







Kumarasamy Raja Nagar - 521457 Jaggayyapet Mandal, Krishna District, Andhra Pradesh, India Phone: 08654 224400-04

Fax: 08654 222352

E-mail: mcljpm@ramcocements.co.in

THE RAMCO CEMENTS LIMITED

RCL/MoEF&CC/JPM SB-239/276

Dt. 26.11.2024

Ministry of Environment, Forests and Climate Change, Integrated Regional Office, Green House Complex, Gopala Reddy Road, VIJAYAWADA - 520 010.

Respected Sir,

Submission of Half-Yearly Compliance Reports for Environmental Clearances for Sub: Jayanthipuram Limestone Mine (South Band) of The Ramco Cements Limited for the period from April 2024 to September 2024 – Reg.

1. EC Lr. No. SEIAA/AP/MIN/KRI/8/2019/1219/167.76&164.67 dated 26.10.2021. Ref:

2. EC Lr. No. J-11015/378/2006-IA.II (M) dated 08.06.2007.

We are herewith submitting the Half-Yearly Compliance reports for the above cited Environmental Clearance orders for the period from April 2024 to September 2024 along with relevant enclosures for our Jayanthipuram Limestone Mine (South Band) located at Jaggayyapet Mandal, NTR (previously Krishna) District, Andhra Pradesh. Name, designation and contact details of person in-charge of environmental division are:

ASHISH KUMAR SRIVASTAVA President (Mfg.) Phone No. 08654 - 224400, Fax No. 08654 - 222352, e-mail: mcljpm@ramcocements.co.in

This is for your kind information and perusal please.

Thanking you,

Yours faithfully, For The Ramco Cements Limited, (Formerly known as Madras Cements Ltd.,)

ASHISH KUMAR SRIVASTAVA

President (Mfg.)

Encl.: As above.

Cc to: Central Pollution Control Board, No. 77A, 2nd Floor, South Avenue Road, Ambattur Industrial Estate, Chennai - 600 058.

State Level Environment Impact Assessment Authority (SEIAA), AP Markfed Building, APIC Colony, Jawahar Auto Nagar, Vijayawada.

HALF-YEARLY COMPLIANCE REPORT

Environmental Clearance	SEIAA/AP/MIN/KRI/8/2019/1219/167.76&164.67 and dated
Letter/s No. and Date	26.10.2021
Name of the Project	Jayanthipuram Limestone Mine (South Band) – 0.50 to 1.75 Million TPA Capacity of Limestone of The Ramco Cements Limited
Period of Compliance Report	April 2024 to September 2024

A. SPECIAL CONDITIONS

S.No.	Condition	Compliance Status
i.	The proposal shall not attract the following acts & Rules: a. Forest Conservation Act 1980, b. Wild life (Protection) Act,1972;	 a. Not applicable b. Wildlife conservation plan prepared for Schedule - I species and submitted to Chief Wildlife Warden, Govt. of A.P., Forest Department. Accordingly, The Prl. Chief Conservator of Forests & Chief Wild Life Warden, Government of Andhra Pradesh has approved the Wild Life Conservation plan vide letter No. 21024/19/2022/WL-2 dated 11.07.2024. The same is being implemented for conservation of Schedule - I species.
The state of the s	 c. CRZ Notification, 2011; d. The Eco sensitive areas as notified under Environment (Protection)	c. Not applicable d. Not applicable e. Not applicable
ii.	The total production during a scheme should be limited to the approved quantity as per Mining scheme / plan.	Being complied. During the financial year 2023-2024, Limestone production was about 0.159 million tonne against the approved capacity of 1.75 Million Tonne.
iii.	The stipulating the condition that the project proponent shall not carry out any mining activity within 200 meters buffer zone in the mine lease area under any circumstances.	Being complied. Mining operation are not being carried out in the buffer zone of 200 m in the mine lease area.
iv.	The proponent volunteered to allocate sufficient funds for amenities to Oxygen Plant at Jayanthipuram Village as a part of Corporate Social Responsibility (CSR)	Complied. With the request from Honourable District Collector, Oxygen Plant is commissioned at Jaggaiahpet Community Health Centre on

S.No.	Condition	Compliance Status
	activity.	14.02.2022, as part of CSR activity.
V.	The project proponent shall maintain the setback distance 7.5 meters buffer zone all around the mine lease area for greenbelt development and other conditions are to be fulfilled.	Being complied. 7.5 m safety distance maintained all along the Mining Lease boundary and greenbelt being developed.
Vi.	The avenue plantation (tall plants), of at least 1.5 m height, for 1 km length of the approach road on either side of the road is to be developed and maintained. The entire plantation is to be completed in the first year itself.	Being complied. As this is an existing mine, plantation has already taken up on either side of the haul roads from mine entry to exit and the plants are grown up.
vii.	The proponent is advised to ensure safety to animal and public life.	Being complied. All safety precautions are being taken and safety of animal and public life is being ensured.

B. SPECIFIC CONDITIONS:

S.No.	Condition	Compliance Status
1)	Air Pollution	
İ	The proponent shall comply with the mining methodology mentioned in approved mining plan and Form I.	 Being complied. The mining methodology being followed as per approved mining plan and Form - I. As per the present approved mining plan (vide Lr. No. AP/KSN/MP/Lst6 dated 11.06.2024), the limestone production from this lease is restricted to 0.50 Million TPA for the financial year 2024-2025.
ii	Greenbelt shall be developed along the boundary of mining lease area and also in back filled and reclaimed areas with tall growing native species in consultation with the local DFO / Agriculture Department. The proponent of mine shall carry mining operations in such a manner so as to cause least damage to the flora of the mining area and nearby areas. He shall take immediate measures for planting in the same area or any other area selected by authorities not less than twice the number of trees going to be felled by mining operations. He shall also take measures for restoration of other flora / fauna if damaged by mining operations. In case any felling or damage	 Being complied. Greenbelt is being developed along the Lease boundary. Presently there is no backfilling area and greenbelt will be developed on backfilled area in due course of time with native species in consultation with DFO / Agriculture department. There are no trees to fell in the mining lease area and all precautions are being taken for not damaging the flora in the nearby areas.

S.No.	Condition	Compliance Status
iii	to fauna and flora is involved, prior permission shall be taken from the concerned regulatory authority, by the proponent, without which mining shall not be taken up. Fugitive dust emissions from all the sources should be controlled regularly. Water spraying arrangement on haul roads, loading and unloading and at	Being complied. • Fugitive dust emissions are being controlled regularly. • Compiled data on fugitive dust
1	transfer points should be provided and properly maintained.	monitoring for the period from April 2024 to September 2024 is enclosed as Annexure – I. Water spraying being done on haul roads, loading, unloading and transfer points and the same is being continued.
iv	The proponent shall take appropriate measures to ensure that the GLC shall comply with the revised NAAQ norms notified by MoE&F, GoI on 16.11.2009.	 Proper measures being taken to ensure the GLC as per revised NAAQ norms. Ambient air quality monitoring is being done in buffer zone of the lease by MoEF&CC approved external environmental monitoring agency for PM₁₀, PM_{2.5}, SO₂, NOx monitoring. As per the data, the ground level concentrations are within the NAAQ norms notified by MoEF&CC, GOI dated 16.11.2009. Data of the Ambient Air Quality is being submitted to the Integrated Regional Office, MoEF&CC located at Vijayawada through mail (to eccompliance-ap@gov.in) and to CPCB through hard copy regularly once in six months. The status of this EC compliance reports is being regularly uploaded in APPCB website i.e., https://pcb.ap.gov.in. Compiled data for the period April 2024 to September 2024 is enclosed as Annexure – II.
V	The following measures are to be implemented to reduce air pollution during transportation of mineral:	Daing complied
	 Roads shall be graded to mitigate the dust emission. 	Being complied. Roads are being maintained properly to mitigate dust emission.
	 Regulatory Authority prior concurrence shall be taken for this activity. 	l '

