

To

Additional Principal Chief Conservator of Forests(C),
Ministry of Environment, Forests and Climate Change,
Integrated Regional Office - Chennai,
1st Floor, Additional Office Block,
Shastri Bhavan, Haddows Road,
Nungambakkam, Chennai-600006.

Dear Sir,

Sub: - Compliance Status of the conditions stipulated in the Environmental Clearance

(Period - October 2024 to March 2025)

Ref: - 1. EC Identification No. EC22A021TN168846

2. File No. J-11011/156/2008-IA-II(I) dated 06-10-2022

Manali Petrochemicals Limited – Plant – II – PG expansion EC Compliance Report

Compliance Statement of EC conditions		
A.	Specific Conditions	Compliance Status
(i)	The PP shall install a minimum of 3 (three) online Ambient Air Quality Monitoring Stations with 1 (one) in upwind and 2 (two) in downwind direction based on long term climatological data about wind direction such that an angle of 120° is made between the monitoring locations to monitor critical parameters, relevant for Industry operations, of air pollution viz. PM ₁₀ , PM _{2.5} , NO ₂ , CO and SO ₂ etc. as per the methodology mentioned in NAAQS Notification No. B-29016/20/90/PCI/I, dated 18.11.2009 covering the aspects of process emission, transportation, use of DG Set and use of any machinery in the impact zone. The ambient air quality shall also be monitored at prominent places as per the site condition to ascertain the exposure characteristics at specific places. The above data shall be digitally displayed within 03 months in front of the main Gate of the Industry.	Complied. As per the requirements, based on long term climatological data about wind direction, the installation and commissioning of the 3 (three) Ambient Air Quality (AAQ) Monitoring Stations viz. 1 (one) in upwind and 2 (two) in downwind directions were successfully completed during Dec-2024. Photos of AAQMS installed within the premises is enclosed as ANNEXURE -1 . AAQ monitoring also has been carried out by MPL In-house laboratory at prominent places within the site as per the site condition so as to ascertain the exposure characteristics at specific places The above data will be digitally displayed within 03 months in front of the main gate of the industry after establishing connectivity with PCB server. In the existing unit, District Environment Laboratory (DEL)-Manali of TNPCB is carrying out the AAQ survey every year and the same will be continued after expansion. Copy of the ROA for AAQ survey carried out during the year 2024-25 by DEL-Manali, TNPCB and the same enclosed as ANNEXURE - 2
(ii)	The PP shall ensure that effective fugitive emission control measures should be imposed in the process, transportation, packing etc. and wherever possible, the transportation of materials is through rail/conveyor belt.	Being complied. The following effective fugitive emission control measures are already available in the existing unit and the same will be followed after expansion. <ul style="list-style-type: none"> • Provision of double mechanical seals in all the hydrocarbon pumps. • All the raw material and product tanks are under Nitrogen blanketing. • Purge gas from the process is used in boiler as fuel and not flared.

		<ul style="list-style-type: none"> • Continuous TVOC emission detectors are provided in appropriate locations to monitor and control fugitive emission and online connected to TNPCB- CAC. • In the existing unit, District Environment Laboratory (DEL)-Manali of TNPCB is carrying out the TVOC survey every year and the same will be continued after expansion. • Existing Plant is operated through DCS and the same will be continued after expansion. • Emission control measures will be ensured in the expansion facility also.
(iii)	Effective safeguard measures for prevention of dust generation and subsequent suppression (like regular water sprinkling, metalled road construction etc.) shall be carried out in areas prone to air pollution wherein high levels of PM10 and PM2.5 are evident. such as road, loading, unloading and transfer points. The fugitive dust emissions from all sources shall be regularly controlled by installation of required equipment's/ machineries and preventive maintenance. It shall be ensured that air pollution level conform to the standards prescribed by the MoEF&CC/Central Pollution Control Board.	<p>Being complied</p> <p>Regular water sprinkling is being carried out at roads, loading, unloading and transfer points as an effective safeguard measure in the existing unit and the same will be continued after expansion also.</p> <p>AAQMS & Continuous TVOC emission detectors are provided in appropriate locations to monitor and control fugitive emission and online connected to TNPCB- CAC. In the existing unit, District Environment Laboratory (DEL)-Manali of TNPCB is carrying out the AAQ & TVOC survey every year and the same will be continued after expansion.</p>
(iv)	The PP shall explore the possibility of use of best available technology for the plant if any and submit a report every year to IRO, MoEF&CC. In case of availability of such technology the PP shall take necessary steps for the implementation of the same including amending the EC.	<p>Being complied.</p> <ul style="list-style-type: none"> • The technology selected for the expansion is the best available. • In existing plant, the plant operates via a Distributed Digital Control System (DCS), ensuring centralized monitoring and control of all processes. • The facility has achieved full automation, streamlined operations and enhanced efficiency. • Safety interlocks function through a Programmable Logic Controller (PLC), automatically initiating shutdowns when critical parameters are exceeded • Energy consumption is minimized by implementing pinch technology and utilizing the latest energy-efficient drives. • The above same also will be continued after expansion plant.
(v)	The PP shall carry out assessment of the carrying capacity of transportation load on roads inside the industrial premises every year and based on the assessment report take necessary measures including widening of the roads.	<p>Being complied.</p> <p>Sufficient road space is available within the site for the existing and expansion units. The width of Existing Road is 6 m which is adequate for transportation of loads for the existing and as well as the expansion requirements. However, as stipulated in the condition, the assessment of the carrying</p>

G.R. [Signature]



		capacity of transportation load on roads within the industrial premises will be carried out every year. Based on the assessment report, necessary measures will be taken, including widening of the roads if any.
(vi)	The PP shall prepare a detailed rainwater harvesting plan within a period of 6 months so that unit may become water positive. The study report shall be submitted to IRO, MoEF&CC and submit the quantity of rainwater harvested to before IRO, MoEF&CC before 1st July of every year for the rainwater harvested during the previous year.	<p>Being Complied.</p> <p>Rainwater harvesting has already been carried out at Drumming plant. Roof top rainwater harvesting provision is being carried out at the following places viz.</p> <ol style="list-style-type: none"> 1) Main substation building, 2) Quick lime storage shed, 3) Chlorine Tonner shed, 4) Raw material storage shed. <p>Copy of photos related to rainwater harvesting system implementation is enclosed as ANNEXURE - 3.</p> <p>A study report will be submitted to the IRO, MoEF&CC before 1st July of every year with the details of quantity of rainwater harvested during the previous year.</p>
(vii)	The PP shall ensure that dumping of waste, if any, is strictly as per designated locations approved by SPCBs/PCCs.	<p>Being complied</p> <p>The municipal wastes generated is presently being disposed to corporation recycle yards and the same will be continued after expansion.</p> <p>The hazardous wastes generated viz. Spent Oil and ETP sludge are being disposed to TNPCB authorized recyclers and TSDF facility operated by TNWML, Gummidipoondi respectively in the existing unit and the same will be followed after expansion. There is no additional ETP sludge generation from the expansion unit.</p> <p>The Spent Oil quantity which will be generated from the expansion and which is being generated in the existing units, will be disposed to TNPCB authorised recyclers. The combined quantity is within the TNPCB approved quantity, as per the HWA issued under Hazardous and Other Wastes (Management & Transboundary Movement) Rules, 2016 vide HW Authorization No. 22HFC28359666 valid up to 31.03.2026. The details of the HW generated from the existing unit, the proposed unit and the cumulative quantity after expansion is attached as ANNEXURE -4</p>
(viii)	The PP shall ensure regular auditing of the compliance of the EC conditions by a Third Party annually and the audited report needs to be submitted to IRO, MoEF&CC.	<p>Being Complied.</p> <p>The existing EC conditions are already audited by the Third Party Annually. Similarly, as per the condition, the annual audit for the compliance of the EC conditions will be carried out by a Third Party and the audited report will be submitted to IRO, MoEF&CC. (ro.moefcc.gov.in.) by e- mail.</p>

