

Aegis Vopak Terminals Ltd. is a Leader in terminalling of LPG gases (LPG, Propane & Butane) in India.



VALUATION REPORT

OF

AEGIS VOPAK TERMINALS LIMITED

At Pipavav & Kandla

FOR: AXIS TRUSTEE SERVICES LIMITED for the benefit of Lenders.

BY: SANJAY DAYAL, REGD. VALUER



SPHERICAL TANK FOR LPG STORAGE

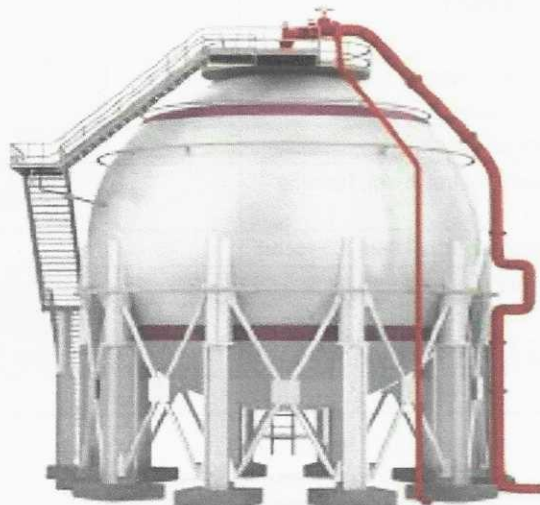
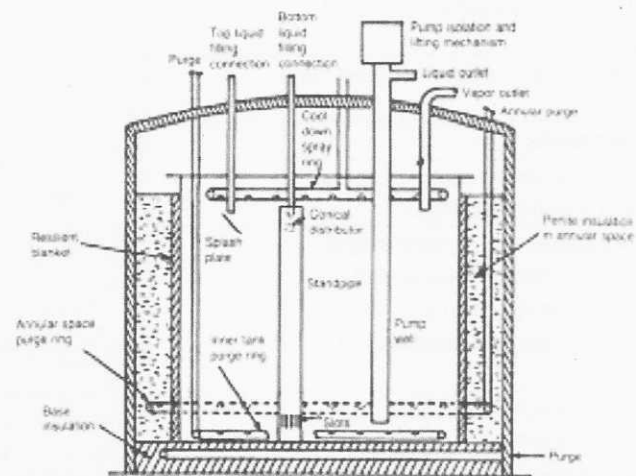


REFER TANK FOR STORAGE OF PROPANE / BUTANE

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CRYOGENIC TANK



MOUNDED TANK

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Ref.: SD/VAL/ATSL/AVTL/2025/031

09.12.2025

Axis Trustee Services Ltd

The Ruby, 2nd Floor, SW,
29, Senapati Bapat Marg,
Dadar west, Mumbai – 400 028

Sub: Estimate Security Value of P & M AVTL at PIPAVAV & KANDLA

Dear Sir,

This is in reference to our engagement through a mail dated 01.12.2025 to estimate the asset value for security Purpose for a Proposed IPO brought by AVTL where Axis is a Trustee on behalf of SEBI. The Assets comprise of Equipment used in receiving gases from Vessel, Storing the same in appropriate tanks (Refer & Mounded) and then dispensing it in Trucks or Railway Wagons.

Aegis Vopak Terminal Ltd (AVTL) at Pipavav & Kandla handle Gases (Propane and Butane) and Chemicals at the Terminal. Terminal has two types of Tanks namely Refer (Cylindrical) and Pressurized (Spherical) tanks, Pumps, Pipelines, loading bays, Utility Unit, Cooling Towers etc. Terminals are used for evacuating Propane and Butane from vessels using LTCS (Low Temperature Carbon Steel) insulated Pipes at Sub Zero Temperature and stored as liquid in Two API 620 grade tanks suitable for storing liquid gases. The Spherical Mounded tanks use pressure to liquify the Gases. Liquefied propane and butane occupy far less volume than their gaseous state (about 1/250th). It also enables large quantities of gases to be transported in relatively compact tanks.

The gases stored in the tanks are discharged in Bullet tanks on lorries and railway for onward transportation. To evaluate the security offer by AVTL in form of movable assets at the gas terminals, we visited the terminal on 3 & 5 instant and inspected the assets listed in the FAR shared with us. During our visit to the two terminals, we observed various equipment as listed in the FAR and found them in operation as explained by company officials.

Pipavav Terminal is divided into 2 campuses P1 & P2 spread over 20 & 24 Acres of land respectively. At Kandla AVTL has several campuses having large nos. of Tanks for storage of various types of Chemicals. We were taken to the Gas & Bottling Plant Terminal which had two Nos. of refer tanks of 24000 MT capacity. Both the Terminal apart from having Gas Storage tank have requisite accessories and network of pipelines for receiving and discharging the LPG to and from the terminal.

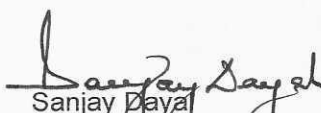


This valuation report has been prepared on engagement with Axis Trustee, as per the requirements of the financial institutions, Banks or any other regulatory or statutory authority as may be required. It is made in accordance with the IVSC standards, Regulations and guidelines required for an impartial valuation of Terminal assets. This valuation entails computation of Equipment Capitalization Value, Age, usefulness built in, attributes stitched for Terminal operation, using Cost Approach with amenities. We have used services of reputed and recognized entities in the industry and have applied appropriate considerations with sustainable assumptions for an infrastructure asset for use as Industrial Hub & Logistics Park in the proximity of a Port acclaimed as Gateway to the Futuristic tomorrow. Based on the Services offered by Terminal and limited Land Availability judiciously divided for installation equipment and accessories.