S.No.	Condition	Compliance Status
	Water shall be sprinkled at regular	Being complied.
	interval on the main haul road and	Water is being sprinkled regularly on haul
	other service roads by water	roads with mobile water tankers and will be
	sprinklers to suppress dust.	continued.
	The following measures are to be	
vi	implemented to reduce Noise pollution:-	Being complied.
	Proper and regular maintenance of vehicles and other equipment.	Vehicles are being maintained properly for
	vernicles and other equipment.	control of noise levels and the noise levels
		are well below the limit.
	> The proponent shall ensure that there	Being complied.
	shall be no excessive noise, while	 All precautions are being taken to avoid
	taking up mining activity.	excess noise during mining activity.
***************************************	,	 Latest technology being used during
		blasting activities.
	> Limiting time exposure of workers to	Being followed.
	excessive noise.	Limiting time exposure of workers to
		excessive noise levels.
	> The workers employed shall be	Being complied.
	provided with protection equipment	 Necessary personal protective
	and earmuffs etc.	equipments (such as earmuffs,
		earplugs, etc.,) are being provided to
		workers exposed to noise levels and
		ensured for wearing of the same.
		Compiled data of Noise levels measured
		in the period April 2024 to September
		2024 is enclosed as Annexure – III.
	Speed of trucks entering or leaving the mine is to be limited to moderate	Being complied. The speed is limited to moderate speed @
	speed of 25 kmph to prevent undue	25 KMPH to prevent undue noise from
	noise from empty trucks.	empty trucks.
vii	Measures should be taken to comply with	Being complied.
"	the provisions laid under Noise Pollution	 Protective measures being taken as per
	(Regulation and Control) (Amendment)	provisions to control noise levels.
	Rules, 2010; dt. 11.01.2010 issued by the	 Necessary personal protective
	MoE&F, GOI to control noise to the	equipments (such as earmuffs,
	prescribed levels. Workers engaged in	earplugs, etc.,) are being provided to
	operations of HEMM, etc should be	workers exposed to noise levels and
	provided with ear plugs/muffs.	ensured for wearing of the same.
	Regulatory authority instructions be	• Instructions of the Regulatory authority
	taken if there are any better alternatives.	are being followed.
	The proponent shall not take-up mining	Being complied.
***************************************	activity unless he obtains the safety	Permission is obtained from DGMS for
	clearance certificate from the Govt.	carrying out mining activities in the lease
viii	competent authority.	under MMR 1961.
2)	Water Pollution:-	
i	As per records the source of water is Bore	Being complied.
	well. Total water requirement is 150 KLD,	The source of water is mines pit water.

S.No.	Condition	Compliance Status
	Out of that, 96.0 KLD is used for Dust suppression; 49.0 KLD is used for Development of green belt; 5.0 KLD is used for Domestic purpose.	 The water consumption for the year 2022-2023 is well within the stipulated quantity. Corrigendum request submitted (vide our letter No. RCL/SEIAA/54/2021-2022 dated 04.11.2021) to SEIAA-AP to modify the source of water as 'mines pit water' instead of 'Bore well water', which is under process. The total quantity of water requirement is being adhered to 150 kLD, while implementing this expansion project.
ii	Garland drain and siltation ponds of appropriate size should be constructed for the working pit to arrest flow of silt and sediment. The water so collected should be utilized for watering the mine area, roads, green belt development etc. The drains should be regularly desilted, particularly after monsoon, and maintained properly. Prior concurrence of Regulatory Authority concerned shall be taken for this activity before taking up mining.	 Being complied. Garland drain made along the mine pit over a length of 1503 m. Settling tank made for settling the suspended solids. The tank is being de-silted and maintained regularly. The water collected in the sump is being utilized for water sprinkling in the mine lease area, haul roads, greenbelt development, etc. Desilting is being carried out regularly. During the year 2024-2025, desilting was carried out during the month of May 2024 and a quantity of 18 tonne desilted.
iii	Regular monitoring of ground water level and quality should be carried out by establishing a network of existing wells by the project proponent in and around project area in consultation with Regional Director, CGWB, Southern Region, Hyderabad. Data thus collected should be sent at regular interval to MoEF, CGWA and CGWB, Southern, Region, Hyderabad.	Being complied. Ground water levels are being monitored regularly (at 4 locations) and readings are being recorded. Ground water quality (in the nearby
iv	Suitable conservation measures to	

S.No.	Condition	Compliance Status
	augment groundwater resources in the area shall be planned and implemented in consultation with Regional Director, CGWB, Southern Region, Hyderabad. Suitable measures should be taken for rainwater harvesting in consultation with concerned Regulatory Authority.	 Suitable ground water conservation measures ae being taken up such as check dams, settling tanks and rainwater harvesting pits etc. The rain water collected in mine pit is being used for dust suppression and greenbelt development purposes after settling of silt in mine sump. As part of the CSR activities, mine seepage water is also being supplied to Jayanthipuram village for domestic use to conserve the water resources in the vicinity.
V	Permission from the competent authority should be obtained for drawl of ground water, if any, required for this project.	Being complied. NOC obtained from Department of Panchayat Raj & Rural Development, Government of Andhra Pradesh (Agency authorised to issue NOC for Andhra Pradesh projects) vide letter No. PRR05-11028/13/2018-SLNA-GIS-CORD dated 02.01.2024, which is valid up to 01.01.2026.
3)	Solid Waste :-	
i	Topsoil, if any, shall be stacked properly with proper slope with adequate measures and should be used for plantation purpose.	Top soil generated if any, will be utilized for plantation.
ii	The following measures are to be adopted to control erosion of dumps:-	
	Retention/toe walls shall be provided at the foot of the dumps.	Retaining bund of 1.5 m height is formed at the foot of the dumps.
	Worked out slopes are to be stabilized by planting appropriate shrub/grass species on the slopes.	As on date, there are no worked out bench slopes and will be stabilized accordingly as and when available.
	Regulatory Authority prior concurrence shall be taken for this activity.	Being done as per approved Mining Plan
	Waste oils, used oils generated from the EM machines, mining operations, if any, shall be disposed as per the Hazardous Wastes (Management, Handling, and transboundary movement) Rules, 2008 and its amendments thereof to the recyclers authorized by APPCB. APPCB shall monitor this aspect at regular intervals to prevent any harm to life and the proponent on his part, shall ensure that this activity shall be taken up regularly under the guidance of	Being complied. Being used for firing in cement plant Kilns and / or sold to APPCB authorised recyclers (with proper storage).

S.No.	Condition	Compliance Status
	Regulatory Authority, as decided by that Authority.	
iv	The proponent will be squarely responsible for proper implementation of solid waste management plan, prevention of air pollution, water pollution, and any other kind of pollution / health hazard.	

C. GENERAL CONDITIONS:

S.No.	Condition	Compliance Status
ŧ	This order is valid for a period of 20 years or the expiry date of mine lease or land	Noted.
	lease period issued by the Government of	
	A.P., whichever is earlier.	
ii	While giving CFE/CFO, the APPCB is to	Noted.
	kindly ensure compliance of guidelines	
	issued in G.O RT No 239 dt. 16.04.2020 and	
	Memo. No/covid-19/2020/HMFW, dt.	
	18.04.20 issued by Medical, Health and	
	Family welfare department, Government of	
	AP and the Ministry of Home Affairs order	·
	No. 40-3/2020/DM-DA, dt. 15.04.2020	
	scrupulously.	
iii	The proponent shall scrupulously follow	Being followed.
	any conditions stipulated by Revenue	
	department / Panchayat Raj / Municipal	
	administration / local State government	
	bodies (Gram panchayat / Gram	
	secretariat) in ensuring safety to human	
	and animal life. The APPCB to ensure the	
•	same while according CFE / CFO.	Being ensured that there is no disturbance
iv	Proponent shall ensure that there is no disturbance to flora and fauna. Serenity of	to flora and fauna.
	nature must be protected at any cost.	to nora and radna.
V	In respect of government land for mining,	Being complied.
٧	the responsibility fixed on AD mines to	• This is the existing Mining Lease
	check whether necessary clearances from	containing part of Government land and
	revenue department are obtained.	part of patta land.
	Tevenue department die obtained.	I part or patter intra-

S.No.	Condition	Compliance Status
		 Necessary clearances obtained from Revenue Department and Govt. during grant of Mining Lease.
vi	In case of patta land while granting mine lease ADMG should verify the land lease documents.	Being complied. This is the existing Mining Lease consisting part of patta lands owned by the company.
vii	In respect of forest land given in lease for mining, the proponent shall scrupulously adhere to the mining conditions stipulated by the government of Andhra Pradesh.	There is no forest land involved in ML area.
vii	Any change in mining plan / production / mining methodology the proponent shall apply afresh EC.	 Being complied. The mining methodology being followed as per approved mining plan and Form - I. As per the present approved mining plan (vide Lr. No.AP/KSN/MP/Lst-6 dated 11.06.2024), the limestone production from this lease is restricted to 0.50 Million TPA for the financial year 2024-2025.
ix	While taking up mining activity the proponent shall meticulously follow approved mining plan / Form - 1 / EMP.	Being complied. Approved Mining Plan / Form - 1 / EMP are being followed during the mining activity.
X	Once in an year proponent shall conduct impact analysis on environment by reputed institute recognized by Director General, Mines and Safety.	Will be followed. Corrigendum request submitted (vide our letter No. RCL/SEIAA/54/2021-2022 dated 04.11.2021) to SEIAA-AP to modify "impact analysis on environment by reputed institute recognized by MOEF&CC once in five years" instead of "impact analysis on environment by reputed institute recognized by Director General, Mines and Safety", which is under process.
xi	"Consent for Establishment" & "Consent for Operation" shall be obtained from Andhra Pradesh Pollution Control Board under Air and Water Act to carry on mining.	 Obtained CFE order from APPCB for this expansion proposal vide order No. 253/APPCB/CFE/RO-VJA/HO/2009 dated 02.12.2021. Obtained CFO order from APPCB this expansion proposal vide order No. APPCB/VJA/VJA/488/HO/CFO/ 2021 dated 04.01.2022. APPCB renewed combined CTO order vide order No. APPCB/VJA/VJA/488/HO/CFO/2021 dated 07.11.2022 for total production of 1.75 Million TPA from this mining lease, which is valid up to 31.01.2028.