Handwritten signature



(ix)	The PP shall ensure the use of cleaner fuel R-LNG with a stack height of 30 m for controlling the particulate emissions within the statutory limit of 115 mg/Nm ³ for the proposed 30 TPH boiler and submit a report within a year to IRO, MoEF&CC before 1 st July of every year for the activities carried out during the previous year.	Agreed to Comply. The proposed boiler will be commissioned during June 2026 with R-LNG as fuel. From 1 st Feb 2025, the unit has started using R-LNG as fuel in the existing boilers by discontinuing the Fuel Oil usage.
(x)	The budget earmarked for the Corporate Environment Responsibility (CER) is ₹ 0.9375 Crores which will be spent on need-based approach in consultation with the District Collector of Thiruvallur District. The budget earmarked for CER shall be kept in separate account and should be audited annually. The PP should annually submit the audited statement along with proof of activities viz. photographs (before & after with geo-location date & time), details of activities carried out, amount spent etc. to the IRO, MoEF&CC before 1 st July of every year for the activities carried out during the previous year.	Being Complied. For the previous year, the detailed audited statement, along with supporting documents such as photographs (before and after, with geo-location, date, and time), details of activities carried out, amount spent, etc., are enclosed as Annexure-5
(xi)	The PP shall develop additional Greenbelt by planting 14215 number of trees considering 70% survival rate within a period of one year from the grant of EC. The saplings selected for the plantation should be of sufficient height, preferably 6-ft (about 2 m). In addition to this, the budget earmarked for the plantation shall be kept in separate account and should be audited annually. The PP should annually submit the audited statement along with proof of activities viz. photographs (before & after with geo-location date & time), details of the expert agency engaged, details of species planted, number of species planted, survival rate, density of plantation etc. to the Regional Office of MoEF&CC before 1 st July of every year for the activities carried out during the previous year.	Being Complied. The additional greenbelt development was completed by planting 14,215 trees over an area of 15 acres allotted by Thirunilai Panchayat, Cholavaram Union, Ponneri Taluk, during October 2023. For the previous year, the detailed audited statement, along with proof of activities such as photographs (before and after, with geo-location, date, and time), details of the expert agency engaged, species planted, number of trees planted, survival rate, plantation density, etc., is enclosed as Annexure-6 .
(xii)	A separate Environmental Management Cell (having qualified persons with Environmental Science/Environmental Engineering/specialization in the project area) equipped with full- fledged laboratory facilities shall be set up to carry out the Environmental Management and Monitoring functions. The PP shall engage Plant Head-Head EHS- Assistant Manager- safety and Environment, Executives. In addition to this one safety & health officer as per the qualification given in Factories Act 1948 shall be engaged within a month of grant of EC. The PP should annually submit the audited statement of amount spent towards the	Being Complied. A separate Environmental Management Cell (EMC) (having qualified persons with Environmental Science/Environmental Engineering/Specialization in the project area) equipped with full- fledged laboratory facilities are already in place to carry out the Environmental Management and Monitoring functions. In the EMC, Plant Head- Head EHS- Manager- Safety and Environment, Executives are engaged. In addition to this, one safety & health officer as per the qualification given in Factories Act 1948 is engaged. For the previous year, the detailed annual audited statement for the amount

Handwritten signature



	engagement of qualified persons in EMC along with details of person engaged to the Regional Office of MoEF&CC before 1st July of every year for the activities carried out during the previous year.	spent towards the engagement of qualified personnel in the Environmental Management Cell (EMC), along with details of the personnel engaged, is enclosed as Annexure-7.
(xiii)	The company shall comply with all the environmental protection measures and safeguards proposed in the documents submitted to the Ministry. All the recommendations made in the EIA/EMP in respect of environmental management, and risk mitigation measures relating to the project shall be implemented. The budget proposed under EMP is ₹1411 Lakh (Capital cost) and ₹677 Lakh (Recurring cost) shall be kept in separate account and should be audited annually. The PP should submit the annual audited statement along with proof of implementation of activities proposed under EMP duly supported by photographs (before & after with geo-location date & time) and other document as applicable to the Regional Office of MoEF&CC before 1 st July of every year for the activities carried out during the previous year.	Being Complied. The company have been complied with all the environmental protection measures and safeguards as proposed in the documents submitted to the Ministry. All the recommendations made in the EIA/EMP in respect of environmental management and risk mitigation measures relating to the project is being implemented. or the previous year, the details of the Environmental Management Plan (EMP) budget utilized for the expansion project, along with the detailed audited statement, are enclosed as Annexure-8
(xiv)	The total water requirement will be 3247 KLD for existing facility and additional requirement of 810 KLD for the proposed expansion will be met from Chennai Metropolitan Water Supply and Sewerage Board (CMWSSB). The PP should ensure that water supply should not be above the permissible limit as mentioned in the letter and fresh water shall be withdrawal only after obtaining valid agreement from Concerned Authority. The PP should submit the details of utilization to the Integrated Regional Office (IRO), MoEF&CC before 1 st July of every year for the activities carried out during the previous year.	Being Complied. The total water requirement will be 3247 KLD for existing facility and additional requirement of 810 KLD for the proposed expansion will be met from Chennai Metropolitan Water Supply and Sewerage Board (CMWSSB). The water supplied will not be above the permissible limit as mentioned in the letter and fresh water will be withdrawn only after obtaining valid agreement from Concerned Authority The details of utilization will be submitted to the Integrated Regional Office (IRO), MoEF&CC before 1 st July of every year for the activities carried out during the previous year.
(xv)	No banned chemicals shall be manufactured by the PP. No banned raw materials shall be used in the unit. The PP shall adhere to the notifications/guidelines of the Government in this regard.	Complied. No banned chemicals are being manufactured in the unit and will not be manufactured in the Expansion facility also. No banned raw materials are being used in the unit and will not be used in the Expansion facility also. The notifications/guidelines of the Government issued in this regard shall be adhered.
(xvi)	The PP shall utilize modern technologies for capturing of carbon emitted and shall also develop carbon sink/carbon sequestration resources capable of capturing more than emitted. The implementation report shall be submitted to the IRO, MoEF&CC in this regard.	Complied. R-LNG supplied from IOCL, Ennore Terminal is being used as fuel in boilers since Feb-2025. Flue gas analysis report conducted on 19.02.2025 by External accredited laboratory post R-LNG firing in boilers is attached as ANNEXURE -9.

CRS



(xvii)	The PP shall comply with the environment norms for Pharmaceuticals/Bulk Drugs Industry as notified by the Ministry of Environment, Forest and Climate Change, vide GSR 541(E), dated 06.08.2021 under the provisions of the Environment (Protection) Rules, 1986.	Being Complied. The environment norms for Pharmaceuticals/Bulk Drugs Industry as notified by the Ministry of Environment, Forest and Climate Change, vide GSR 541(E), dated 06.08.2021 under the provisions of the Environment (Protection) Rules, 1986 is being complied.
(xviii)	All necessary precautions shall be taken to avoid accidents and action plan shall be implemented for avoiding accidents. The PP shall implement the onsite/offsite emergency plan/mock drill etc. and mitigation measures as prescribed under the rules and guidelines issued in the Manufacture, Storage and Import of Hazardous Chemicals (MSIHC) Rules, 1989, as amended time to time, and the Chemical Accidents (Emergency Planning, Preparedness and Response) Rules, 1996.	Complied. We have prepared the Onsite & Offsite emergency plan as prescribed under the rules and guidelines issued in the MSIHC Rules, 1989 and the Chemical Accidents (Emergency Planning, Preparedness and Response) Rules, 1996. Copies of the Onsite and Offsite Emergency Plans have been submitted to the DISH office, and approval has been obtained. A copy of the approval letter received from DISH is enclosed as Annexure-10.
(xix)	The volatile organic compounds (VOCs)/Fugitive emissions shall be controlled at 99.97 % with effective chillers/modern technology. Regular monitoring of VOCs shall be carried out.	Being complied. The following effective fugitive emission control measures are already available in the existing unit and the same will be followed after expansion. <ul style="list-style-type: none"> • Provision of double mechanical seals in all the hydrocarbon pumps. • All the raw material and product tanks are under Nitrogen blanketing. • Purge gas from the process is used in boiler as fuel and not flared. • Continuous TVOC emission detectors are provided in appropriate locations to monitor and control fugitive emission and online connected to TNPCB- CAC. • In the existing unit, District Environment Laboratory (DEL)-Manali of TNPCB is carrying out the TVOC survey every year and the same will be continued after expansion. • Existing Plant is operated through DCS and the same will be continued after expansion. • Emission control measures will be ensured in the expansion facility also.
(xx)	The PP shall explore possibilities for recycling and reusing of treated water in the unit to reduce the freshwater demand and waste disposal.	Complied. Sewage Treatment Plant (STP) of capacity 20 KLD to treat the sewage generated had been installed. The treated water from the STP has been reused for green belt so as to reduce the freshwater demand and waste disposal. RO unit of capacity 400 KLD is installed to treat the cooling tower blow down, boiler blow down and the DM plant regeneration effluent. The RO permeate will be reused for industrial usage so as to reduce the

