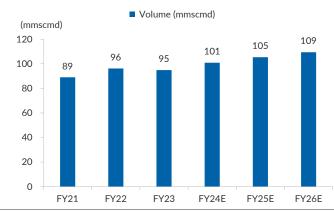


#### **Exhibit 8: Integrated transmission tariff**



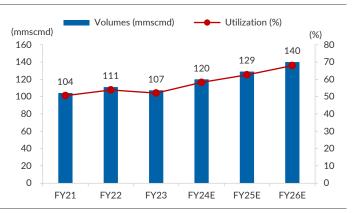
Source: Company, YES Sec

#### Exhibit 10: Natural Gas business volumes

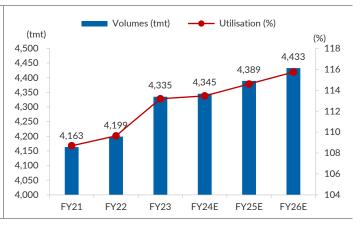


Source: Company, YES Sec

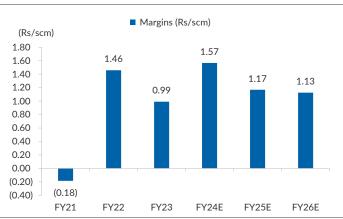
#### **Exhibit 7: Gas transmission volumes**



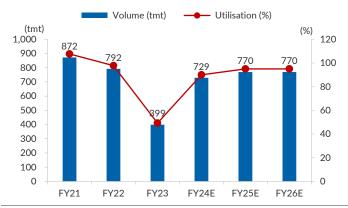
#### **Exhibit 9: LPG Transmission**



#### **Exhibit 11: Natural Gas business margins**



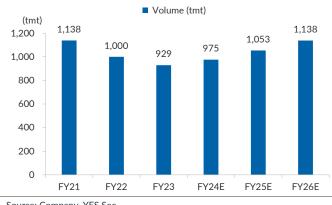




#### **Exhibit 12: Petchem Volumes**

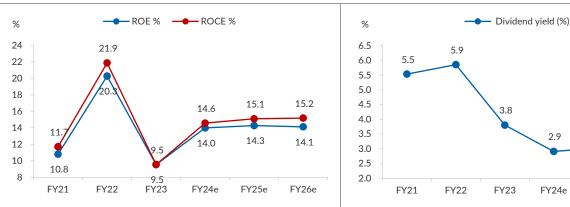
Source: Company, YES Sec

#### **Exhibit 14: LPG and LHC Volumes**



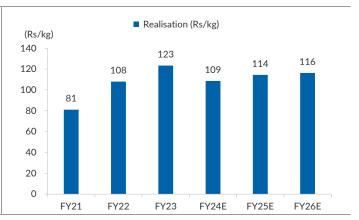
#### Source: Company, YES Sec

#### **Exhibit 16: Return ratios**



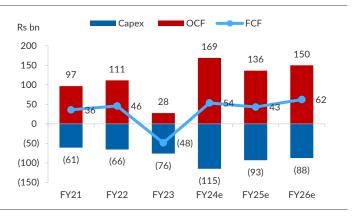
Source: Company, YES Sec

#### **Exhibit 13: Petchem Realisation**



#### **Exhibit 15: Free cash-flows**

Exhibit 17: Dividend Yield (%)



#### For important information about YES Securities (India) Ltd. and other disclosures, refer to the end of this material.

7

3.0

FY25e

2.9

3.2

FY26e



### **VIEW & VALUATION**

#### BUY with a TP of Rs 236/share

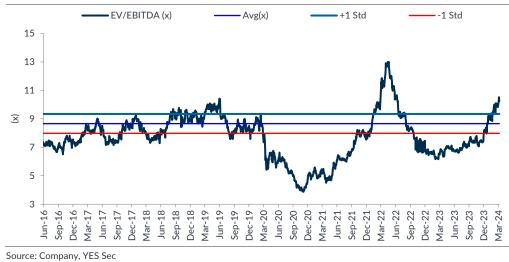
We anticipate an improving near-term outlook for gas transmission, trading and petchem following the drop in spot LNG prices, which could drive higher gas transmission and trading volumes as also lower operating costs.