S.No.	Condition	Compliance Status
xii	No change in mining technology and scope	No change in mining technology, expansion
	of working should be made without prior	or modifications in the mine.
	approval of the SEIAA, A.P. No further	
	expansion or modifications in the mine	
	shall be carried out without prior approval	
	of the SEIAA, AP / MOEF&CC, Gol, New	
	Delhi, as applicable.	
xiii	The project proponent shall submit six	Being complied.
	monthly reports on the status of	Being submitted as part of this
	compliance of the stipulated environmental	condition.
	clearance conditions including results of	• The soft copy of this half-yearly
	monitored data (both in hard copies as well	compliance report is mailed to
	as by e-mail) to the Ministry of	eccompliance-ap@gov.in, vide Notice from MoEF&CC, Chennai dated
	Environment & Forests, its Regional Office, Chennai, SEIAA, A.P., Zonal Office of Central	from MoEF&CC, Chennai dated 13.08.2019.
	Pollution Control Board, Bangalore, District	• The status of compliance of the
	Collector and A.P. Pollution Control Board.	environmental clearance conditions
	The proponent shall upload the status of	including results of monitored data
	compliance of the environmental clearance	being uploaded and updated in our
	conditions including results of monitored	company's website regularly.
	data on their websites and shall update the	Hard copy of the same is submitted to
	same periodically.	SEIAA, A.P. and Regional Directorate
		(Chennai) of Central Pollution Control
		Board, Chennai.
		• The status of this EC compliance reports
		is being regularly uploaded in APPCB
		website i.e., https://pcb.ap.gov.in.
xiv	Post Environment Clearance Monitoring: It	Being complied.
	shall be mandatory for the project manager	Being submitted as part of this
	to submit half yearly compliance reports in	condition, within the stipulated time.
•	respect of the stipulated prior EC terms and	Hard copy of the same is submitted to
	conditions in hard and soft copy to SEIAA	•
	on 1st June and 1st December of each	
	calendar year. (Refer 10(i) and 10(ii) of S.O.	1
	1533(E) of Ministry of Environment and	
	Forests Notification, New Delhi, dt 14 th	· ·
	September, 2006.)	13.08.2019.
XV	The APPCB shall monitor the EC conditions	Being complied. The status of this EC compliance reports is
	stipulated by SEIAA as per GO MS No 120 dated 01.11.2018 of EFS&T Dept., and	
	ensure the compliance.	i.e., https://pcb.ap.gov.in.
vii	The proponent shall obtain prior	Being complied.
xvi	permissions and continued guidance from	
	regulatory authorities for all the above	respective regulatory authorities.
	conditions wherever it is required.	
xvii	All safety norms as stipulated in various	Being complied.
1 7411	laws and statutes shall be scrupulously	1 - '
1	followed by the proponent. PCB shall	· ·
	1.0 of die biobound to out	

S.No.	Condition	Compliance Status
	ensure compliance to the conditions stipulated by SEIAA.	scrupulously followed. The status of this EC compliance reports is being regularly uploaded in APPCB website i.e., https://pcb.ap.gov.in.
xviii	The Proponent shall follow G.O. Ms. 107 dated 30.07.2016 of Industries & Commerce (Mines-II) Department wherever applicable.	Noted.
xix	Consent for Establishment shall be obtained from Andhra Pradesh Pollution Control Board under Air and Water Act before the start of any activity / construction work at site.	Complied. Obtained CFE order from APPCB for this expansion proposal vide order No. 253/APPCB/CFE/RO-VJA/HO/2009 dated 02.12.2021, before the start of expansion activity.
xx	Officials from the Regional Office of MOEF&CC, Chennai / The SEIAA, Andhra Pradesh through the Regional Offices of Andhra Pradesh Pollution Control Board, who would be monitoring the implementation of environmental safeguards should be given full cooperation, facilities and documents / data by the project proponents during their inspection. A complete set of all the documents shall be submitted to the CCF, Regional Office to MOEF&CC, Vijayawada.	Being complied. Full co-operation, facilities and documents / data being given during the inspection of Officials from the Integrated Regional Office of MOEF&CC, Vijayawada / The SEIAA, Andhra Pradesh / The Regional Offices of Andhra Pradesh Pollution Control Board.
xxi	Four ambient air quality-monitoring stations should be established in the core zone as well as in the buffer zone. Location of the stations should be decided based on the meteorological data, topographical features and environmentally and ecologically sensitive targets and frequency of monitoring should be undertaken in consultation with the State Pollution Control Board.	Being complied. 4 Nos. & 9 Nos. of ambient air quality monitoring stations in core zone & buffer zone respectively are established based on the meteorological data, topographical features and environmentally and ecologically sensitive in consultation with State Pollution Control Board and regular monitoring (fortnightly) is being carried out through MoEF&CC approved external environmental monitoring agency.
xxii	Data on ambient air quality should be regularly submitted to the Ministry including its Regional Office located at Chennai and the State Pollution Control Board/ Central Pollution Control Board once in six months.	Being complied. Compiled data of ambient air quality monitoring collected during half-year period April 2024 to September 2024 by MoEF&CC approved external environmental monitoring agency is enclosed as Annexure – II.
xxiii	Personnel working in dusty areas should wear protective respiratory devices and they should also be provided with adequate training and information on	Personal Protective Equipment are being provided to the personnel working in dusty

S.No.	Condition	Compliance Status
	safety and health aspects.	on safety & health aspects are being provided as part of Mines Vocational Training at our Ramco Mines Vocational Center.
xxiv	The project proponent shall ensure that no natural watercourse and/or water resources shall be obstructed due to any mining operations. Necessary safeguard measures to protect the first order streams, if any, originating from the mine lease shall be taken.	No natural water courses obstructed due to mining operations and no first order streams originating from the mine lease area.
XXV	Occupational health surveillance program of the workers should be undertaken periodically to observe any contractions due to exposure to dust and take corrective measures, if needed.	 Occupational health surveillance programme is taken up periodically and records are being maintained. Corrective measures will be taken to the contractions due to exposures of dust, if needed. A full-fledged Occupational Health Centre with a qualified Occupational Health Specialist with supporting staff is established with the following facilities: X-ray ECG Spirometry (lung function test) Audiometry Semi-auto analyser to carryout biochemical tests Clinical lab for micro-biological tests (including sputum test) Checking colour blindness Dental chair Ambulance
xxvi	A separate environmental management cell with suitable qualified personnel should be set-up under the control of a Senior Executive, who will report directly to the Head of the Organization.	Environment management cell is established with qualified personnel to
xxvii	The funds earmarked for environmental protection measures (Capital cost Rs. 27.5 Lakhs and Recurring cost Rs. 22.0 Lakhs /annum) should be kept in separate account and should not be diverted for other purpose. Year wise expenditure	 The funds earmarked for environment protection are not being diverted for other purposes. The details of environmental protection