Handwritten signature



		freshwater demand and waste disposal. The RO rejects will be treated along with the process effluent in the existing Effluent treatment plant.
(xxi)	As already committed by the PP, Zero Liquid Discharge shall be ensured based on the outcome of study conducted by NEERI. Effluent of 2556 KLD will be treated through Effluent Treatment Plant and disposed to sea after meeting the prescribed standards.	Being Complied As directed by the Hon'ble NGT, we have awarded the study to CSIR-NEERI to ascertain the feasibility of implementing Zero Liquid Discharge (ZLD) in a phased manner. We are currently awaiting the interim report of field monitoring study carried at respective ETP . A copy of the progress summary/study status report is enclosed as Annexure-11 . As per the recent conversation with CSIR-NEERI, we expect the stagewise study reports from CSIR-NEERI starting from August 2025. On receipt of the Final report from CSIR-NEERI, the same will be evaluated and taken up for implementation in a period of 18 months . Based on the outcome of the study, the same will be complied with after technical evaluation of the NEERI study.
(xxii)	Continuous online (24x7) monitoring system for stack emissions shall be installed for measurement of flue gas discharge and the pollutants concentration, and the data to be transmitted to the CPCB and SPCB servers. For online continuous monitoring of effluent, the unit shall install web camera with night vision capability and flow meters in the channel/drain carrying effluent within the premises.	Partially complied. Continuous online (24 x 7) monitoring system is already in place for the Boiler stack & effluent and the data is being transmitted to the CPCB and SPCB servers. There is no additional stack for the expansion unit. Flow meters have been already installed in the effluent pipeline. A web camera with night vision capability will be installed within the premises.
(xxiii)	The storage of toxic/hazardous raw material shall be bare minimum with respect to quantity and inventory. Quantity and days of storage shall be submitted to the Regional Office of Ministry and SPCB along with the compliance report.	Being Complied. The storage of toxic/hazardous raw material will be bare minimum with respect to quantity and inventory. The details regarding Quantity and days of storage has been submitted to the Regional Office of Ministry and SPCB along with the compliance report.
(xxiv)	The occupational health center for surveillance of the worker's health shall be set up. The health data shall be used in deploying the duties of the workers. All workers & employees shall be provided with required safety kits/mask for personal protection.	Being Complied. The occupational health center for surveillance of the worker's health is already in place. All workers & employees are provided with required safety kits/mask for personal protection in the existing unit and the same will be continued for the expansion unit. The health data are being used in deploying the duties of the workers in the existing unit and the same will be continued for the expansion unit.
(xxv)	Training shall be imparted to all employees on safety and health aspects for handling chemicals. Safety and visual reality training shall be provided to employees. Action plan for mitigation measures shall be properly	Being Complied. Training is being imparted to all employees (including new employees) on safety and health aspects for handling chemicals. Safety and visual reality training is also provided to employees. Action plan for mitigation

G. R. S.



	implemented based on the safety and risk assessment studies.	measures is properly implemented based on the safety and risk assessment studies for the existing unit. The same will be made available in the Expansion facility also.
(xxvi)	The unit shall make the arrangement for the protection of possible fire hazards during manufacturing process in material handling. Fire-fighting system shall be as per the norms.	Complied. MPL has a well laid individual Fire Water pumping system with Jockey pumps, Main motor driven pumps and Diesel engine driven pumps. Fire hydrant header runs throughout the plant, covering the entire MPL plant with sufficient number of hydrants and monitors. MPL has its own 1 No. of Fire Tender having water, foam and DCP extinguishing facility. Arrangement for the protection of possible fire hazards during the manufacturing process in material handling is already in place. Fire-fighting system is kept as per the norms for the existing unit. The same will be implemented for the Expansion also.
(xxvii)	The solvent management shall be carried out as follows: (a) Reactor shall be connected to chilled brine condenser system. (b) Reactor and solvent handling pump shall have mechanical seals to prevent leakages. (c) Solvents shall be stored in a separate space specified with all safety measures. (d) Proper earthing shall be provided in all the electrical equipment wherever solvent handling is done. (e) Entire plant shall be flame proof. The solvent storage tanks shall be provided with breather valve to prevent losses. (f) All the solvent storage tanks shall be connected with vent condensers with chilled brine circulation.	Complied. As per the stipulated condition, appropriate solvent management system is already available in existing plant operation itself.
(xxviii)	The storm water from the roof top shall be channelized through pipes to the storage tank constructed for harvesting of rainwater in the premises and harvested water shall be used for various industrial processes in the unit. No recharge shall be permitted within the premises. Process effluent/ any wastewater shall not be allowed to mix with storm water.	Complied. Roof top rainwater harvesting provision is being carried out at the following places viz. 1) Main substation building, 2) Quick lime storage shed, 3) Chlorine Tonner shed, 4) Raw material storage shed. Copy of photos related to rainwater harvesting system implementation is enclosed as ANNEXURE - 3
(xxix)	The PP shall undertake waste minimization measures as below (a) Metering and control of quantities of active ingredients to minimize waste; (b) Reuse of by-products from the process as raw materials or as raw material substitutes in other processes. (c) Use of automated filling to minimize spillage.	Complied. As per the stipulated condition, appropriate Waste minimization measures are already available in existing plant operation itself The company a undertake following Waste Minimization measures:

G.R. Srinivas



	(d) Use of Close Feed system into batch reactors. (e) Venting equipment through vapor recovery system. (f) Use of high pressure-hoses for equipment cleaning to reduce wastewater generation.	<ul style="list-style-type: none"> • Mass flow meters will be installed to measure the quantity of active ingredients. • Re-use of by products as raw material substitutes in other processes will be done. • Use of automated filling machine will be ensured to minimize spillage. • Use of "Closed Feed" system into batch reactors and venting equipment through vapour recovery system. <p>Use of high pressure-hoses for equipment cleaning will be ensured to reduce wastewater generation.</p>
(xxx)	The raw material Propylene and the proposed boiler fuel R-LNG shall be transferred through pipeline from CPCL refinery and IOCL LNG terminal, Ennore respectively. Further, the PP shall explore the transportation of all other materials by rail/conveyor belt, wherever feasible and submit a report to IRO, MoEF&CC within 6 months.	<p>Being Complied.</p> <p>The raw material Propylene is being transferred through pipeline from CPCL refinery in the existing unit. The boiler fuel R-LNG is being transferred through pipeline from IOCL LNG terminal, Ennore. Further exploration will be made to check the feasibility of transfer of all other materials by rail/conveyor belt and a report will be submitted to IRO, MoEF&CC within 6 months.</p>
(xxxii)	In addition to the 40% green belt, the PP shall develop greenbelt outside the project premises such as avenue plantation, plantation in vacant areas, social forestry, etc. for the benefit of local environment and people.	<p>Complied.</p> <p>In addition to the 40% green belt, green belt has been developed outside the project premises in the form of avenue plantation for the benefit of local environment and people via Manali industries Association & GCC, Manali.</p>
(xxxiii)	The sewage shall be treated in the proposed STP and the treated water shall be reused for the green belt.	<p>Complied.</p> <p>The STP of capacity 20 KLD is commissioned and under the operations as to treat the generated sewage. The treated water is being reused for the green belt.</p>
B.	General Conditions	Compliance Status
(i)	No further expansion or modifications in the plant, other than mentioned in the EIA Notification, 2006 and its amendments, shall be carried out without prior approval of the Ministry of Environment, Forest and Climate Change/SEIAA, as applicable. In case of deviations or alterations in the project proposal from those submitted to this Ministry for clearance, a fresh reference shall be made to the Ministry/SEIAA, as applicable, to assess the adequacy of conditions imposed and to add additional environmental protection measures required, if any.	<p>Agreed to Comply.</p> <p>No further expansion or modification in the plant other than mentioned in the EIA will be carried out without prior approval from The Ministry of Environment, Forests and Climate Change/SEIAA as applicable.</p> <p>A fresh reference will be made by the unit to the Ministry/SEIAA to assess the adequacy of conditions imposed and to add additional environmental protection measures required in case of any deviations or alterations in the project proposal.</p>
(ii)	The Project proponent shall strictly comply with the rules and guidelines issued under the Manufacture, Storage and Import of	<p>Being Complied.</p> <p>We undertake to comply with the rules and guidelines issued under the Manufacture,</p>