We believe GAIL's EBITDA will record a 31% CAGR over FY23-26e led by a 36% CAGR in gas transmission EBITDA. The gas transmission business is ripe with bright prospects (contributing ~52% to EBITDA in FY26e, expected to increase further) while the commodity business is a bit volatile. Despite the recent rally in the stock price, we sense an upside as per our valuation, and maintain a BUY rating on the stock with an unchanged TP of Rs236, valuing it on a sum-of-parts basis (core business at Rs204, 10x EV/EBITDA and investments at Rs32).

#### **Exhibit 18: SOTP Valuation table**

Valuation				
Particulars				
Core Value	EBITDA	(x)	EV	Rs/Share
Standalone	149,112	10.0	1,489,839	226
Net Debt			147,030	22
Total Core value			1,342,809	204
Value of investments				
Listed Investments				
PLNG			36,488	6
ONGC			59,332	9
IGL			48,510	7
China Gas			7,509	1
MGL			34,608	5
Total value of listed investments @ 30% discount			186,446	28
Unlisted Investments				
Brahmaputra Cracker & Polymer Ltd (BCPL)				2
ONGC Petro-Additions Ltd (OPAL)				2
Ramagundam Fertilizers				0
Southeast Asia Gas Pipeline Company				0
Total value of listed investments				4
Fair Value				236

#### Exhibit 19: EV/EBITDA (x) band, one-year-forward



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### **FINANCIALS**

#### Exhibit 20: Income statement

Y/e 31 Mar (Rs mn)	FY22	FY23	FY24E	FY25E	FY26E
Revenue	916,265	1,442,497	1,209,040	1,250,842	1,246,594
Total Expense	777,975	1,375,508	1,086,578	1,113,687	1,097,481
Operating Profit	138,290	66,989	122,462	137,156	149,112
Other Income	20,469	26,847	22,551	23,454	24,392
Depreciation	21,112	24,881	30,458	34,643	38,581
EBIT	137,647	68,955	114,555	125,966	134,924
Interest	1,744	3,117	6,344	6,344	6,344
Extraordinary Item	-	-	-	-	-
РВТ	135,903	65,838	108,211	119,622	128,580
Тах	32,263	12,823	27,237	30,109	32,363
PAT	103,640	53,015	80,975	89,513	96,216
Adj. PAT	103,640	53,015	80,975	89,513	96,216
Eps	15.8	8.1	12.3	13.6	14.6

#### Exhibit 21: Balance sheet

Y/e 31 Mar (Rs mn)	FY22	FY23	FY24E	FY25E	FY26E
Equity capital	44,404	65,751	65,751	65,751	65,751
Reserves	511,464	490,786	535,597	587,304	644,069
Net worth	555,868	556,537	601,348	653,055	709,820
Debt	76,558	157,295	157,295	157,295	157,295
Deferred tax liab (net)	47,673	46,628	46,628	46,628	46,628
Capital Employed	680,098	760,460	805,271	856,978	913,743
Fixed assets	528,523	579,698	664,299	722,656	771,575
Investments	186,194	194,084	194,084	194,084	194,084
Net working capital	(34,619)	(13,322)	(53,111)	(59,761)	(51,916)
Inventories	30,152	52,813	39,749	41,124	40,984
Sundry debtors	73,164	103,663	66,979	69,016	68,076
Cash & Bank Balance	20,850	4,020	10,547	2,890	11,571
Other current assets	24,522	27,039	27,039	27,039	27,039
Sundry creditors	54,660	72,992	69,561	71,966	71,722
Other liabilities	128,647	127,864	127,864	127,864	127,864
Application of Funds	680,098	760,460	805,272	856,978	913,743