S.No.	Condition	Compliance Status
	should be reported to the Ministry and its Regional Office located at Vijayawada.	for the next financial year are being submitted to the Ministry along with half-yearly compliance reports regularly.
xxviii	At least 2% of the total project cost shall be allocated for Corporate Environment Responsibility (CER) and item-wise details along with time bound action plan shall be prepared in accordance to the MoEF&CC's office Memorandum No. F.No.22- 65/2017-IA.III, dated. 01.05.2018 and submit to the SEIAA, A.P and Ministry's Regional Office, Vijayawada.	As this EC is accorded for expansion proposal, at least 1% of the total project cost shall be allocated for Corporate Environment Responsibility (CER). Corrigendum request submitted (vide our letter No. RCL/SEIAA/54/2021-2022 dated 04.11.2021) to modify '1%' instead of '2%' of the total project cost, which is under process. Some of the projects are in progress.
xxix	The project proponent shall submit the copies of the environmental clearance to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.	Complied. Submitted the EC copies to all concerned local bodies on 30.10.2021, accordingly.
XXX	The project authorities should advertise at least in two local newspapers widely circulated, one of which shall be in the vernacular language of the locality concerned, within 7 days of the issue of the clearance letter informing that the project has been accorded environmental clearance and a copy of the clearance letter is available with the State Pollution Control Board and SEIAA, A.P.	 We published advertisements in 2 Nos. of newspapers (The Hans India – English & Andhra Jyothi – Telugu – vernacular language) on 31.10.2021 regarding the issuance of the Environmental Clearance order. Copy of the same is submitted vide Lr. No. RCL/SEIAA/55/2021-2022 dated 02.11.2021.
xxxi	The SEIAA or any other competent authority may alter / modify the above conditions or stipulate any further condition in the interest of environment protection.	
xxxii	The proponent shall obtain all other mandatory clearances from respective departments before taking-up the mining activity.	This is the existing mine and all the clearances obtained from respective departments.
xxxiii	Any appeal against this Environmental Clearance shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.	Noted
xxiv	Concealing the factual data or failure to comply with any of the conditions mentioned above may result in withdrawal	Noted

S.No.	Condition	Compliance Status
	of this clearance and attract action under	
	the provisions of Environment (Protection)	
	Act, 1986.	
xxxv	The SEIAA may revoke or suspend the	Noted
	order, if implementation of any of the	
	above conditions is not satisfactory. The	
	SEIAA reserves the right to alter / modify	
	the above conditions or stipulate any	
	further condition in the interest of	
	environment protection.	
xxxvi	SEIAA also reserves the right to cancel the	Noted
	EC issued at any time, if EC has been	
	obtained by the proponent through	
	suppression of any information or	
	furnishing false information.	
xxxvii	The above conditions will be enforced	Being complied for the conditions stipulated
	inter-alia, under the provisions of the	as per Water (Prevention & Control of
	Water (Prevention & Control of Pollution)	Pollution) Act, 1974, the Air (Prevention &
	Act, 1974, the Air (Prevention & Control of	
	Pollution) Act, 1981, the Environment	
	(Protection) Act, 1986 and the Public	Taken Public Liability Policy No.
***************************************	Liability Insurance Act, 1991 along with	0304008408 02 00 is taken for the financial
	their amendments and rules.	year 2024-2025.

HALF-YEARLY COMPLIANCE REPORT

Environmental Clearance	J-11015/378/2007-IA.II (M) dated 08.06.2007
Letter/s No. and Date	
Name of the Project	Jayanthipuram Limestone Mine (South Band) — 0.5 Million TPA Capacity of Limestone of The Ramco Cements Limited
Period of Compliance Report	April 2024 to September 2024

A. SPECIFIC CONDITIONS:

S.No.	Condition	Compliance Status
i ii	Top soil shall be stacked properly with proper slope with adequate safeguards and shall be backfilled for reclamation and rehabilitation of mined out area. Overburden shall be stacked at earmarked dump site(s) only and shall not be kept active for long period. The maximum height of the dump shall not exceed 30 m, each stage shall preferably be of 10 m and overall slope of the dump shall not exceed 28°. The mine pit area shall be reclaimed by back filling the OB in a phased manner. The OB dumps shall be scientifically vegetated with suitable native species to prevent erosion and surface run off. Monitoring and management of rehabilitated areas shall continue until the vegetation becomes self-sustaining. Compliance status shall be submitted to the MOEF once in six months.	Noted. No topsoil generated during period from April 2024 to September 2024. Reclamation and rehabilitation are not initiated as ultimate pit level is not reached. Backfilling is not yet started. Being complied. Out of 2 Nos. of overburden dumps, one is active dump and another is in-active dump. Overburden is being dumped on the earmarked dump sites only. The height of the active dump is 19.0 m (in 2 terraces) and the slope of the dump is maintained as specified. As the dump is still in active stage, plantation on parts of the dump is started. Reclamation and rehabilitation are not initiated as the mineral is not exhausted. This report is being submitted as half yearly compliance report (April 2024 to September 2024). The copy of this half-yearly compliance report is mailed to eccompliance-ap@gov.in, vide Notice from MoEF&CC, Chennai dated 13.08.2019.
		 The same is also uploaded in PARIVESH portal.
iii	Garland drains shall be constructed to arrest silt and sediment flows from soil and mineral dumps. The water so collected shall be utilized for watering the mine area, roads, greenbelt development etc. The drains shall be regularly de-silted particularly after monsoon and	 Being complied. The following measures are being taken: Garland drains are made along the bottom of waste dumps and around the mine workings. These garland drains are made for a total length of 1503 m for the mine pit and

S.No.	Condition	Compliance Status
	maintained properly. Garland drain (size,	600 & 680 m around the two waste
	gradient and length) shall be constructed	dumps.
	for both mine pit and for waste dump and	 Settling tanks (4 Nos.) with total area of
	sump capacity shall be designed keeping	0.27 ha are connected to the garland
	50% safety margin over and above peak	drains for settling the suspended solids.
	sudden rainfall (based on 50 years data)	 These tanks are being de-silted and
	and maximum discharge in the area	maintained regularly.
	adjoining the mine site. Sump capacity shall also provide adequate retention period to allow proper settling of silt material. Sedimentation pits shall be	 The sump capacity is made to take care of maximum rainfall. A sump is made with a dimension 33m*17m*4.0m size for proper settling of silt material.
	constructed at the corners of the garland drains and de-silted at regular intervals.	 The water collected is being utilized for watering the mine area, haul roads, greenbelt development, irrigation, etc. Desilting is being carried out regularly.
		During the year 2024-2025, desilting was carried out during the month of May 2024 and a quantity of 18 tonne desilted.
iv	Drilling and blasting shall be by using dust	Being complied.
	extractors / wet drilling.	Wet drilling is being practiced. Controlled
		blasting is being done.
V	Plantation shall be raised in an area of	Being complied.
	20.17 Ha including a greenbelt of	An area of 22.53 ha within ML has been
	adequate width by planting the native	covered under plantation as on
	species around the ML area, roads, OB	September 2024 with native plant
	dump sites etc., in consultation with the	species.
merentary control of the control of	local DFO / Agriculture department. The density of the trees shall be around 2500	 Saplings have been planted along OB dump, roads.
	plants per Ha. The company shall involve	Greenbelt development will be further
	local people with the help of local NGOs	extended as per the Review of Mining
	for afforestation programme.	Plan approved by Indian Bureau of Mines, Hyderabad.
		 Planation of saplings and regular
		maintenance is being done by involving local people.
vi	The company shall prepare Wild Life	Noted.
	Conservation plan in consultation with	 Wildlife conservation plan prepared for
	CWLW / State Forest Department for	Schedule - I species and submitted to
	implementation.	Chief Wildlife Warden, Govt. of A.P,
		Forest Department.
		Accordingly, The Prl. Chief Conservator
		of Forests & Chief Wild Life Warden,
		Government of Andhra Pradesh has
		approved the Wild Life Conservation
		plan vide letter No. 21024/19/2022/ WL-
		2 dated 11.07.2024. The same is being
		implemented for conservation of
		Schedule - I species.
		15 D 2 0 a

S.No.	Condition	Compliance Status
vii	The project authority shall implement suitable conservation measures to augment ground water resources in the area in consultation with the Regional Director, Central Ground water board	 Suitable ground water conservation measures are being taken up such as garland drains, check dams, settling tanks and rainwater harvesting etc. The rain water collected in mine pit is being used for dust suppression, greenbelt development and domestic purposes after settling of silt in mine sump. As part of the CSR activities, mine seepage water is also being supplied to Jayanthipuram village, to conserve the water resources in the vicinity.
viii.	Regular monitoring of ground water level and quality shall be carried out by establishing a network of existing well and constructing new piezometers during the mining operation. The monitoring shall be carried out four times in a year – Pre-monsoon (April-May), Monsoon (August), Post-Monsoon (November) and Winter (January) and the data thus collected may be sent regularly to MOEF, Central Ground Water Authority and Regional Director, Central Ground Water Board.	 Ground water levels are being monitored regularly (at 4 locations) and readings are being recorded. Ground water quality (in the nearby villages) is being analysed by MoEF&CC approved external environmental agency (M/s Universal Enviro Associates, Hyderabad). The ground water level data and ground water quality data for the period April 2024 to September 2024 is being submitted to the CGWB, copy is enclosed as Annexure – IV. The monitoring is being carried out four times in a year – Pre-monsoon (April-May), Monsoon (August), Post-Monsoon (November) and Winter (January).
ix.	Prior permission from the competent authority shall be obtained for drawl of ground water, if any.	Being complied.
X .	Vehicular emissions shall be kept under control and regularly monitored. Measures shall be taken for maintenance of vehicles used in mining operation & in transportation of mineral. The vehicles shall be covered with a tarpaulin and shall not be overloaded.	i e