G. R. S. S.



	Hazardous Chemicals (MSIHC) Rules, 1989, as amended time to time, the Chemical Accidents (Emergency Planning, Preparedness and Response) Rules, 1996, and Hazardous and Other Wastes (Management and Trans-Boundary Movement) Rules, 2016 and other rules notified under various Acts.	Storage and Import of Hazardous Chemicals (MSIHC) Rules, 1989, as amended time to time, the Chemical Accidents (Emergency Planning, Preparedness and Response) Rules, 1996, and Hazardous and Other Wastes (Management and Trans-Boundary Movement) Rules, 2016 and other rules notified under various Acts for the expansion unit.
(iii)	The energy source for lighting purpose shall be preferably LED based, or advanced having preference in energy conservation and environment betterment.	Complied. The lightings have already been converted to LED based in the existing unit. In the expansion facility also, the energy source for lighting purpose is LED based lightings, which will enable energy conservation and environment betterment. LED lightings are being installed for the expansion facility.
(iv)	The overall noise levels in and around the plant area shall be kept well within the standards by providing noise control measures including acoustic hoods, silencers, enclosures etc. on all sources of noise generation. The ambient noise levels shall conform to the standards prescribed under the Environment (Protection) Act, 1986 Rules, 1989 viz. 75 dBA (daytime) and 70 dBA (night time).	Being Complied. Noise levels in and around the plant area are within the prescribed standards of 75 dBA (daytime) and 70 dBA (night-time) in the existing unit. Ambient noise level is being monitored through TNPCB District Environment Laboratory (DEL) - Manali once in a year. Copy of the ROA for Ambient Noise level survey carried out by DEL, TNPCB during the year 2024-25 is attached as ANNEXURE - 12. In the expansion facility also, the overall noise levels in and around the plant area will be kept well within the standards by providing noise control measures including acoustic hoods, silencers, enclosures etc. on all sources of noise generation. Ambient Noise level survey will be carried out every month by internal lab and once in a year by District Environmental Laboratory, TNPCB. The ambient noise levels will conform to the standards prescribed under the Environment (Protection) Act, 1986 Rules, 1989 viz. 75 dBA (daytime) and 70 dBA (night-time).
(v)	The company shall undertake all relevant measures for improving the socio-economic conditions of the surrounding area. The activities shall be undertaken by involving local villages and administration. The company shall undertake eco-developmental measures including community welfare measures in the project area for the overall improvement of the environment.	Being Complied. The company has already taken up various measures to improve the socio-economic conditions of the surrounding area. The company will continue to undertake all relevant measures for improving the socio-economic conditions of the surrounding area and eco-developmental measures including community welfare measures in the project area through CER/CSR activities by involving local villages and administration. Photos of the CSR activities carried out during the FY 2024-25 attached as ANNEXURE - 13.
(vi)	The company shall earmark sufficient funds towards capital cost and recurring cost per	Being Complied.

G.R. Suresh



	annum to implement the conditions stipulated by the Ministry of Environment, Forest and Climate Change as well as the State Government along with the implementation schedule for all the conditions stipulated herein. The funds so earmarked for environment management/pollution control measures shall not be diverted for any other purpose.	The company has earmarked sufficient funds towards capital cost and recurring cost per annum to implement the conditions stipulated by the Ministry of Environment, Forest and Climate Change as well as the State Government along with the implementation schedule for all the conditions stipulated herein. The funds so earmarked for environment management/pollution control measures will not be diverted for any other purpose.
(vii)	A copy of the clearance letter shall be sent by the project proponent to concerned Panchayat, Zilla Parishad/Municipal Corporation, Urban local Body and the local NGO, if any, from whom suggestions/representations, if any, were received while processing the proposal.	Complied. The points of representation received by the MoEF&CC, New Delhi during processing of the proposal was shared to us vide mail dated 04-07-2022. The reply for respective points of representation with relevant justification were submitted by us to the Ministry on 07-07-2022. The points were evaluated during the 35 th Expert Appraisal Committee (EAC) meeting of Industry-3 sector held on 28-07-2022. In the Minutes of 35 th EAC meeting issued on 11-08-2022, it was mentioned that the relevant justification given by us for the respective points of representation were found to be satisfactory at Page No. 16, Environmental Clearance was granted by the MoEF&CC, New Delhi on 06-10-2022. The copy of clearance letter is available at the Website of the Ministry (https://parivesh.nic.in/)
(viii)	The project proponent shall also upload/submit six monthly reports on Parivesh Portal on the status of compliance of the stipulated Environmental Clearance conditions including results of monitored data to the respective Integrated Regional Office of MoEF&CC, the respective Zonal Office of CPCB and SPCB. A copy of Environmental Clearance and six-monthly compliance status report shall be posted on the website of the company.	Being Complied. We undertake to upload/ submit six monthly reports on Parivesh Portal on the status of compliance of the stipulated Environmental Clearance conditions including results of monitored data to the respective Integrated Regional Office of MoEF&CC, the respective Zonal Office of CPCB and SPCB. A copy of Environmental Clearance and six-monthly compliance status report posted on the website of the company and screenshot of web page is enclosed as ANNEXURE - 14
(ix)	The environmental statement for each financial year ending 31st March in Form-V as is mandated shall be submitted to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently, shall also be put on the website of the company along with the status of compliance of environmental clearance conditions and shall also be sent to the respective Integrated Regional Office of MoEF&CC by e-mail.	Being Complied. The environmental statement for each financial year ending 31st March in Form-V as is mandated has been submitted to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently for the existing unit. Copy of the same will be uploaded on the website of the company along with the status of compliance of environmental clearance conditions and

G.R.S.



		will also be sent to the respective Integrated Regional Office of MoEF&CC by e-mail.
(x)	The project proponent shall inform the public that the project has been accorded environmental clearance by the Ministry and copies of the clearance letter are available with the SPCB/Committee and may also be seen at Website of the Ministry and at https://parivesh.nic.in/ . This shall be advertised within seven days from the date of issue of the clearance letter, at least in two local newspapers that are widely circulated in the region of which one shall be in the vernacular language of the locality concerned and a copy of the same shall be forwarded to the concerned Regional Office of the Ministry.	Complied. The environmental clearance was granted by the MoEF&CC, New Delhi on 06-10-2022. We have informed about the grant of environmental clearance by the Ministry through advertisement in two local newspapers which are widely circulated in the region viz. The New Indian Express (in English) and The Hindu Tamil (in Tamil, vernacular language of the locality), both dated 08-10-2022, which is within seven days from the date of issue of the clearance letter and the same was submitted with previous compliance report. The details were forwarded to the Integrated Regional Office (IRO), Chennai vide letter dated 12-10-2022.
(xi)	The project authorities shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities and the date of start of the project.	Agreed to Comply. The Project was granted Consent to Establish by the TNPCB on 14.02.2023. The date of financial closure and final approval of the project and the date of start of the project will be informed to the Regional Office as well as the Ministry.
(xii)	This Environmental clearance is granted subject to final outcome of Hon'ble Supreme Court of India, Hon'ble High Court, Hon'ble NGT and any other Court of Law, if any, as may be applicable to this project.	Agreed to comply. Noted. We agree to comply with the same.