With the objective of reckoning the contemporary value we researched the internet, website, various reports, media briefing, permits and permission obtained etc. to form our opinion for the justification regarding input in the asset value of Terminal resources for security purpose. Terminal has several premium amenities such as Truck & Train Loading bays, supply chain services, connectivity with Port, Internal Road, effluent treatment plant, Power and water availability etc.

The opinion on the valuation is prepared for the use of the Axis Trustee and their associates. We take no responsibility and/or liability to any third party for the whole or any part of this report. Valuer shall not be held responsible or liable for indirect or consequential damages arising from socio economic development.

Regards.


Sanjay Dayal
Registered Valuer

SUMMARY OF VALUE OF TERMINAL ASSETS

Value of P & M Assets of Pipavav & Kandla Gas Terminal				
S.No	Description	Capitalised / Reinstanment	Depriciated Value	
		Value in INR	in INR	
		Fig is in LAC	Fig is in LAC	REMARKS
1	Pipavav Refer Tanks & Accessories	65,799	63,750	Only P & M Assets
2	Pipavav Sphare Tank & Accessories	33,418	26,477	Horton Spheres for High Pressure
3	S 18 & S 19 Tanks and Accessories	5,955	5,757	Horton Spheres for High Pressure
4	Pipavav Bottling Plant	1,100	1,041	For Distribution
5	Kandla Refer Tanks & Accessories & Botling	45,022	38,941	Refer Tank & Bottling Plant
6	Kandla Capitalised Inventory	1,580	1,106	Capital Spares of the Machines
		1,52,874	1,37,071	

Sanjay Dayal

Name of Company: AEGIS VOPAK TERMINALS LIMITED					
Pipavav Cryogenic Tanks					
Fixed assets				Capitalised in:	2025
Sr No.	Assets Description	Capitalised in	Capitalised Value Rs Lac	Depericiated Value in Rs. Lac	Remarks
				-	
1	2 Nos Storage Cryogenic Tank 24000 MT each, alongwith related facilities and accessories comprising of	2025		-	
	Storage Tank T101 - 24000 MT (Used for Propane)		36,712.00	35,977.76	T 101 & 102 are Identical
	Storage Tank T101 - 24000 MT (Used for Butane)			-	NM Part: Life 50 Yrs
	Vapour Absorption system invoving vaporiser coulumn,			-	
				-	
2	20" Jetty Pipeline		4,448.46	4,359.49	NM Part: Life 50 Yrs
	Two numbers of 20 inch LTCS pipeline of length _____ metres each to recive products from jetty			-	
				-	
3	Marine Loading arms at jetties : Four Numbers of 16 inch		840.89	756.79	Life 20 Yrs. Moving Part
				-	
4	Truck Loading Facilities/Loading Gantry comprising of :			-	
	Two LPG truck loading gantries comprising 8 bays each, with 16 numbers of liquid loading arms and 16 numbers of vapour loading arms.			-	
	Steel structures fot two numbers of LPG gantries ,			-	
				-	
	Internal Pipeline			-	
	Internal LTCS pipelines of various size and lengths and steel support racks for laid pipelines.		4,442.48	4,353.63	NM Part
	Pipe rack supports, supports for pipes, cable trays			-	
				-	
				-	
5	Intank Pumps (2 Nos)		1,157.78	1,099.89	Submersible Pump
				-	
6	LPG Pumps and pumping system			-	
	LPG Pumping system involving ____ Nos of Transfer pumps, ____ product Heat exchangers, ____ Air Fin heater		440.82	396.74	Moving Part 20 Yrs
	AirFin Heater & HE-1 Vapour Absorption System (HE-211)		1,524.16	1,447.95	Life 25 Yrs
				-	
7	Compressors and accessories			-	
	Reliquification system consisting of 2 Nos of Flash Off gas compressors and 2 Nos of Boil Off gas compressors with condensors, recievers and subcoolers.		3,901.47	3,706.39	
8	Cooling Towers with all accessories therein		512.30	486.68	
	Nitrogen Plant: PSA nitrogen plant of capacity 65 NM3/Hr, consisting of vessels of different sizes for holding air, nitrogen and with two air generation compressors			-	
	Two heat exchanger and one subcooler.			-	
				-	

9	750 KVA DG sets 2 Nos with Panel		233.28	209.95	20 Ys
	D.G. shed			-	
10	Electrical Substation, Transformers and Installation			-	
	Electrical Substation		7,276.06	6,912.26	
	G+1 substation building			-	
	Electrical Transformers		316.85	301.01	
	Transformer 4 MVA, 11KV/6.9 KV & Transformer 2 MVA 6.6 KV/0.433 KV			-	
	Electrical Installation		2,952.94	2,805.29	
11	Fire Fighting System			-	
	Fire water pump house		208.89	188.00	Acc Prone
	Fire extinguisher			-	
	Fire Detector System			-	
	Fire Alarm System (MCP & MSD)			-	
	Fire water pump house consisting of ___ Electrical Jockey pumps, ___ Electrical main pumps, ___ diesel engine driven pumps.			-	
	fire fighting hydrant lines of various size throughout the plant.			-	
12	Instrumentation equipments			-	
	DCS panels with processors and IO cards, ___ nos, of desktop consoles with one 65 inch monitor,		387.54	348.78	Obsolescence
	Entire Plant : ___ Servo guages and ___ radar guages, ___ multipoint temp transmitters mouted on tank, Control valves of various sizes (___ inch to ___ inches), Transmitters for pressure, flow , temperatures and levels.			-	
	Tank lorry Gantry: 16 sets Batching unit with MFMs,on/off valves , GDS and FDS			-	
	Instrumentation equipments		443.34	399.01	Obsolescence
	Public address system and Electric Siren			-	
13	Laboratory Equipments			-	
	LPG Testing Lab : 2 GC systems with six numbers of nitrogen, Air and hydrogen cylinders			-	
	Civil and Structurals comprising of :			-	
14	Admin office, Doctor room, Control Room, Training Center, Canteen & toilets		38.64		NC
15	Two bed occupational health centre (First Aid room)			-	
16	Internal roads, Boundary wall		162.00		NC
			65,999.90		
	Book Vale of Equipment Sans CIVIL Construction		65,799.26		