S.No.	Condition	Compliance Status
		 ensuring that the vehicles are not overloaded. While transporting the mineral, the following measures are being taken: Transportation of mineral is being done by moderately loading the vehicles to avoid the spillage. The body height of the vehicle is raised by 1 foot to avoid the spillage of material.
Xi.	A final mine closure plan along with details of Corpus Fund shall be submitted to the MOEF 5 years in advance of final mine closure for approval.	 Noted. The final mine closure plan will be submitted accordingly with details to MoEF&CC as suggested. The life of the mine is estimated up to the financial year 2042-2043 as per the approved mining plan.
xii.	Spent oil generated from maintenance of HEMM shall be sold to the registered recyclers.	Being complied. Being used for firing in kilns and for lubrication of plant equipment / or sold to APEMC authorized recyclers (with proper storage).

B. GENERAL CONDITIONS:

S.No.	Condition	Compliance Status
i.	No change in mining technology and scope of working shall be made without prior approval of the MOEF.	Being complied. No change in mining technology and the scope of working. Being complied.
	No change in the calendar plan including excavation, quantum of mineral and waste shall be made.	 Obtained Environmental Clearance (EC) order to expand the production from 0.5 to 1.75 Million TPA is obtained from State Level Environment Impact Assessment Authority (SEIAA), Andhra Pradesh vide order No. SEIAA/AP/MIN/KRI/8/2019/1219/167.76 & 164.67 dated 26.10.2021. Obtained CFE order from APPCB for the same proposal vide order No. 253/APPCB/CFE/RO-VJA/HO/2009 dated 02.12.2021. Obtained CFO order from APPCB for the same proposal vide order No. APPCB/VJA/VJA/488/HO/CFO/2021 dated 07.11.2022. During the Financial year 2023-2024, Limestone production was about 0.15922 million tonne.

S.No.	Condition	Compliance Status
		 As per the present approved mining plan (vide Lr. No. AP/KSN/MP/Lst6 dated 11.06.2024), the limestone production from this lease is restricted to 0.50 Million TPA for the financial year 2024- 2025.
iii.	Conservation measures for protection of flora and fauna in the core & buffer zone shall be drawn up in consultation with the local forest and wildlife department.	 Wildlife conservation plan prepared for Schedule - I species and submitted to Chief Wildlife Warden, Govt. of A.P, Forest Department. Accordingly, The Prl. Chief Conservator of Forests & Chief Wild Life Warden, Government of Andhra Pradesh has approved the Wild Life Conservation plan vide letter No. 21024/19/2022/ WL-2 dated 11.07.2024. The same is being implemented for conservation of Schedule - I species.
iv.	Four ambient air quality monitoring stations shall be established in the core zone as well as in the buffer zone for RPM, SPM, SO ₂ , NO _X monitoring. Location of the stations should be decided based on the meteorological data, topographical features and environmentally and ecologically sensitive in consultation with State Pollution Control Board.	Being complied. 4 Nos. & 9 Nos. of ambient air quality monitoring stations in core zone & buffer zone respectively are established based on the meteorological data, topographical features and environmentally and ecologically sensitive in consultation with State Pollution Control Board and regular monitoring (fortnightly) is being carried out through MoEF&CC approved external environmental monitoring agency for PM ₁₀ , PM _{2.5} , SO ₂ , NOx monitoring.
V.	Data on ambient air quality (RPM, SPM, SO ₂ , NOx) should be regularly submitted to the Ministry including its RO located at Bangalore and the SPCB / CPCB once in six months.	Being complied. Compiled data of ambient air quality monitoring collected during half-year period April 2024 to September 2024 by MoEF&CC approved external environmental monitoring agency is enclosed as Annexure – II.
vi.	Fugitive dust emissions from all the sources shall be controlled regularly. Water spraying arrangement on haul roads, loading and unloading and at transfer points shall be provided and properly maintained.	

S.No.	Condition	Compliance Status
		used to control dust emission on other main haul road leading to the limestone crusher. Wet drilling is being practiced. Water is being sprayed on internal ramp roads, muck piles and unloading points (on dumps) by mobile water tankers. Water fogging system is being operated at limestone crusher dump hopper (limestone unloading point at Plant) to suppress the fugitive emissions. To avoid spillage of material while transporting, the following measures are being in practice: Moderate loading of tippers. The body height of the vehicle is raised by 1 foot.
vii.	Measures shall be taken for control of noise levels below 85 dBA in the work environment. Workers engaged in operations of HEMM etc., shall be provided with ear plugs / muffs.	
vili.	Industrial wastewater (workshop and wastewater from the mine) should be properly collected, treated so as to confirm to the standards prescribed under GSR 422 (E) dated 19 th May, 1993 and 31 st December, 1993 or as amended from time to time. Oil and grease trap shall be installed before discharge of workshop effluents.	external environmental agency.Compiled data for the period April 2024
ix.	Personal working in dusty areas shall wear protective respiratory devices and they shall also be provided with adequate training and information on	Being complied. Personal Protective Equipment are being provided to the personnel working in dusty

S.No.	Condition	Compliance Status
	safety and health aspects.	on safety and health aspects are being
		provided as part of Mines Vocational Training.
x.	Occupational health surveillance programme of the workers shall be undertaken periodically to observe any contractions due to exposure to dust and take corrective measures, if needed.	 Occupational health surveillance programme is taken up periodically and records are being maintained. Corrective measures will be taken to the contractions due to exposures of dust, if needed. A full-fledged Occupational Health Centre with a qualified Occupational Health Specialist with supporting staff is established with the following facilities: X-ray ECG Spirometry (lung function test) Audiometry Semi-auto analyser to carryout biochemical tests Clinical lab for micro-biological tests (including sputum test) Checking colour blindness Dental chair Ambulance
xi.	A separate environmental management cell with suitable qualified personnel shall be set-up under the control of a Senior Executive, who will report directly to the Head of the organization.	Being complied. Environment management cell is established with qualified personnel to look after the environment management related activities and is reporting to Head of the Unit of the company. The organization chart is enclosed as Annexure - V.
. xiv.	The project authorities shall inform to the RO located at Bangalore regarding date of financial closures and final approval of the project by the concerned authorities and the date of start of land development work.	Complied. Date of financial closure for this project is not required as the total funding for this project is from our own funds. The same is informed to the RO on 02.06.2007.
xìii.	The funds earmarked for environmental protection measures shall be kept in separate account and should not be diverted for other purposes. Year-wise expenditure shall be reported to the Ministry and its RO located at Bangalore.	 Being complied. The funds earmarked for environment protection are not diverted for other purposes. The details of environmental protection expenditure along with funds allotted for the next financial year are being submitted to the Ministry along with half-yearly compliance reports regularly. Being complied.
XV.	The RO of this Ministry located at	Being combined.

S.No.	Condition	Compliance Status
	Bangalore shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer(s) of the RO by furnishing the requisite data / information / monitoring reports.	 The copy of this half-yearly compliance report is mailed to eccompliance-ap@gov.in, vide Notice from MoEF&CC, Chennai dated 13.08.2019. The same is also uploaded in PARIVESH portal. Necessary co-operation along with relevant data is being provided.
xvi.	A copy of clearance letter will be marked to concerned Panchayat / local NGO. If any, from whom suggestion / representation has been received while processing the proposal.	Noted.
xvii.	SPCB should display a copy of the clearance letter at RO, district industries centre and Collector's Office / Tahsildar's office for 30 days.	Noted.
xviii.	The project authorities should advertise at least in two local newspapers widely circulated, one of which shall be in vernacular language of the locality concerned, within 7 days of the issue of the clearance letter informing that the project has been accorded environmental clearance and a copy of the clearance letter is available with the SPCB and also at website of the MOEF at http://envor.nic.in and a copy of the same shall be forwarded to the RO of this Ministry located Bangalore.	Complied. Advertised in "Eenadu" Telugu daily on 15.06.2007 & "The Hindu" English daily on 14.06.2007 and a copy of the same is forwarded to RO, Bangalore vide Lr. No. MCL/Mines/South Band/501 dt. 19.06.2007.