Hope, we have submitted the details required by you and if you require any further information we are ready to furnish the same.

Thanking you,
Yours faithfully,

For **MANALI PETROCHEMICALS LIMITED**



G.R. Sridhar
Wholetime Director (Head of Plant Operations)
occupier@manalipetro.com



Copy to:-

- 1) The Member secretary, 76, Mount Road, Guindy, Chennai – 600 032
- 2) The Joint Chief Environmental Engineer (M), Arumbakkam, Chennai – 600 106

Expansion Activity status report - MPL - Plant - II as on Mar -2025

Propylene Glycol plant

1. Consent To Establish obtained from TNPCB on 14.02.2023.
2. 100% of Detailed Engineering activities completed.
3. Civil construction works 90% completed.
4. Equipment erection works under progress.
5. Pipeline prefabrication and erection under progress.
6. Electrical and Instrumentation items procurement and receipt under progress.



C. R. S. S.

New - Ambient Air Quality Monitoring Station- 3 Nos.

ANNEXURE 1





TAMILNADU POLLUTION CONTROL BOARD
District Environmental Laboratory, Manali
AMBIENT AIR QUALITY SURVEY – Report of Analysis

Report No. 44/AAQS/2024-25

Date: 07.10.2024

1. Name of the Industry : **M/s. MPL – II,**
2. Address of the Industry : **Manali, Chennai - 68**
3. Date of Survey : **26.09.2024**
4. Duration of Survey : **8 Hours / 24 hours**
5. Category : **Red / Orange / Green – Large / Medium / Small**
6. Land use classification : **Industrial / Commercial / Residential / Sensitive**

Meteorological Conditions

Ambient Temperature (°C)	Min	Max	Relative Humidity (%)	Min	Max
	28	33		68	88
Weather Condition	Partially Cloudy		Rain Fall (mm)	Nil	
Predominant Wind Direction	WSW – ENE		Mean Wind Speed (km/hr)	11.8	

Ambient Air Quality Survey Results

Sl. No.	Location	Direction *	Distance (m) *	Height Form GL (m)	Pollutants Concentration (microgram / m ³)				
					PM 2.5	PM 10	SO ₂	NO ₂	Cl ₂
1	On top of platform near Main gate	NE	100	2.0	36	90	16	26	0.16
2	On top of platform near Chlorine Shed	E	100	2.0	--	82	15	24	<0.1
3	On top of platform near RMG	SE	190	2.0	--	80	13	21	<0.1
4	On top of platform near Fire water reservoir	SW	75	2.0	24	68	9	14	<0.1
5	On top of platform near Colling Tower	W	75	2.0	--	74	11	15	<0.1
6	On top of platform near old Mech. Maintenance room	NW	100	2.0	--	88	12	17	<0.1

Note: * With respect to major emission sources. The analytical results are restricted to the sampling period of 8 hrs/24hrs.


Deputy Chief Scientific Officer,
District Environmental Laboratory
Tamil Nadu Pollution Control Board
Manali

Test Performed	Test Method
PM10	IS 5182 : (Part 23) – 2006
SO ₂	Modified West – Gaeke / IS 5182 : (Part 2) – 2001 RA: 2012
NO ₂	Jacobs – Hochheiser / IS 5182 : (Part 6) – 2006 RA:2012



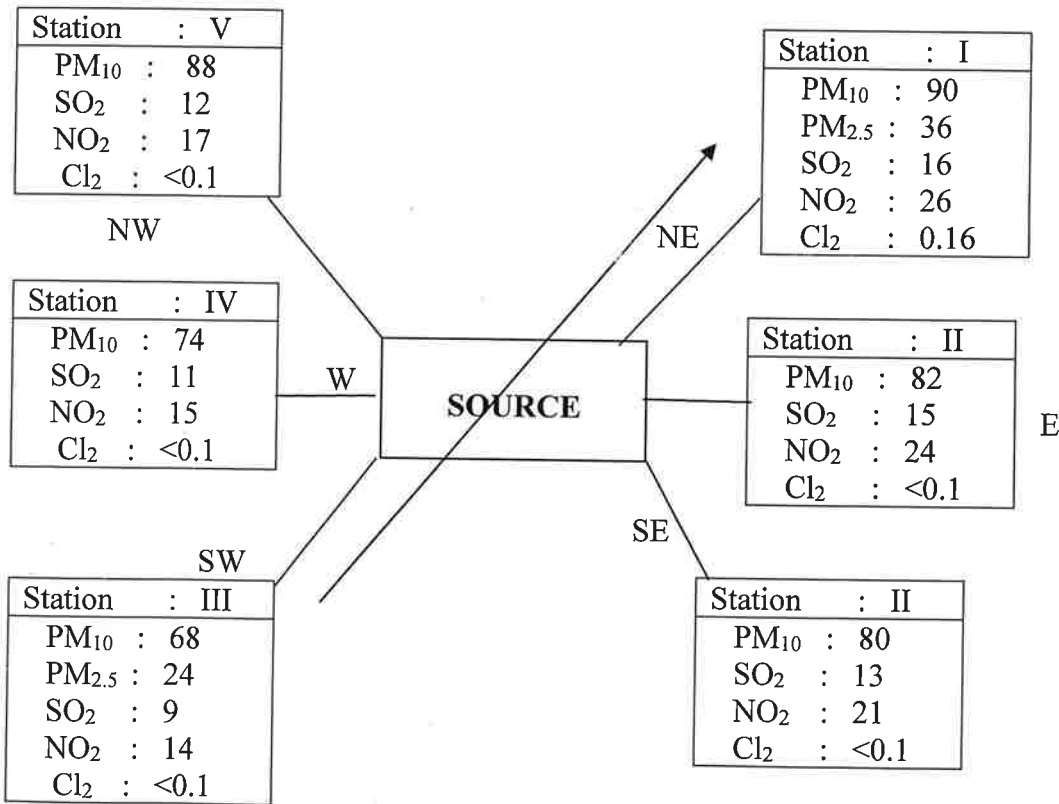
TAMILNADU POLLUTION CONTROL BOARD
District Environmental Laboratory, Manali

AMBIENT AIR QUALITY SURVEY
Schematic Diagram Showing Location of Sampling

Report No. 44 /AAQ/SM/2024-25

Name and Address of the Industry : **M/s. MPL - II,**
Manali, Chennai – 600 068.

Date of Survey : **26.09.2024**



Note: All the values are expressed in $\mu\text{g}/\text{m}^3$ and restricted to sampling period of 8 hrs/24hrs

Meteorological Conditions:	
Predominant Wind Direction	WSW – ENE
Wind Speed (Km/hr)	11.8
Weather Condition	Partially Cloudy
Rainfall	Nil


Deputy Chief Scientific Officer,
District Environmental Laboratory
Tamil Nadu Pollution Control Board
Manali

Rainwater harvesting photos

Type text here

Old & New Lime godown





Main substation



Chlorine shed



Type text here

ANNEXURE 4

Details of the HW generated from the Existing unit & After Expansion

S.No.	Details of Waste	Schedule as per HWM rules	Unit	Quantity					
				Existing	After Expansion	Approval	Characteristic	Mode of Storage	Mode of Disposal
1	Waste Lube Oil generated from Rotary Equipment - Spent Oil	5.1	KL/Annum	1.38	1.88	4.0	Oily	MS drums	Disposed through TNPCB authorized recyclers
2	ETP Secondary Clarifier Bottom Sludge	35.3	T/Annum	110	110	110	Solid	Concrete floored covered shed	Common TSDF Landfill Facility

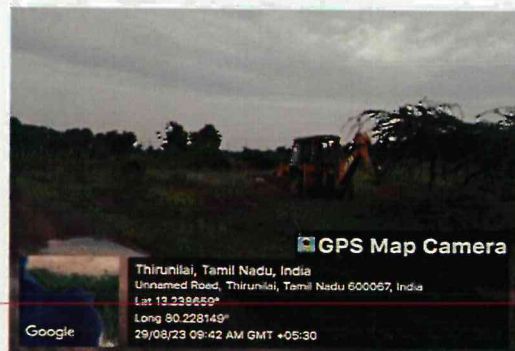
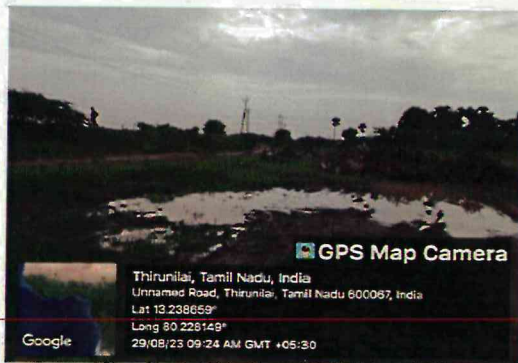
AUDITOR'S CERTIFICATE

This is to certify that, as per the books of accounts and the records produced before us, the following expenditures have been incurred towards the Corporate Environmental Responsibility (CER) activities as part of the Environment Clearance (EC) compliance for Expansion of Propylene Glycol plant by 50000 MTPA Manali Petrochemicals Limited, Plant-II.