Pipavav GTD Horton Spheres						
Sr.	Description of machine	Qty.	Year of	Capitalization / Reinstatement	Depreciated Value	
No.	(Technical Specifications)		Manufac ture	Value (INR in Lacs)	Rs. Lac	
1	2	3	5			
Spherical Tanks for LPG, MOC: CS						
1	Sphere S1	1/1350 MT	1998	1,581.13	812.70	Procured from Shell, Salvage Value 10%
2	Sphere S2	1/1350 MT	1998	1,581.13	812.70	
3	Sphere S3	1/1450 MT	2014	1,698.26	1,392.57	Salvage Value 10%
4	Sphere S4	1/1450 MT	2014	1,698.26	1,392.57	
5	Sphere S5	1/1450 MT	2015	1,698.26	1,392.57	
6	Sphere S6	1/1450 MT	2015	1,698.26	1,392.57	
7	Sphere S7	1/1750 MT	2017	2,049.62	1,754.47	
8	Sphere S8	1/1750 MT	2017	2,049.62	1,754.47	
9	Sphere S9	1/1750 MT	2017	2,049.62	1,754.47	
10	Sphere S11	1/1750 MT	2017	2,049.62	1,754.47	
11	Sphere S12	1/1750 MT	2017	2,049.62	1,754.47	
12	Sphere S13	1/1750 MT	2017	2,049.62	1,754.47	
TOTAL				22,253.00	17,722.52	
13	Jetty Pipeline	3 x 2700 METER	2016	390.92	327.59	
14	Battery Limit Pipeline	1500 METER	2016	93.44	78.31	
15	Valves	LUMPSUM	2017	68.92	58.99	
16	Pumps and Pumphouse	3	2017	22.25	18.24	
17	Fire and Safety		2017	92.70	76.01	
18	Propane Pump house	6	2016	33.54	26.75	
19	TLF Bay	16	2017	119.18	70.91	Truck Loading Bay
20	Diesel Engine for above pump		2003	24.00	8.16	
21	Remote Operated Valve		2003	9.83	2.04	
22	PLC Panel & Accessories		2003	9.36	1.95	
23	Air System		2003	7.95	1.65	
24	Pumps and Pumphouse (Addnl extention)		1998/2017	13.50	6.21	
25	Marine Loading Arm (Jetty)	1	2018	417.95	286.30	
New Addition					-	
26	weigh Bridge 2 nos	2	2017	25.00	16.00	
27	loading arms 8 bays	16 loading arm	2017	30.00	19.20	
28	lpg / propane compressor	1	2017	22.00	14.08	
29	Mercaptan Dozing Skid	1	2017	22.00	15.66	
30	Other Electrical		2017	55.00	35.20	
					-	
31	Rail Gantry			8,828.07	7,040.39	Rail Gantry 700 M long
	LPG Gantry		2016	354.91	211.17	
	Fire Water Tank	10000 KL		524.91	439.88	
TOTAL				11,165.43	8754.69	
TOTAL PIPAVAV SPH				33,418.43	26477.22	