Annexure-

THE RAMCO CEMENTS LIMITED, KSR NAGAR JAYANTHIPURAM LIMESTONE MINE (SOUTH BAND) FUGITIVE EMISSION DATA - SPM CONCENTRATION

PERIOD - April 2024 to September 2024

			Month	nth		
Location	April 2024	May 2024	June 2024	July 2024	August 2024	September 2024
Quarry Edge	132	148	172	131	122	137
Drilling Arrea	139	146	163	114	141	155
Loading Area	148	155	182	128	137	140
Haul Road (Near Jaggaiahpet - Vedadri Road Junction)	151	168	171	109	129	168

Note: All values are mentioned in µg/m³

THE RAMCO CEMENTS LIMITED, KSR NAGAR JAYANTHIPURAM LIMESTONE MINE (SOUTH BAND) AMBIENT AIR QUALITY MONITORING DATA - CORE ZONE

PERIOD - April 2024 to September 2024

			LIB	100	60	80	80	2000	100	90	80	80	2000	100	09	80	80	2000	100	09	80	80	2000
	September 2024	II FORT	NIGHT	48.6	19.6	12.6	15.3	426	50.2	20.2	13,9	17.0	438	47.3	19.3	12.1	15.0	429	50.8	20.6	14.8	17.6	442
	Septem	I FORT	NIGHT	54.1	21.9	14.6	16.9	498	49.2	20.0	15.9	18.6	512	52.3	21.4	14.3	16.9	474	48.4	19.7	15.1	18.0	482
	August 2024	II FORT	NIGHI	49.3	19.9	13.9	16.6	438	53.2	21.4	14.2	17.3	412	51.2	20.9	13.7	16.6	439	52.9	21.2	14.2	17.0	436
	Augus	I FORT	NIGHT	52.9	21.4	13.5	15.8	512	48.3	19.7	16.2	18.9	534	50.6	20.7	14.1	16.7	489	45.3	18.4	13.1	16.0	496
	2024	II FORT	NIGHT	53.8	21.7	15.1	17.8	426	52.6	21.2	13.9	17.0	439	50.1	20.4	12.6	15.5	421	53.4	21.7	13.8	16.6	401
	July 2	I FORT	NIGHT	53.2	21.5	13.2	15.5	484	50.6	20.6	15.1	17.8	423	52.9	21.7	13.9	16.5	472	48.6	19.8	12.4	15.3	426
Month	2024	II FORT	NIGHT	65.1	26.3	19.2	21.9	639	63.5	25.6	23.5	26.6	969	69.2	28.2	21.4	24.3	571	56.2	22.8	24.2	27.0	638
	June	I FORT	NIGHT	64.8	26.2	17.3	19.6	989	63.5	25.8	19.2	21.9	638	64.8	26.6	18.4	21.0	615	67.3	27.4	21.2	24.1	672
	2024	II FORT	NIGHT	63.8	25.8	17.3	20.0	612	65.2	26.3	21.4	24.5	589	65.3	26.6	20.2	23.1	569	58.9	23.9	23.5	26.3	642
	May 2	I FORT	NIGHT	63.8	25.8	16.4	18.7	589	64.6	26.3	18.9	21.6	623	67.3	27.6	16.3	18.9	635	65.1	26.5	20.4	23.3	629
	2024	II FORT	NIGHT	62.3	25.2	16.6	19.3	589	61.4	24.7	19.3	22.4	563	63.9	26.1	19.2	22.1	296	56.2	22.8	21.4	24.2	628
	April 2024	I FORT	NIGHT	61.9	25.0	15.2	17.5	551	63.5	25.8	16.3	19.0	613	65.1	26.7	15.4	18.0	979	63.2	25.7	18.2	21.1	651
			Parameter	PM 10	PM 2.5	SO ₂	NOx	8	PM 10	PM 2.5	SO ₂	NOx	00	PM 10	PM 2.5	502	NOx	00	PM 10	PM 2.5	SO ₂	NO _x	8
		1	Location			Mines office					Pump House					Haul Road					RSMS Camp		

Note: All values are mentioned in µg/m³

THE RAMCO CEMENTS LIMITED, KSR NAGAR AMBIENT AIR QUALITY MONITORING DATA - BUFFER ZONE VILLAGES PERIOD - April 2024 to September 2024

							Mont	h						
Location	Parameter	April	2024	May	2024	June	2024		2024	Augus	t 2024	Septemb	per 2024	Limi <i>l</i> -
		I FORT NIGHT	II FORT NIGHT											
	PM 10	59.7	63.6	58.3	65.6	62.6	68.3	51.3	49.6	49.2	51.2	48.2	53.1	100
D1	PM 2.5	24.2	25.6	23.7	26.4	25.4	27.5	20.8	20.0	20.0	20.6	19.6	21.4	60
Dharmavarapupadu Tanda	SO₂	16.1	15.3	16.8	16.2	153	17.8	10.6	9.6	12.3	10.6	10.6	11.4	80
	NO _X	18.7	18.0	19.4	18.9	17.9	20.5	13.2	12.3	14.9	13.3	13.2	14.1	80
	со	292.0	221.0	299.0	232.0	312.0	241.0	296,0	241.0	301.0	162.0	296.0	150.0	200()
	PM 10	63.9	62.9	65.2	63.6	68.3	70.2	49.6	50.3	50.6	53.6	51.2	52.4	100
	PM 2.5	25.6	25.7	26.1	25.9	27.4	28.6	19.9	20.5	20.3	21.9	20.5	21,4	60
Jayanthipuram	SO₂	16.9	16.2	17.3	16.3	18.3	18.3	12.3	12.3	13.1	12.3	12.9	13.5	80
	NO _x	19.8	19.1	20.2	19.2	21,2	21.2	15.2	15.2	16.0	15.2	15.8	16.4	80
	co	281.0	241.0	296.0	248.0	286.0	252.0	13.8	252.0	326.0	154.0	324.0	149.0	2000
	PM 10	62.6	58.6	65.1	60.3	67.9	66.1	42.3	48.4	49.8	49.6	48.3	48.3	100
	PM 2.5	25.3	23.7	26.3	24.4	27.4	26.8	17.1	19.6	20.1	20.1	19.5	19.6	60
Chillakallu	SO ₂	14.3	20.2	15.2	21.2	19.6	17.2	11.1	11.6	12.6	11.6	11.6	11.9	80
	NO _x	17.0	23.3	17.9	24.3	22.3	20.3	13.8	14.7	15.3	14.7	14.3	15.0	80
	со	274.0	216.0	281,0	226.0	274.0	239.0	291	239.0	310	263.0	318.0	242.0	2000
	PM 10	62.8	55.2	63.9	58.9	65.1	59.3	50.4	52.6	50.3	52.8	52.4	50.4	100
	PM 2.5	25.3	22.5	25.8	24.0	26.2	24.2	20.3	21.5	20.3	21.5	21.1	20.6	60
K.Agraharam Village	SO₂	15.4	21.4	16,3	22.3	18.4	19.1	10.9	13.1	12.9	12.9	10.8	12.4	80
	NO _x	18.5	23.8	19,4	24.7	21.5	21.5	14	15.0	16	15.3	13.9	14.8	80
	со	261.0	244.0	269.0	245	301.0	255.0	274	255.0	336	149.0	326.0	151.0	2000
	PM 10	66.1	58.3	68.4	56,2	72.3	58.2	50.9	50.3	52.6	48.2	51.6	49.3	100
	PM 2.5	27.2	23.6	28.1	22.7	29.7	23.5	20.9	20.3	21.6	19.5	21.2	19.9	60
Jaggayyapet	SO₂	16.2	19.2	15.9	21.4	17.1	22.3	10.7	10.2	13.2	10.6	12.6	11.6	80
	NO _X	18.6	22.2	18.3	24.4	19.5	25.3	13.1	13.2	15.6	13.6	15.0	14.6	80
	CO	268.0	212.0	288.0	232.0	293.0	248.0	256.0	248.0	324	254.0	313.0	248.0	200()
	PM 10	65.2	61.4	66.3	63.1	62.9	62.1	47,3	49.8	43.8	50.6	45.9	48.4	100
	PM 2.5	25.8	25.2	26.2	25.9	24.8	25.5	18.7	20.5	17.3	20.8	18.1	19.9	60
Budawada	SO₂	16.6	16.3	17.2	17.3	17.9	18.4	10.1	9.8	12.6	12.8	10.3	12.3	80
***************************************	NO _X	19.4	18.9	20.0	19.9	20.7	21.0	12.9	12.4	15.4	15.4	13.1	14.9	80
	со	284.0	239.0	291.0	249	312.0	255.0	63.0	255.0	309	216.0	302.0	218.0	<u>200(</u>)
	PM 10	63.9	67.2	64.6	69.2	69.1	68.3	45.6	51.6	46.9	51.3	44.3	50.6	100
	PM 2.5	26.1	26.7	26.4	27.5	28.2	27.2	18.6	20.5	19.1	20.4	18.1	20.1	60
Vedadri	SO₂	16.1	18.4	16.9	19.2	15,4	21.4	10.2	12.4	11.9	12.1	11.4	11.9	80
	NO _X	18.4	21.2	19.2	22	17.7	24.2	12.0	15.2	14	14.9	13.7	14.7	80
	co	277.0	259.0	283.0	262	287.0	274.0	242.0	274.0	256	281.0	289.0	274.0	2000
	PM 10	61.6	59.1	67.2	61.2	63.2	59.6	43.8	47.3	45.2	49.2	42.9	47.3	100
**************************************	PM 2.5	25.2	24.0	27 <i>.</i> 5	24.8	25.8	24.2	17.9	19.2	18.5	20.0	17.5	19.2	60
Pochampalli	SO ₂	16.2	17.1	17.3	18.9	16.2	17.3	12.3	10.6	13.6	12.4	12.9	12.6	<u>80</u>
-	NO _x	19.1	19.4	20.2	21,2	19.1	19.6	15.2	12.9	16.5	14.7	15.8	14.9	80
	co	273.0	256.0	292.0	259	263.0	263.0	258.0	263.0	263	288.0	274.0	279.0	2000
-	PM 10	62.8	58.4	66.9	62.3	70.6	65.2	42.9	45.2	43.6	47.8	41.7	45.6	100
nantual-	PM 2.5	25.6	23.8	27.2	25.4	28.7	26.6	17.5	18.4	17.7	19.5	17.0	18.6	60
Ravirala	SO ₂	16.9	16.9	17.8	17.4	16.0	18.2	11.1	12.2	12.8	13.2	13.5	11.1	80
	NOx	19.9	19.8	20.8	20.3	19.0	21.1	14.1	15.1	15.8	16.1	16.5	14.0	80
	CO	312.0	274.0	333.0	283	274.0	291.0	212.0	291.0	258	299	261	283.0	2000