(Values in Lakhs)

Financial Year	2022-23	2023-24	2024-25	Total Amount
Project				
Green Belt Development	Rs. 43.92	Rs. 38.25	Rs. 26.02	Rs.108.19

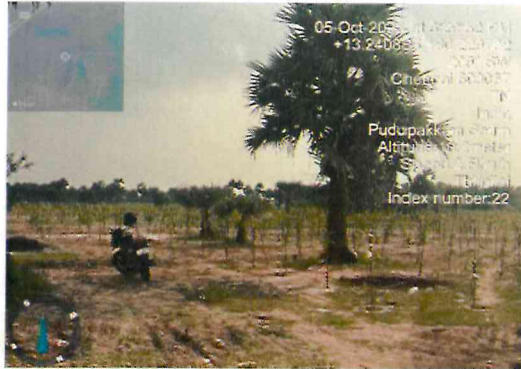
Photographs of Land allotted by for Green Belt Development Thirunilai Panchayat, Cholavaram Union, Ponneri Taluk (Taken BEFORE Green belt development)



Photographs taken AFTER Green belt development



✓



Green Belt Development - Present Status




✓



This certificate is issued at the request of the project proponent to be submitted to the Environmental Clearance authority in compliance with the stipulated conditions of the EC.

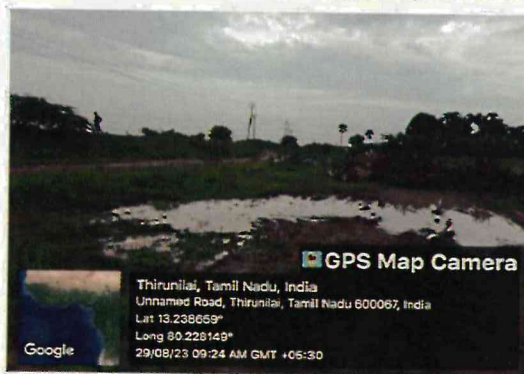



T.S SRINIVASAN
Chartered Accountant
M. No.: 019118
Place: Chennai
Date: 21-06-2025
UDIN: 25019118BMHZTH9905

AUDITOR'S CERTIFICATE

This is to certify that, as per the books of accounts and the records produced before us, the following expenditures have been incurred towards the Greenbelt Development (14215 Trees) as part of the Environment Clearance (EC) compliance for Expansion of Propylene Glycol plant by 50000 MTPA Manali Petrochemicals Limited, Plant-II.

Photographs of Land allotted by for Green Belt Development Thirunilai Panchayat, Cholavaram Union, Ponneri Taluk (Taken BEFORE Green belt development)



Photographs taken AFTER Green belt development



Green Belt Development - Present Status



Details of Expert Agency: RKS Engineers & Contractors,

Address: No. 54B Perumal Koil street, Puthupadu Nandambakkam, Chennai -600120

Details of species planted

S.no	Name of the Tree	Count
1	Pungam	3200
2	Illupai	600
3	Mahilam	600
4	Badam	1850
5	Neermaruthu	3200
6	Kadambu	250
7	Naaval	875
8	Mamaram	450
9	Vembu	600
10	Guava	550
11	Mangani	700
12	Vengai	420
13	Kadambu	420
14	Palm Tree	500
	Total	14215

Thirunilai - Greenbelt Development -Cost Details

S. No	Service Order No.	Bill NO.	Date	Manpower (Rs.)	Maintenance (Rs.)
1	6300034964	61	23-08-2023	1,33,104	
2	6300034966	60	23-08-2023		5,69,659
3	6300035637	85	24-10-2023	57,053	
4	6300035705	82	24-10-2023		4,93,657
5	6300035730	83	24-10-2023		1,64,165
6	6300035905	81	01-11-2023		30,45,108
7	6300035961	96	23-11-2023	80,240	17,706
8	6300036332	109	23-12-2023	33,925	
9	8100000118	110	23-12-2023	14,160	
10	6300036604	123	23-01-2024	33,984	
11	6300036993	136	22-02-2024	2,13,344	
12	6300037580	157	30-03-2024	1,91,337	
13	6300037836	03	23-04-2024	1,21,068	
14	6300037836	16	23-05-2024	1,68,150	
15	6300037836	20	24-06-2024	1,81,602	
16	6300037836	29	23-07-2024	1,68,150	
17	6300037836	39	23-08-2024	2,03,078	
18	6300037836	46	23-09-2024	2,16,294	
19	6300037836	52	23-10-2024	1,50,686	
20	6300037836	68	23-11-2024	1,44,432	
21	6300037836	72	23-12-2024	16,992	
22	6300037836	86	23-01-2025	16,284	
23	6300037836	99	24-02-2025	29,736	
24	6300037836	106	31-03-2025	1,17,764	
		Grand Total		22,91,383	42,90,295



T.S. SRINIVASAN B.Sc., F.C.A.,
A.C.S., A.C.M.A.,
CHARTERED ACCOUNTANT

Flat A-2, Ashirvad Apartments,
11, Raman Street, T.Nagar,
Chennai - 600017.

94440 39653

tss_1951@yahoo.co.in

Financial Year	Manpower	Maintenance	Total Amount (Rs.)
2023-24	7,57,147	42,90,295	50,47,442
2024-25	15,34,236	-	15,34,236
Total	22,91,383	42,90,295	65,81,678

This certificate is issued at the request of the project proponent to be submitted to the Environmental Clearance authority in compliance with the stipulated conditions of the EC.



T.S SRINIVASAN
Chartered Accountant
M. No.: 019118
Place: Chennai
Date: 21-05-2025
UDIN: 25019118BMHZRA8497

AUDITOR'S CERTIFICATE

This is to certify that, as per the books of accounts and the records produced before us, the following expenditures have been spent towards the engagement of qualified persons in EMC Expansion of Propylene Glycol plant by 50000 MTPA Manali Petrochemicals Limited, Plant-II

Particulars	Apr '22-Mar '23	Apr '23-Mar '24	Apr '24-Mar '25
Salaries and wages	54,02,095	68,54,106	94,60,308
OHC- Doctor fees	48,07,472	51,65,282	60,17,430
First Aid Centre	1,93,289	2,82,554	3,03,598
ETP Maintenance	89,17,295	93,68,910	1,02,43,320
Total Amount	1,93,20,151	2,16,70,852	2,60,24,656

This certificate is issued at the request of the project proponent to be submitted to the Environmental Clearance authority in compliance with the stipulated conditions of the EC.




T.S SRINIVASAN
Chartered Accountant
M. No.: 019118
Place: Chennai
Date: 21-05-2025
UDIN: 25019118BMHZQZ6457

AUDITOR'S CERTIFICATE

This is to certify that, as per the books of accounts and the records produced before us, the following expenditures have been incurred towards the implementation of Environment Management Plan (EMP) activities as part of the Environment Clearance (EC) compliance for Expansion of Propylene Glycol plant by 50000 MTPA Manali Petrochemicals Limited, Plant-II

S. No.	Category in EMP	Cost incurred (Rs. In lakhs)
1	Air Pollution Control	774.22
2	Water Pollution Control	235.81
3	Storm water and Rainwater harvesting management	45.53
	TOTAL	1055.56

This certificate is issued at the request of the project proponent to be submitted to the Environmental Clearance authority in compliance with the stipulated conditions of the EC.