PIPAVAV GTD S18 & S 19						
Sr. No.	Description of machine (Technical Specifications)	Qty.	Year of Manufacture / Fabrication	Capitalised value Rs Lac	Depreciated Value Rs Lac	Remarks
1	2	3	5			
1	SPHERICAL TANKS (S - 18 & S - 19)					
	(FOR STORAGE OF PROPYLENE / L.P.G. / PROPANE)	2 Nos.	2023	5,169.76	5,004.33	mm plate. Capable Temp between -47 to 45Deg C
	Specifications:					Compatiable for Propeyelen Storage
a.	Material of Construction : Carbon Steel					
b.	Capacity Metric Cube -					
	S - 18 - 3704 Metric Cube of Water					
	i.e. 1850 Metric Tons of Propylene					
	S - 19 - 3704 Metric Cube of Water					
	i.e. 1850 Metric Tons of Propylene					
c.	Sphere ID No. (S - 18) - 2205A					
	(S - 19) - 2205B					
d.	Design Code (S - 18 & S - 19) :					
	ASME SEC-VIII dev-2, CLASS-2 ED 2021					
e.	Design pressure at top (Kgs/Cm2) - 22.5 Each					
f.	Design Temperature (Degree C):					
	(S - 18) = -47 Deg. C to +55 Deg. C					
	(S - 19) = -47 Deg. C to +55 Deg. C					
g.	Internal Dia (Meters) :					
	(S - 18) = 19.2 mtrs.					
	(S - 19) = 19.2 mtrs.					
h.	Shell Mn Thickness (MM)					
	(S - 18) = 60mm					
	(S - 19) = 60mm					
2	Pipelines (C.S.) of Various Sizes	4600 mtrs.	2023	295.80	285.15	
3	Fittings for the above pipes comprising of Elbows, Ts, Couplers, etc.	Lumpsum	2023	69.30	66.80	
4	Valves (Gate Walls, Ball Valves, ROV, etc.	Lumpsum	2023	210.12	202.56	
5	Safety Relief Valves (SRV)	4	2023	5.36	5.16	
6	Pumps	3	2023	118.15	111.06	
	60 Metric Cube / Hour with 37.0 Kw Electric Motor each	(2 Nos.)				
7	Various Instruments comprising of					
a.	High Level Switches, Radar Gauges, Servo Level Gauges,	2 Nos. Each	2023	26.40	24.82	
	Temperature Sensor Units & Pressure Transmitters					
b.	Displacer & other accessories for radar & servo	1 No.	2023	1.56	1.46	
8	FLP Items (Flame Proof)	Lumpsum	2023	4.09	3.84	
9	Cable Trays of Various Sizes	725 Metres	2023	5.57	5.24	
10	Electrical Cables of Various Current Capaciyy	10000 Metres	2023	18.71	17.59	
11	Execution work for electrical & instrumentation	Lumpsum	2023	16.60	15.60	
12	Gas Dedector System (GDS)	5 Nos.	2023	6.81	6.40	
13	Deluge Valves	3 Nos.	2023	6.86	6.61	
	TOTAL			5,955	5,757	

KANDLA GTD and bottling plant							
A. MECHANICAL					AMOUNT		
Sr.	Description of machine	Qty.	Make/	Year of Capitali- zation	Capitalized Value (INR in Lacs)	Depericiated Value Rs. Lac	
No.	(Technical Specifications)		Supplier				
1	2	3	4	5			
24,000 MTx2 nos. cryogenic tanks with associated							
LPG storage tanks							
1	Tank construction including material, foundation	2 Nos.	MOC LTCS (Essar Steel) Sharp Tanks & Structural (P) Ltd ITD Cementation	2021	14579.7	13,267.52	Specialised Steel Life 50 Ys Plus
	Bottom insulation	2 Nos.	Owens Corning Sales, LLC Gulf Perlite Lloyd Insulations (India)	2021	766.8	697.79	
	Deck insulation	2 Nos.	Lloyd Insulations (India)	2021	69.7	63.44	
	Shell and roof insulation	2 Nos.	Lloyd Insulations (India)	2021	885.4	805.72	
LPG mounted Vessels (50 MT x 2 nos.)							
	Civil work for bullet foundations and mound	LS	J D Projects	2021	218.2	NIL	Civil Work Not Considered
	Tank construction including material	2 Nos.	Bulk MRO (Maintenance, Repair, and Operations)	2021	233.0	233.00	No Depericiation
	Cathodic protection	LS	BSS Tech	2021	29.0	23.82	system life often 30-40 years
	Pumps & accessories	LS	Oil and Gas Plant	2021	44.1	36.20	
Jetty Pipe lines (16" x 2 nos)							
	Jetty pipe lines (2 nos.x 4000 m)	1	Inner Mongolia Baotou Steel Union Co.,Ltd Jindal Saw Ltd. Oasis	2021	5,391	4,905.41	
	MLA (12") incl. installation	2	COSCO(Lianyungang) Liquid Loading & Unloading Equipment Co.,Ltd. Link Shipping	2021	755.2	619.26	Marine Loading Arm. Moving Part
	Insulation for jetty lines	1000 Mtrs	Perma-Pipe India Pvt. Ltd	2021	743.6	676.65	
	IOCL Pipeline			2024	4450.4	4,290.23	
	Gail Pipeline			2024			
Refregeration System							
	Vapour compressor (2 nos.) for unloading	2 nos.	Frick India	2021	1,098	900.30	
	Vapour compressor (2+1 nos.) for boil off	3 Nos.	Frick India	2021	662.9	543.61	
	Cooling towers, air fin heaters	1 Nos.	Paharpur Cooling towers Ltd	2021	128.3	105.23	