#### Exhibit 22: Cash flow statement

Y/e 31 Mar (Rs mn)	FY22	FY23	FY24E	FY25E	FY26E
РВТ	135,903	65,838	108,211	119,622	128,580
Depreciation & amortization	21,112	24,881	30,458	34,643	38,581
Interest expense	(4,269)	(3,681)	6,344	6,344	6,344
(Inc)/Dec in working capital	(30,198)	(30,932)	46,316	(1,006)	835
Tax paid	(31,960)	(15,178)	(27,237)	(30,109)	(32,363)
Less: Interest/Dividend Income Received	(8,709)	(14,640)			
Other operating Cash Flow	5,662	1,791			
Cash flow from operating activities	87,540	28,080	164,093	129,494	141,976
Capital expenditure	(59,184)	(73,416)	(115,059)	(93,000)	(87,500)
Inc/(Dec) in investments	(4,372)	(10,586)	-	-	-
Add: Interest/Dividend Income Received	19,426	18,469	-	-	-
Cash flow from investing activities	(44,130)	(65,533)	(115,059)	(93,000)	(87,500)
Inc/(Dec) in share capital	19,000	90,770	-	-	-
Inc/(Dec) in debt	(17,430)	(14,720)	-	-	-
Dividend Paid	(39,943)	(30,679)	(36,163)	(37,807)	(39,451)
Others	(3,485)	(19,856)	(6,344)	(6,344)	(6,344)
Cash flow from financing activities	(41,857)	25,515	(42,507)	(44,151)	(45,795)
Net cash flow	1,553.4	(11,938)	6,527	(7,657)	8,681

#### Exhibit 23: Du-pont analysis

Y/e 31 Mar (Rs mn)	FY22	FY23	FY24E	FY25E	FY26E
Tax burden (x)	0.8	0.8	0.7	0.7	0.7
Interest burden (x)	1.0	1.0	0.9	0.9	1.0
EBIT margin (x)	0.2	0.0	0.1	0.1	0.1
Asset turnover (x)	1.1	1.6	1.2	1.2	1.1
Financial leverage (x)	1.6	1.6	1.7	1.6	1.6
RoE (%)	20.3	9.5	14.0	14.3	14.1



#### Exhibit 24: Ratio analysis

Y/e 31 Mar	FY22	FY23	FY24E	FY25E	FY26E
Growth matrix (%)					
Revenue growth	61.5	57.4	(16.2)	3.5	(0.3)
Op profit growth	114.6	(51.6)	82.8	12.0	8.7
EBIT growth	110.4	(49.9)	66.1	10.0	7.1
Net profit growth	111.9	(48.8)	52.7	10.5	7.5
Profitability ratios (%)					
OPM	15.1	4.6	10.1	11.0	12.0
EBIT margin	15.0	4.8	9.5	10.1	10.8
Net profit margin	11.3	3.7	6.7	7.2	7.7
RoCE	20.2	9.1	14.2	14.7	14.8
RoE	18.6	9.5	13.5	13.7	13.6
RoA	13.0	5.8	8.2	8.7	8.9
Per share ratios					
EPS	15.8	8.1	12.3	13.6	14.6
Dividend per share	6.1	4.0	5.5	5.8	6.0
Cash EPS	19.0	11.8	16.9	18.9	20.5
Book value per share	84.5	84.6	91.5	99.3	108.0
Valuation ratios					
P/E	6.6	13.0	15.3	13.9	12.9
P/CEPS	5.5	8.9	11.2	10.0	9.2
P/B	1.2	1.2	2.1	1.9	1.8
EV/EBIDTA	8.0	4.4	10.6	6.1	5.9
Payout (%)					
Dividend payout	38.6	49.6	44.7	42.2	41.0
Tax payout	23.7	19.5	25.2	25.2	25.2
Liquidity ratios					
Debtor days	29.1	26.2	20.2	20.1	19.9
Inventory days	14.3	11.0	15.5	13.3	13.7
Creditor days	23.0	16.9	23.9	23.2	23.9



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#### DISCLOSURE OF INTEREST

Name of the Research Analyst : Harshraj Aggarwal

The analyst hereby certifies that opinion expressed in this research report accurately reflect his or her personal opinion about the subject securities and no part of his or her compensation was, is or will be directly or indirectly related to the specific recommendation and opinion expressed in this research report.

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