Mr. T. S. SRINIVASAN

Chartered Accountant

M No: 019118

Date: 14-05-2025

Place: Chennai

UDIN: 25019118BMHZQM1037



GLens Innovation Labs Pvt Ltd.

Certified as per ISO 9001:2015 & ISO 45001:2018

TEST REPORT



Report No. : EN25020605

ULR No. : TC-858225000001253F

Name of the Client : Manali Petrochemicals Limited Plant-II
 Address of the Client : 1/6 Sathangadu Village,
 Manali, Chennai:600 068
 Sample Name : Stack Emission Sampling Date : 19-Feb-2025
 Sample Description : Stack Emission Received Date : 20-Feb-2025
 Sampling Location : 21 Ton Boiler stack Commenced On : 20-Feb-2025
 Sample Submission Type : Collected by Lab Representative Completed On : 01-Mar-2025
 Sample Condition : Fit for Analysis Report Date : 03-Mar-2025
 Sampling Plan and Method : GL/EN/SOP/111



Test Results

S. No.	Parameters	Units	Results Obtained	Test Method	Limit as per CPCB Standard
Discipline: Chemical					
Group: Atmospheric Pollution					
1	Carbon Dioxide as CO ₂	%	7.6	GL/EN/SOP/149 Issue no & Dt: 02/05.04	NA
2	Gaseous Discharge	Nm ³ /hr	25441.0	IS 11255 (Part 3)	NA
3	Oxygen as O ₂	%	6.5	GL/EN/SOP/149 Issue no & Dt: 02/05.04	NA
4	Stack Temperature	K	412	IS 11255 (Part 3)	NA
5	Velocity	m/sec	5.4	EPA method 1-3 (Title 40 – Protection of Environment)	NA
6	Carbon Monoxide as CO	mg/Nm ³	46.5	GL/EN/SOP/149 Issue no & Dt: 02/05.04	NA
7	Particulate Matter	mg/Nm ³	2.4	GL/EN/SOP/113 Issue no & Dt: 02/05.04	150
8	Oxides of Nitrogen as NO _x	mg/Nm ³	27.4	GL/EN/SOP/149 Issue no & Dt: 02/05.04	NA
9	Moisture Content	%	BLQ(LOQ : 1.0)	EPA Method 1-3 (Title 40 – Protection of Environment)	NA
10	Sulphur Dioxide as SO ₂	mg/Nm ³	BLQ(LOQ : 3.0)	EPA 6 (Title 40 – Protection of Environment)	NA

Note:- BLQ - Below the Limit of Quantification, LOQ - Limit of Quantification.

Remarks: The above Stack Complies as per CPCB norms with respect to the above tested parameters

End of Report

6.7.12
 Authorized By
E. PRITHIVIRAJAN
 LAB MANAGER

GLENS INNOVATION LABS Pvt Ltd, #6/1,1 St Floor, Sri Jothi Complex Murugesan Street, Balavinayagar Nagar, Arumbakkam Chennai 600106

Terms and Conditions:

- * The test results related only to the items tested.
- * The test report shall not be reproduced in full or part without the written approval of Glens.
- * The test items will not be retained for more than 15 days from the date of issue of test report except in the case as required by the applicable regulations.
- * The Laboratory's responsibility under this report is limited to proven wilful negligence and will in no case be more than the invoiced amount.
- * A Satisfactory test report in no way implies that the product tested is approved by NABL.
- * Laboratory is not responsible for the authenticity of the photocopied test reports.

**PROCEEDINGS OF THE DIRECTOR OF INDUSTRIAL SAFETY AND HEALTH (FAC)
CHENNAI**

PRESENT: Thiru. M. V. Senthilkumar, M.E.,

ABSTRACT

The Factories Act 1948 and the Tamil Nadu Factories Rules 1950 – The Tamil Nadu Control of Industrial Major Accident Hazards Rules 1994 - On Site Emergency Plan of **M/s. Manali PetroChemicals Limited, Plant-II, S.No.1/6, 1/8, 23, 24, 25, 26, 27, 28, 29, 30/3 & 31, Manali Industrial Area, Sathangadu Village, Manali, Thiruvottiyur Taluk, Thiruvallur District – 600 068. (TVR 3323)** – Recorded.

R.Dis H2/30626/2022

Dated:17.02.2023

Read: Letter received from the Management No. MPL/OSEP/Plant-II / 2022, dated:30.11.2022.

ORDER:

The Management of **M/s. Manali PetroChemicals Limited, Plant-II, S.No.1/6, 1/8, 23, 24, 25, 26, 27, 28, 29, 30/3 & 31, Manali Industrial Area, Sathangadu Village, Manali, Thiruvottiyur Taluk, Thiruvallur District – 600 068. (TVR 3323)** has prepared an 'On-Site Emergency preparedness plan' pertaining to their factory and submitted to this office.

Taking into consideration of the information furnished by the management in the 'On-Site Emergency Plan' and in exercise of the power conferred under section 41 B (4) of the Factories Act 1948 and the Rule 13 (1) of Tamil Nadu Control of Industrial Major Accident Hazards Rules 1994, the Director of Industrial Safety and Health, Chennai hereby records the On-Site Emergency preparedness plan of the above said factory subject to the following conditions:

1. The On-Site Emergency Plan submitted by the management is recorded only for the conditions prevailing on the date of receipt of the On-Site Emergency Plan.

2. If there is any change in the layout of machinery, plant, process or any other modification are carried out a fresh On-Site Emergency Plan in accordance of such modifications should be prepared and submitted again for approval.
3. Full Scale On-Site Emergency mock drill should be conducted once in 6 months, involving the officials from the Directorate of Industrial Safety and Health, Fire and Rescue services department, Medical Department, Pollution Control Board and the adequacy of the emergency response measures, shall be assessed and the outcome of the mock drill shall be periodically reported to the Director office.
4. Since the Propylene Glycol production capacity is expanded, the fire water house capacity shall be increased adequately.
5. Fire hydrant point shall be placed at the proposed product storage shed coupled with alarm system.
6. Hydrocarbon sensor shall be placed at the proposed product storage shed.
7. Since the reaction is exothermic, proper insulation and temperature detectors shall be provided. The same shall be checked for proper working, at periodic intervals.
8. Adequate quantity of Personal Protective Equipment including emergency kits, fire proximity suit, fire entry suit shall be provided.
9. The Hazop study and consequence analysis for the triple effect evaporator and the distilling process shall also be enclosed in the Onsite Emergency Plan.
10. Since the proposed product storage shed containing hazardous chemicals and the styrene storage tank is located adjacent to the union office, the union office and other buildings shall be relocated to a safer location at the plant.
11. In Chlorine storage area, adequate number of gas sensors shall be provided. Also workers in this area shall be provided with SCBA and necessary training shall be imparted on how to put on immediately and correctly during an emergency.

12.The consequence effect of propylene oxide leakage from the Tubular Reactor has been studied and the results have been shown as a standalone drawing without indicating the damage effect in terms of contour drawing super imposed on the Site Plan.

Hence site plan showing the Dispersion effect and Thermal Radiation effect shall be enclosed in the Onsite Emergency Plan.

13.In chlorine unloading area safe handling procedure shall be displayed both in Tamil and English.

14.Adequate number of emergency safety shower and eye wash fountain shall be provided near NAOH, KOH and HCL storage area.

(S/d.M.V.Senthilkumar)
Director (FAC),
Industrial Safety and Health,
Chennai-32.

To
The Occupier,
M/s. Manali PetroChemicals Limited, Plant-II,
S.No.1/6, 1/8, 23, 24, 25, 26, 27, 28, 29, 30/3 & 31,
Manali Industrial Area,
Sathangadu Village, Manali,
Thiruvottiyur Taluk,
Thiruvallur District – 600 068.