Ref. & heating system	LS	R&D Therm India Pvt Ltd Astun Technologies Pvt. ;td Avadh Engineering Pvt.Ltd	2021	429.9	352.50	
Booster pumps	LS	Flowserve	2021	62.7	51.45	
Loading System						
T/T loading - pumps (2 nos. in each tank)	4 nos.	Oil and Gas Plant Engineers	2021	1,650	1,352.83	Truck Loading Gantry
Static mixture Tool	1 Set	Astun Technologies Pvt. ;td	2021	15.7	14.27	Non Moving Part
Mercaptan dosing sys	2 Set	Oil & Gas plant Engineers	2021	76.7	62.88	Equipment
Loading arm	16 Nos.	Ferro Tube & Forge	2021	92.9	76.22	
Weigh bridges	2 Nos.	Rice Lake Weighing System	2021	48.8	40.01	
Piping & structurals						
Pipes & fittings	1 Lot	Shanghai Haitai Steel International Trading Co.,Ltd Shanghai Feiting Pipe Manufacturing Co.Ltd	2021	2320.9	2,112.01	
Pipe Rack Shed	3115 SQM		2021	1432.9		
Fasteners & gaskets	1 Lot	Rushiprabha Engineers Pvt ltd Reams fasteners Private ltd	2021	158.0	143.79	
Piping and structural construction	1 Lot	J D Projects Oasis	2021	1186.2	1,079.47	
Valves & strainers	1 Lot	Zhejiang Boteli Technology Co. Ltd Sigma Industries	2021	936.4	852.16	
Insulation of piping	1 Lot	Perma Pipes Lloyd Insulations (India) Limited	2021	174.3	158.59	
Utilities						
Instrument air compressor system	2 Lot	Spantech Industries	2021	35	28.58	
Ground/Sea water feed/treatment with allied facilities	1 Lot		2021	348.5	285.81	Handling Sea Water Life 25 Yrs
PSA N2 system	2 Set	Spantech Industries	2021	378.8	293.54	Life 20 Yrs
Electricals & Instrumentation						
Electricals incl. D.G.sets	1 Lot	GD Anklesaria & Co Maranatha Engineers KEC International	2021	1,871	1,534.25	
Instrumentation	1 Lot	KEC International Lt Digicon Automation Pvt. Ltd.	2021	1255.5	1,029.54	
Fire fighting system						
Fire fighting incl. pump house extn., pums, piping & equip. etc..		Wilo Mather Platt	2021	348.5	285.77	
Design/Engg.						
Engineering consultancy, Inspection/ liaison expenses	LS	Projects & Development India Ltd	2021	1000.0	1,000.00	No Depreciation
TT Gantry	1110 SQM		2021	244.2	200.24	
Bottling Plant capex				900.0	819.00	
TOTAL				45,021.70	38,941.07	

Annexure III - Capital Stores					
KANDLA CAPITAL SPARES					
Sr. No.	From Date	Description of machine (Technical Specifications)	QTY	Invoice Value as on 31/03/2021 (Amt in INR)	Depericiation over 5 Yrs
1	3	6	7	9	
1	31.03.2021	SCREW TYPE REF COMPRESSOR KANDLA	2	5,54,40,000	3,88,08,000
2	31.03.2021	SCREW TYPE BOIL OFF COMPRESSOR KANDLA	2	3,70,60,000	2,59,42,000
4	31.03.2021	MLA, 12" 300#, LTCS # OJ1, Kandla	2	2,94,03,505	2,05,82,453
5	31.03.2021	Variable Frequency Drive Panel -1 & 2	1	1,38,80,000	97,16,000
6	31.03.2021	2 X 900 KVA DG Set with AMF panel	1	1,14,82,240	80,37,568
7	31.03.2021	Distributed Control System, Siemens PCS7	1	1,07,50,000	75,25,000
AMOUNT				15,80,15,745	11,06,11,021

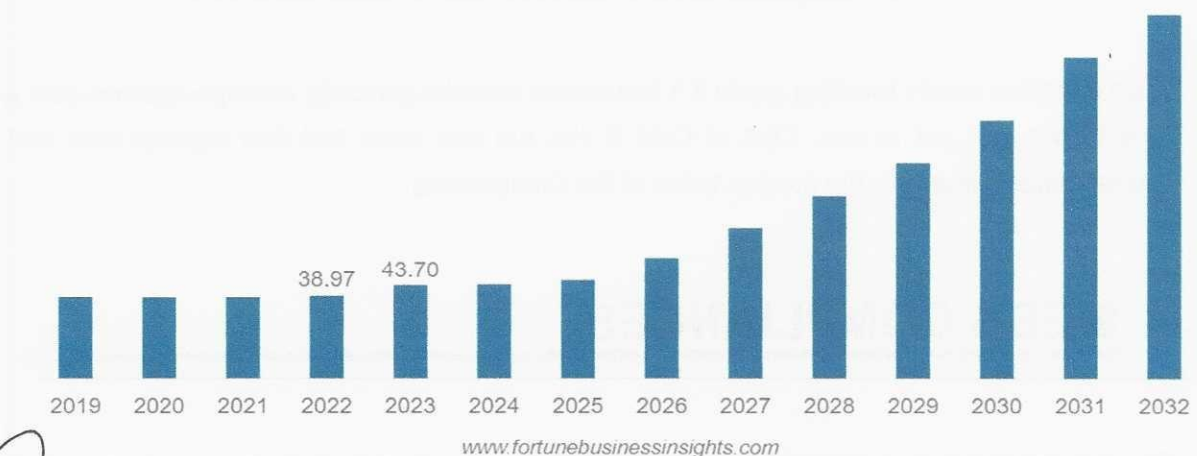
1. Executive Summary

Aegis Vopak Terminals Ltd., a joint venture between [Aegis Logistics Limited India](#) and [Royal Vopak](#) of the Netherlands, operates 20 tank terminals across 6 key Indian ports like Haldia, Kandla, Pipavav, JNPT(upcoming), Mangalore, and Kochi. With a robust storage capacity of **1.7 million cbm for Liquid storage**, and **201K MT for LPG** using cutting edge facility of Cryogenic (Refer) tanks at Mangalore, Pipavav, Kandla & Haldia. Before they embarked to use Refer (Cryo) tanks AVTL has also got large number of Spherical Tanks also know as Horton Sphers.

The Pipavav & Kandla gas terminal has four large Refer Tanks each of 24000 MT capacity fully operational. These tanks are used to store Propane & Butane at around -42°C & -4°C respectively. At this low temperature the gas transform into liquid facilitating cost effective storage of LPG, and faster turnaround while evacuation the material from vessel and discharging the same in bullet tanks. The faster turnaround equips the terminal to handle 85 times its installed capacity to leverage higher revenue and lower fixed cost.