Note: All values are mentioned in $\mu g/m^3$

Annexure-

NOISE LEVEL MONITORING - JAYANTHIPURAM LIMESTONE MINE (SOUTH BAND) THE RAMCO CEMENTS LIMITED, KSR NAGAR PERIOD - April 2024 to September 2024

	() () () () () () () () () ()			Noise Va	Noise Value dB(A)	
Si. Ro	monitoring	Machine / Location	Day time (6AM to 10PM)	Permissible Limit dB(A)	Night time (10PM to 6AM)	Permissible Limit dB(A)
 1	28.09.2024	Drilling area	72.3	< 75	61.93	< 70
2	28.09.2024	Loading area	71.9	< 75	62.7	< 70
3	28.09.2024	Haul road	71.7	< 75	61.8	< 70
4	28.09.2024	Unloading area	71.4	< 75	61.6	< 70
2	28.09.2024	Mines office	52.2	< 75	38.3	< 70
9	28.09.2024	Dump Yard	53.8	< 75	53.6	< 70
7	28.09.2024	RSMS Camp	63,9	< 75	53.8	< 70
8	28.09.2024	R&B road	70.2	< 75	54.2	< 70
6	28.09.2024	Pump House	63.7	< 75	52.9	< 70
10	28.09.2024	SB Bund Area	52.1	< 75	47.3	< 70









ISO 9001 ISO 14001 ISO 45001 ISO 50001 Certified Company Jaggayyapet Mandal, Krishna District, Andhra Pradesh, India Phone: 08654 224400-04 Fax: 08654 222352

Kumarasamy Raja Nagar - 521457

E-mail: mclpm@ramcocements.co.in

THE RAMCO CEMENTS LIMITED

RCL/CGWB/JPMSB-239/280

Dt. 26.11.2024

Central Ground Water Board, 3-6-291, GSI Post, Bandlaguda, HYDERABAD - 500 068.

Dear Sir,

Sub: Submission of water level data & ground water quality data for Environmental Clearances for Jayanthipuram Limestone Mine (South Band) for the period from April 2024 to September 2024 – Reg.

Ref: 1. EC Lr. No. SEIAA/AP/MIN/KRI/8/2019/1219/167.76&164.67 dated 26.10.2021.

2, EC Lr. No. J-11015/378/2006-IA.II (M) dated 08.06.2007.

This has reference to the above cited Environmental Clearance letters for our Jayanthipuram Limestone Mine (South Band).

We herewith enclose the water level data measured by piezometers & ground water quality data as part of half-yearly compliance for Environmental Clearance for this Mining Lease located at Jaggayyapet Mandal, NTR (previously Krishna) District, Andhra Pradesh for the period from April 2024 to September 2024.

This is for your kind information and perusal please.

Thanking you,

Yours faithfully,

for The Ramco Cements Limited,

(Formerly known as Madras Cements Ltd.)

ASHISH KUMAR SRIVASTAVA

President (Mfg.)

Encl.: As above.

THE RAMCO CEMENTS LIMITED WATER LEVEL DATA - JAYANTHIPURAM LIMESTONE MINE (SOUTH BAND) PERIOD - April 2024 to September 2024

1.PIEZOMETER DETAILS: Bore Well

Location: West Side Bore Well,

Near Substation RL - (+)36.00m

Latitude - N16⁰ 51' 32.4" Longitude - E80⁰ 06' 36.0"

Depth of well - 35.05 m

S. No.	Date of Monitoring	Water Level (m), bgl
1	16.04.2024	13.02
2	30.04.2024	12.56
3	16.05.2024	12.08
4	31.05.2024	11.58
5	16.06.2024	10.92
6	30.06.2024	10.73
7	16.07.2024	10.46
8	31.07.2024	9.78
9	16.08.2024	7.92
10	31.08.2024	6.23
11	16.09.2024	6.40
12	29.09.2024	6.42

2.PIEZOMETER DETAILS: Bore Well

Location: North Side of ML, SB Office Road

RL - (+)37.00m

Latitude - N 16 51 29.0 Longitude - E 80 06 44.3 Depth of well - 50.00 m

'nchri oi	Well 30,00 III	
S. No.	Date of Monitoring	Water Level (m), bgl
1	16.04.2024	12.90
2	30.04.2024	13.01
3	16.05.2024	12.87
4	31.05.2024	12.99
5	16.06.2024	12.76
6	30.06.2024	11.98
7	16.07.2024	11.57
8	31.07.2024	10.02
9	16.08.2024	9.15
10	31.08.2024	6.18
11	16.09.2024	6.30
12	29.09.2024	6.34

3.PIEZOMETER DETAILS: Bore Well

Location: South Side of ML

RL - (+)43.20m

Latitude - N 16 51 02.8 Longitude - E 80 06 22.3 Depth of well - 27.44 m

S. No.	Date of Monitoring	Water Level (m), bgl
1	16.04.2024	7.84
2	30.04.2024	7.97
3	16.05.2024	7.25
4	31.05.2024	6.89
5	16.06.2024	6.76
6	30.06.2024	6.58
7	16.07.2024	6.41
8	31.07.2024	5.89
9	16.08.2024	4.76
10	31.08.2024	3.85
11	16.09.2024	3.77
12	29.09.2024	3.75

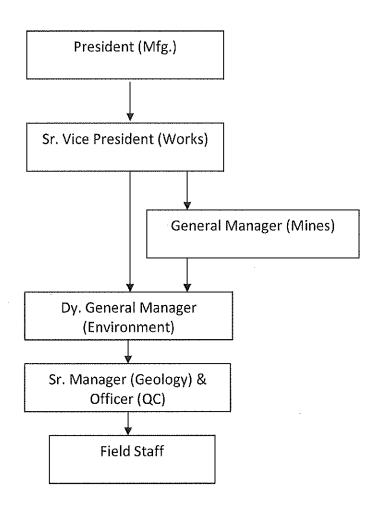
THE RAMCO CEMENTS LIMITED, KSR NAGAR GROUND WATER QUALITY DATA - SURROUNDING VILLAGES PERIOD - April 2024 to September 2024