Copy to:

1. The Joint Director, Industrial Safety & Health, Thiruvottiyur.
(He is requested to monitor the compliance of the conditions by the Management during his regular inspection)
2. Additional Director, Industrial Safety & Health, Chennai.
3. Spare Copy.
4. Stock File.

Forwarded by Order //

K. Senthilkumar
20/2/23
for Director (FAC),
Industrial Safety and Health,
Chennai -32.

SD
20/2/2023



सी.एस.आई.आर - राष्ट्रीय पर्यावरण अभियांत्रिकी अनुसंधान संस्थान

CSIR - National Environmental Engineering Research Institute

विज्ञान एवं प्रौद्योगिकी मंत्रालय, भारत सरकार | Ministry of Science & Technology, Government of India

AcSIR Academy of Scientific & Innovative Research



Dr. Sukdeb Pal, Ph.D.

Principal Scientist | Waste Water Management

Science Secretary | CSIR-NEERI

Associate Professor (Chem. Sc.) | AcSIR

Email/Speed Post

डॉ. सुकदेव पाल, पिएच. डी.

प्रधान वैज्ञानिक | अपशिष्ट जल प्रबंधन

विज्ञान सचिव | सी एस आई आर - नीरी

एसोसिएट प्रोफेसर | रासायनिक विज्ञान | एसीएसआईआर

WWM/MPL-TPL/2025

January 29, 2025

Sub : Update on the progress of work under the caption project

Project : Feasibility Studies for Implementation of ZLD Concept for Higher Utilization of Treated Wastewater at Manali Petrochemicals Limited (Plant- I and Plant-II) & Tamilnadu Petroproducts Limited

Ref : Letter of Intent (LoI) No. MPL/NEERI/LOI/2023 dated May 02, 2023

Dear Sir,

With reference to the study jointly awarded to the CSIR-National Environmental Engineering Research Institute (CSIR-NEERI) by Manali Petrochemicals Limited (MPL) and Tamilnadu Petroproducts Limited (TPL), concerning the preparation of a feasibility study for the implementation of the Zero Liquid Discharge (ZLD) concept to enhance the utilization of treated effluent, we would like to provide an update on the progress of the study.

As part of the ongoing study, comprehensive field monitoring has been conducted at all three Effluent Treatment Plants (ETPs) of MPL and TPL. Samples have been collected from various stages of the ETPs, and detailed analyses have been performed to assess the adequacy and effectiveness of the unit operations and processes in relation to their design and operational parameters. We are currently conducting an in-depth evaluation of the different aspects involved in the potential introduction of the ZLD system, aiming to identify the most viable and techno-economically feasible treatment options. A pilot trial involving a Reverse Osmosis (RO) unit is currently underway at one of ETPs of MPL. A similar trial will also be conducted at the ETP of TPL to further validate these options.

Given the complexity of the study, which necessitates thorough validation through both laboratory and pilot-scale trials, the completion of the study is taking longer time than initially anticipated. We fully understand the time constraints and are committed to completing the study as quickly as possible, allowing us to conclude it and submit the report in the coming months.

We appreciate your understanding and continued support in this matter.

Thanking you and with best regards,

Sincerely,
(Sukdeb Pal)

Kind Attn:

Whole Time Director (Operations)

Manali Petrochemicals Limited & Tamilnadu Petroproducts Limited

Manali, Chennai – 600068

डॉ. सुकदेव पाल / Dr. Sukdeb Pal
प्रधान वैज्ञानिक / Principal Scientist
अपशिष्ट जल प्रौद्योगिकी प्रभाग /
Wastewater Technology Division
सीएसआईआर-नीरी / CSIR-NEERI
नागपुर / Nagpur-440020

नेहरु मार्ग, नागपुर ४४० ०२०, महाराष्ट्र, भारत; Nehru Marg, Nagpur, 440 020, Maharashtra India

Tel (O): + 91-712-2249885 Ext: 693 Fax: +91-712-2249900 Email: s_pal@neeri.res.in

Web: <https://bit.ly/3U83rWs> | <https://bit.ly/3QB0Wez> | <https://bit.ly/3T56SO5>

सतत विकास की ओर / Towards Sustainable Development



TAMILNADU POLLUTION CONTROL BOARD

District Environmental Laboratory, Manali

AMBIENT/SOURCE NOISE LEVEL SURVEY - Report of Analysis

Report No. 44/ NLS/2024-25

Date: 07.10.2024

1.	Name of the Industry	M/s. MPL –II,		
2.	Address of the Industry	Manali, Chennai - 68		
3.	Date of Survey	26.09.2024		
Category		RL	Land use Classification	Industrial
Type of Survey		Ambient/Source	Time of Survey	Day
Meteorological conditions			Calm/Windy/Rainy	Windy

Logging Parameters

Instrument Used	CESVA Model SC310		Serial No		T243103
Logging Interval	10 Minutes each point		Measuring Range		50-110 dB(A)
Weighting	“ A”	Peak Weighting	“C”	Time Weighting	FAST
Sound Incidence		RANDOM		Time in hrs	14.00 – 15.30

Report of Noise Level Monitoring

Sl No	Location	Duration (min)	Distance (M)	Direction	Sound Level – dB (A)		
					Leq	Min	Max
1	Near Main Gate	10	100	NE	63.0	56.1	73.1
2	Near	10	100	E	60.2	55.4	70.9
3	Near RMG	10	100	SE	59.4	53.8	68.4
4	Near Fire Water Reservoir	10	75	SW	63.8	60.5	73.4
5	Near Cooling Tower	10	75	W	65.5	61.7	75.3
6	Near Old Mech. Maintenance Room	10	100	NW	67.9	62.1	76.0

Note: Leq value is the average energy for the measured period.


Deputy Chief Scientific Officer,
District Environmental Laboratory
Tamil Nadu Pollution Control Board
Manali

CSR Activity Photos – FY 2024-25

Sanitation Block- Govt high school - kodunguaiyur



Primary Health Centre ,Kanniyammanpettai, Chenna



Free Medical Checkup Camp




Download file | iLovePDF

SPCB Admin Home

Statutory information - Manali

manalipetro.com/statutory-information/



ABOUT USINNOVATION & SUSTAINABILITYINVESTORSMEDIA CAREERSCONTACT

Statutory information

Statutory information

Manali Petrochemicals Limited, Plant II - PG Expansion EC Six Monthly Compliance Report with Annexure (Period - Apr-24 to Sep-24)

Manali Petrochemicals Limited, Plant II - PG Expansion EC Six Monthly Compliance Report with Annexure (Period - Oct-23 to Mar-24)

Manali Petrochemicals Limited, Plant II - PG Expansion EC Six Monthly Compliance Report with Annexure (Period - Apr-23 to Sep-23)

Manali Petrochemicals Limited, Plant II - PG Expansion EC Six Monthly Compliance Report with Annexure (Period - Oct-22 to Mar-23)

Manali Petrochemicals Limited, Plant II - EC for Expansion of PG Unit - Oct. 2022

CRZ Clearance Compliance Report - Apr. 2024 - Sep. 2024 Letter Dated 5th Dec. 2024

CRZ Clearance Compliance Report - Oct-23 to Mar-24 Letter Dated 28th May. 2024


CRZ Clearance Compliance Report - Apr-23 to Sep-23 Letter Dated 05th Oct. 2023

CRZ Clearance Compliance Report - Oct. 2022 - Mar. 2023 Letter Dated 26th Jun. 2023

CRZ Clearance Compliance Report - Apr. 2022 - Sep. 2022 Letter Dated 13th Oct. 2022

CRZ Clearance Compliance Report - Jan. 2022 - Mar. 2022 Letter Dated 05th May 2022

CRZ Clearance Compliance Report - July 2021 - Dec 2021 Letter Dated 21st Jan 2022



COMPANYINNOVATION & SUSTAINABILITYINVESTORSMEDIA CAREERSCONTACT


Manali Petrochemicals Limited

Website: www.manalipetro.com
Email: companysecretary@manalipetro.com

All Rights Reserved.

Sports headline
Myles Turner Inj...

Search



ENG IN 08:20
14-05-2025