Propane mixed with butane transforms as LPG is a vital fuel primarily used in **domestic cooking and industrial heating**, Its use as Auto fuel is also growing driving its consumption. The India propane market was **16.90 million tons in 2024** and is projected to reach 22.00 million tons by 2033, with a 2.70% growth rate. India's LPG consumption is rising, with a substantial increase in domestic customers due to government initiatives promoting clean cooking. In FY2023-24, domestic consumption reached approximately 180.6 Crore Cylinder.

Asia Pacific Propane Market Size, 2019-2032 (USD Billion)



The global propane market size was valued at USD 98.50 billion in 2023. The market is projected to be worth USD 109.77 billion in 2024 and reach USD 278.60 billion by 2032, exhibiting a CAGR of 12.3% during the forecast period.

2 Background of Engagement

Axis Trustee Limited has vide mail dated 01.12.2025 has appointed us to carry out the valuation of Aegis Vopak Terminal Limited (AVTL) at their Pipavav & Kandla Terminals to evaluate the value of equipment used at said Terminal for assessing its value for Security Purpose for a proposed IPO.

For the Purpose we were shared the FAR (Fixed Asset Register) by the Company comprising of Tanks, Marine Loading Arms (MLA) for Unloading from Vessels, Truck & Railways wagon loading facility, Pipe line to jetty and internal units & Utility Equipment such as Compressor, Generators, & related accessories used at the said gas terminal for evacuation and delivery to base the evaluation of the inventory which has been put to use since 2021. At the time of our visit, we could witness loading of trucks at two gantries which had 8 bays each duly covered. We also inspected two jetties from where the Propane and Butane are unloaded from vessels and stored in the two Cryogenic (Refer) Tanks duly commissioned and operational at the Terminals. On the day of our visit no ships were unloading.

3 Purpose of Valuation

Axis trustee acting as Debenture Trustee had engaged us to value the assets installed and being functional to discharge the following obligation

The **Debenture Trustee** has a role in safeguarding the interests of NCD holders under SEBI regulations. Appointed by the issuer, the trustee ensure compliance, monitor asset security, and intervene in case of default with following objectives

- Acts on behalf of debenture holders to ensure their rights are upheld.
- Monitors issuer's compliance with terms of the debenture trust deed and SEBI regulations.
- Verifies that the assets backing **secured NCDs/ IPO** are properly charged and registered.
- Ensures the issuer maintains adequate asset cover throughout the tenure of the debentures.
- Reviews offer documents, credit ratings, and financials.
- Confirms that the issuer is not in default and meets SEBI's eligibility criteria.



- Monitors timely payment of interest and principal.
- Tracks financial covenants, asset cover ratios, and credit rating changes.
- Reports any breach or adverse developments to SEBI and investors.
- Facilitates grievance redressal and communicates material events to debenture holders.
- May convene meetings of debenture holders if required.
- Initiates recovery proceedings or enforcement of security if the issuer defaults.
- Can approach courts or tribunals to protect investor interests.

4 About Company and Assets

Aegis Vopak Terminals is India's largest third-party tank storage operator for LPG and liquid products, with plans to expand LPG capacity to 200,800 tonnes by FY26.

Aegis Group

The promoters of the company are Aegis Logistics Limited with its allied venture Huron Holdings

Limited, Trans Asia Petroleum INC, Asia Infrastructure Investment Limited, Vopak India B.V., and Koninklijke Vopak N.V. Sudhir O Malhotra, Chief Executive Officer, Aegis Logistics Ltd. Other promoters of the company include Huron Holdings Limited, Trans Asia Petroleum INC, Asia Infrastructure Investment Limited, and Vopak India B.V.

The revenue stands at ₹1,719.41 crore, reflecting a quarter-on-quarter *(QoQ) increase of 0.84 per cent from ₹1,705.04 crore.

At Pipavav P1 campus which was acquired from Shell in 2010 with 2 Spherical Tanks each of 13500 MT. On the date of our visit we observed another 10 Spheres of varying capacity operational in the Terminal. AVTL in 2023 have installed 2 Nos of Spherical tank S-18 & S-19 of 1850 T each with designed pressure of 22.5 Kg/Cm² almost 20 times more tanks constructed to hold Propane. These tanks are made of 60mm platers and are design to hold Propylene at -47^o C as against -41^o C for Propane. The plate thickness of spherical tank at P1 to hold propane is between 27 to 30 MM. The equipment is erected / stalled following all strictures stipulated for handling such hazardous material with all necessary compliances. The huge Cryogenic (refer) tanks used for storage of gases in subzero temperature at AVTL terminals are stored in near atmospheric pressure unlike its storage in Bullet Spherical tank where much lesser volume is stored at high pressure involving higher cost of storage

and risk of leakage. The low temperature storage allows over 40,000 MT of Propane / Butane in one tanks against 1200 MT in Mounded Tanks. The high storage and normal pressure involve state of art Infrastructure at the terminal, facilitating easier ESG (Environment Social & Governance) compliances and sustainability of Business which now uses Cryogenic Tanks for LPG Storage.

AVTL has several key projects underway. These include expanding its cryogenic LPG terminal capacity in various terminals operated by them. Acquiring a new terminals to enhance its capacity to 2,00,000 MT soon. AVTL is also developing a large LPG import terminal at JNPA in Navi Mumbai with a storage capacity between 82,000 and 100,000 metric tonnes.

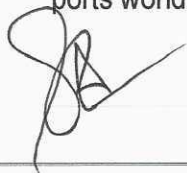
Aegis Major Cryogenic Terminals for Propane & Butane in India

1. Mumbai Gas Terminal (Maharashtra)
 - Operator: Aegis Group
 - Capacity: 2 × 10,500 MT cryogenic tanks
2. Haldia Terminal (West Bengal)
 - Operator: Aegis Logistics Ltd.
 - Capacity: 2 × 12,500 MT cryogenic tanks
3. Mangalore Terminal (Karnataka)
 - Operator: Aegis Vopak Terminal Ltd
 - Capacity: 2 x 41000 MT Cryogenic Tanks.

Aegis after successfully operating 3 terminals at Mumbai, Haldia have ventured to start the largest terminal at Mangalore. The plant has been started in collaboration of a reputed player in the field Royal Vopak of Netherland.

Vopak Netherland

Royal Vopak has over 400 years of experience in global tank storage, operating more than 70 terminals across 21 countries. It is a leading independent infrastructure provider for storing essential liquids and gases, including chemicals, oil, LNG, LPG, and biofuels. It is the largest independent tank storage provider globally headquartered in Rotterdam. It operates a global network of terminals that store and handle bulk liquids — including oil, chemicals, gases, LNG, biofuels, and emerging energy carriers like hydrogen and ammonia. Its operations focus on safe, reliable, and sustainable infrastructure at major ports worldwide. It has joined hands with Aegis on Pan India Basis.



5 PROJECT

AVTL has several key projects underway. These include expanding its cryogenic LPG terminal capacity in Mangalore, Pipavav, Haldia, Mumbai & Kandla by constructing a new terminal with 200,000 MT capacity in by end of 2028. This aims to partly funded by their IPO and through its own resources. AVTL is also developing a large LPG import terminal at JNPA in Navi Mumbai with a storage capacity between 82,000 and 100,000 metric tonnes, capable of handling a full Very Large Gas Carrier (VLGC). The JNPA project has a strategic location for serving key demand areas and an approved capital expenditure of ₹1,675 crore.

Dedicated to facilitating India's transition to more sustainable energies, AVTL adheres to the highest standards in health, safety, and environmental practices, ensuring our operations consistently provide the most efficient and reliable storage and logistics solutions.

6 Products & Storage

Incorporated in 2013, Aegis Vopak Terminals owns and operates storage terminals for liquefied petroleum gas (LPG) and various liquid products. Aegis Vopak Terminals Ltd. (AVTL), a joint venture between Aegis Logistics Limited and Royal Vopak..

Propane & Butane Gas:

In India, the storage of propane and butane gases is strictly regulated under the Gas Cylinder Rules 2016 and safety standards issued by the Petroleum and Natural Gas Regulatory Board (PNGRB) and Petroleum & Explosives Safety Organisation (PESO). These rules govern the design, installation, operation, and safety of storage facilities. At Refer Tanks as the storing of large volumes happens in a safe environment several compliance mandatory in Bullet / Mounded Tank installation is not crucial at Mangalore Terminal site.

Key Regulatory Framework

- Gas Cylinder Rules 2016 (PESO): Governs the manufacture, testing, and storage of compressed gases including propane and butane. It mandates licensing, approved cylinder types, and periodic inspections.



- PNRB Safety Standards: Covers LPG (which includes propane and butane) storage, handling, and bottling facilities. It defines vessel types (bullets, spheres), area classification, fireproofing, earthing, and bonding requirements.

- SMPV(U) Rules 2016: Applies to storage of gases in pressure vessels exceeding 1000 liters. It includes design pressure, filling ratio, and fire safety protocols.

Storing propane and butane in cryogenic tanks offers superior safety, efficiency, and purity compared to conventional pressurized vessels, especially for large-scale industrial applications.

Key Advantages in Cryogenic Storage of Propane & Butane

1. Enhanced Safety
2. Higher Storage Efficiency
3. Improved Purity
4. Longer Shelf Life
5. Versatile Infrastructure
6. Global Logistics Compatibility

7 Funding Arrangement:

Aegis Vopak Terminals Ltd is funding its cryogenic LPG terminal in Mangalore primarily through proceeds from its ₹2,800 crore IPO launched in May 2025. ₹671.3 crore of the IPO funds are allocated specifically for this acquisition.

💰 Funding Breakdown for Mangalore Terminal

- Total Capex for Mangalore Terminal: ₹968 crore
- Funding Source: Initial Public Offering (IPO) of Aegis Vopak Terminals Ltd
- IPO Size: ₹2,800 crore (fresh issue of 11.91 crore equity shares)
- Allocation to Mangalore Terminal: ₹671.3 crore



8 Valuation Methodology

For Assets having substantial high balance life almost full life of over 50 yrs is estimated using Cost Approach especially where no recent sales transactions for similar properties—especially for specialized assets like gas terminal is reported. At such facilities where the cost of Refer tanks and its accessories are over 70% of the total value of P & M and are fairly new for Valuation we have considered the capitalization cost of the assets to base of valuation evaluation. These assets are part of new technology and do not have parallel for analogy and data of income the income approach at this stage is not the right option.

For assets rarely traded / sold such as the huge Tanks which are specifically designed for the project are not typically traded in the open market, such as entire plant, capitalised value stated in FAR provides a rational estimate of value for security purpose.

When the asset's value is primarily in its utility and the economic value lies in the asset's ability to provide service of desired quality and quantity rather than its resale potential, DCRC approach is another way to evaluate the value.

The Valuation of specified Gas Storage Tanks is carried out by using capitalised value suitably depreciated for the since its construction & now in operation. We have used cost method a subset of cost approach of valuation. In this case as asset have substantially higher life and is not even a year old in operation, low depreciation is considered on the capitalised value to arrive at net value of the assets which is further factoring for selling cost to arrive at Market Value. Though the asset has been in use for less than a quarter however the Refer Tanks and other installation may have been ready to use much before June 25.

Accounting Standards Say:

- **IND AS 16:** "Depreciation of an asset begins when it is available for use, i.e., when it is in the location and condition necessary for it to be capable of operating in the manner intended by management."
- **IFRS:** Same principle — depreciation starts when the asset is ready, not when it's first used.

Such sensitive assets handling grade 2.1 hazardous material generally undergo rigorous cold and hot runs before it is put to use. Cost of Cold & Hot run and other trial and logistics cost add up to Capitalization value over the Invoice Value of the Components.



9 ESG COMPLIANCES

Group is mindful of its responsibilities on ESG compliances. Sustainability is about meeting the needs of the present without compromising the ability of future generations to meet their own needs. Vopak is working to help future generations meet their needs and contribute to a more sustainable economy by developing infrastructure that will support the introduction of essential products for the future.

Gas terminals in India must comply with ESG standards across environmental, social, and governance dimensions, primarily guided by SEBI's Business Responsibility and Sustainability Reporting (BRSR) framework and sector-specific safety and environmental laws.

Environmental Compliance

- **Emission Control:** Terminals must monitor and reduce greenhouse gas emissions, including methane and VOCs from storage and transfer operations.

Propane and butane are cleaner-burning fossil fuels compared to coal and gasoline, but they still contribute to greenhouse gas emissions and pose environmental risks through leaks, spills, and extraction processes.

With low temperature and low pressure, the terminal is fairly safe of any leakage generation of any greenhouse gas emission.

- **Waste Management:** Safe disposal of hazardous waste, oil sludge, and wastewater is mandatory under CPCB and MoEFCC norms.

During visit we did not find much of waste getting generated. The Terminal campus was reasonably clean. We have asked the Company to give us the details of steps taken in handling of waste and effort to minimise its generation.

- **Environmental Impact Assessment (EIA):** Required for new terminals under the EIA Notification, 2006, including public hearings and mitigation plans.

Have requested to share details of any public grievance and the mitigation proposed.

Social Compliance

- **Worker Safety:** Adherence to OISD (Oil Industry Safety Directorate) standards for fire protection, emergency response, and PPE usage.

While visiting the Terminal the terminal under their policy provided the Safety gears to comply with worker safety requirements. All people working in the terminal were wearing safety gears,



- **Community Engagement:** CSR initiatives under the Companies Act, 2013, including local employment, health, and education programs.

Have request to submit the report to be added with the report.

Aegis & Vopak excel in managing ESG risks, achieving strong MSCI ESG Ratings.



10 Sustainability Endeavour

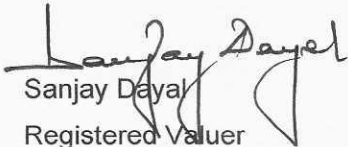
AVTL is dedicated to facilitating India's shift to more sustainable energy sources.

- **Enabling the Energy Transition** A key part of this is the handling of LPG, a cleaner alternative to traditional biomass and kerosene fuels, and planning infrastructure for future energy products like green hydrogen and sustainable fuels. This aids PM Swatch Bharat Abhiyan
- **Safety and Risk Management:** The company prioritizes safety with robust protocols including spill contingency plans, tank overfill protection, advanced firefighting systems, and comprehensive risk management and emergency preparedness systems. This commitment has contributed to strong ESG ratings from MSCI.
- **Environmental Impact Minimization:** Initiatives to reduce the company's environmental footprint include using clean fuels, green energy, energy-efficient LED lighting, rainwater harvesting, and waste handling and treatment systems.
- **Infrastructure for Sustainable Products:** AVTL is developing "future-ready" infrastructure to support the storage of new, more sustainable products and potentially repurpose existing assets

for green energy ecosystems, aligning with national goals like the National Green Hydrogen Mission.

- AVTL has an '**A**' rating by **MSCI** for its ESG performance, indicating a solid management of ESG risks.
- The company is certified with **ISO 14001:2015** (Environmental Management System) and **ISO 45001:2018** (Occupational Health and Safety Management System), demonstrating adherence to international standards.

Regards


Sanjay Dayal
Registered Valuer
IBBI/RV/02/2018/10502

SUMMARY OF VALUE of TERMINAL ASSETS

Value of P & M Assets of Pipavav & Kandla Gas Terminal				
S.No	Description	Capitalised / Reinstanment Value in INR	Depreciated Value in INR	
		Fig is in LAC	Fig is in LAC	REMARKS
1	Pipavav Refer Tanks & Accessories	65,799	63,750	Only P & M Assets
2	Pipavav Sphare Tank & Accessories	33,418	26,477	Horton Spheres for High Pressure
3	S 18 & S 19 Tanks and Accessories	5,955	5,757	Horton Spheres for High Pressure
4	Pipavav Bottling Plant	1,100	1,041	For Distribution
5	Kandla Refer Tanks & Accessories & Botling	45,022	38,941	Refer Tank & Bottling Plant
6	Kandla Capitalised Inventory	1,580	1,106	Capital Spares of the Machines
		1,52,874	1,37,071	