5. Na	Parameter	Unit	Dharmavarapadu Thondo Bore Well Water:April-24 to June-24	Chillakallu Open Well Water: April- 24 to June-24	K.Agraharam Bore Well Water: April- 24 to June-24	Pochampalli Bore Well Water: April-24 to Jung-24	Jayanthipuram Bore Well Water:April-24 to June-24	Ravirala Bore Well Water: April- 24 to June- 24	Vedadri Bore Well Water; April-24 to June-24	Bore Well Water: April-	Jaggayyapet Bore Well Water:April-24 to June-24	Limits
			WI	W2	W3	W4	W5	W6	W7	W8	W9	
1	p ^H		7.68	7.76	7,49	7.81	7,78	7,61	7.58	756.00	7.81	6,5 - 8.5
2	Colour	Hazen	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2,0	<2.0	<2.0	5-15
3	Temperature	°c	28.8	28.1	27.3	29,6	29,0	28,1	27.3	29.1	31.2	**
4	Turbidity	NTU	1.2	1.4	1.3	1.8	1.6	1.9	1.3	1,1	2,0	1-5
5	Residiral Chloride	mg/L	<1.0	-t,0	<1.0	<0.1	<0.1	<0.1	<0.1	<0.1	<0,1	0,2-1
6	Dissolved Oxygen	mg/L	4,1	4.9	4.6	4,8	4.3	4.1	4.2	4,5	4,7	**
7	Total Suspended Solids	mg/L	32,4	29.£	33.8	24.5	28.2	34.3	28.6	30.2	34.3	••
8	Electrical Conductivity	µmhos/cm	812	876	948	792	781	872	802	839	826	
9	Total Dissolved Solids	nig/L	553	559	536	496	448	449	446	453	464	500-2000
10	Total Hardness (as CaCO ₁)	mg/L	256	278	321	191	198	239	204	216	248	200-600
11	Calcium Hardness	mg/£	151	158	153	121	161	163	151	164	171	
12	Magnesium Hardness	0	126.0	139.0	141.0	132.0	42,6	64,3	52,6	41,9	73,2	**
13	Calcium (as Ca)	mg/L	55,3	65.9	68,3	49.1	52.0	53,9	56.1	54,6	48.4	75-200
14	Magnesium (as Mg)	mg/L	36.2	23.8	25.6	25,8	35.3	19,2	26.2	28.3	24.6	30-100
15	Sodium (as Na)	mg/L	48.3	47.1	S2.3	39.2	57.2	48.3	48.9	42.6	33.6	-
16	Potassium (as K)	mg/L	1.6	4.9	7.1	1,8	3,9	4.1	5.7	3.6	3.L	-
17	Chloride (as Ci)	mg/L	153.0	152,0	159.0	127.0	171.0	153.0	161,0	152,0	131.0	250-1000
18	Sulphate (as SO ₄₎	nig/L	38.6	46.9	44.1	38,4	48.6	36.2	35.3	38.9	33.6	200-400
19	Total Alkalinity (as CaCO3)	mg/L	145,0	148,0	121,0	130.0	139.0	142,0	112.0	106,0	103,0	200-600
20	BOD (for 3 days at 27 ^o C)	mg/L	<4,0	<4.0	<4.0	<4.0	<4.0	<4.0	<4.0	<4.0	<4.0	• •
21	Chemical Oxygen Demand	mg/t	17.2	25.3	35.2	18.3	23.6	24.8	26.9	23.8	22.7	
22	Oif & Grease	mg/L	<1.0	<1.0	<1.0	<0,1	<0.1	<0.1	< 0.1	<0.1	<0.1	
23	Iron (as Fe)	mg/L	0.26	0,31	0.28	0.07	0.24	0,09	0.18	0.11	0.05	0.3
24	Fluoride (as F)	mg/L	0.32	0.29	0.26	0.38	0.48	0.31	0,21	0,32	0.29	1.0-1.5
25	Nitrate (as NO ₃₎	mg/L	0.87	1,46	88,0	0.46	0.58	0.68	0.61	0.28	0.31	45
26	Phosphates (as PO ₄₎	mg/L	<0.01	<0.01	<0.01	<0.01	<0.01	<0,01	<0.01	< 0.01	<0.01	• •
27	Cyanide (as CN)	mg/L	<0,01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	
28	Pesticides (as Malathoin)	mg/L	<0.01	<0.01	<0.0£	<0.01	<0.01	10.0>	<0.01	<0.01	<0.01	
29	Phenolic Compounds (as C ₆ H ₂ OH)	mg/L	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	
30	Marganese (as Mn)	mg/L	<0.01	<0.01	<0.01	<0,01	<0.01	<0.01	<0.01	<0.01	<0.01	**
31	Chromium (as Cr*6)	mg/t	<0.01	<0.01	<0.01	<0.01	<0,01	<0.01	<0.01	<0.01	<0.01	
32	Copper (as Cu)	mg/L	<0.01	<0.01	<0,61	<0.01	<0.01	<0.01	<0.01	<0.01	<0,01	1.5
33	Selenium as Se	mg/L	<0.01	<0,01	<0.01	<0.01	<0.01	<0,01	<0.01	<0.01	<0.01	
34	Aluminium (as Al)	mg/L	<0.01	<0.01	<0,01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	7-
_	Cadmium (as Cd)	mg/L	<0.01	<0.01	<0,01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	~~
36	Arsenic as As	nig/L	<0,01	10.0>	<0.01	<0,01	<0.01	<0.01	<0.01	<0.01	<0.01	0.05-0.2
37	Boron (as B)	mg/L	<0.01	<0,01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	2
38	Mercory (as Hg)	mg/L	<0,001	<0.001	<0.001	100.0>	<0.001	<0.001	<0.001	<0.001	<0.001	
39	Lead (as Pb)	mg/L	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0,01	<0.01	<0.01	0.1
40	Zinc (as Zn)	ຄາg/L	<0,01	<0.01	<0.01	<0.01	<0.01	<0.01	<0,01	<0.01	<0.01	1.5 - 15
41	Percent Sodium	%	46,8	47.9	39.1	38.6	48.6	43.9	38.6	37.8	41,2	-
42	Total Coliforms	MPN/100 mL	NII	NII.	MI	NH	lin	Nil	litri	Nil	NO	50-5000
43	Faecal Coliforms	MPN/100 mL	NIÍ	MI	MI	NII	Nii	NII	lin	1411	NII	-
44	E.Coll	MPN/100 mL	Absent	Absent	Absent	Absent	Absent	Absent	Absent	Absent	Absent	

THE RAMCO CEMENTS LIMITED, KSR NAGAR GROUND WATER QUALITY DATA - SURROUNDING VILLAGES PERIOD - April 2024 to September 2024

				Chillakallu	K,Agraharam	Pochampalli	Jayanthipuram			Budawada	Jaggayyapet	
S. No	Parameter	Unit	Dharmavarapadu Thanda Bore Weil Water; July-2024to Sep-2024	Open Well	Bore Well Water: July- 2024 to Sep- 2024	Bore Well Water: July- 2024 to Sep- 2024	Bore Well Water: July- 2024 to Sep- 2024	Raviraia Bore Well Water: July-2024 to Sep-2024	Vedadri Bora Well Water: July-2024 to Sep-2024	Bore Well Water: July- 2024 to Sep- 2024	Bore Well Water: July- 2024 to Sep- 2024	Limits
			W1	W2	EW.	W4	₩5	W6	W7	wa	W9	
1	PH	*	7,78	7.53	7.59	7.46	7.61	7,98	7,67	7.68	7.83	6.5 - 8,5
2	Colour	Hazen	<2.0	<2.0	<2,0	<2.0	<2,0	<2.0	<2.0	<2.0	<2.0	5-15
3	Temperature	<u>°c</u>	28.9	27.6	26,8	28.3	28,6	27,3	29.6	28,8	27.6	**
4	Turbidity	UTN	1.3	1.5	1.1	1,6	1.9	1.6	1,3	1.1	1.5	1-5
5	Residual Chloride	mg/L	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	0.2-1
6	Dissolved Oxygen	ntg/L	4,2	4.9	4,8	4.6	5.4	1,6	5,8	4.7	4.9	
7	Total Suspended Solids	mg/L	28.9	26,1	27.3	25.8	29.3	32.6	37.3	37.8	36.4	
8	Electrical Conductivity	pmhos/cm	912.0	889.0	951,0	926.0	942,0	816.0	936.0	938	796.0	
9	Total Dissolved Solids	mg/L	552.0	563.0	571.0	489.0	572.0	581.0	539.0	582.0	546.0	500-2000
10	Total Hardness (as CaCO ₂)	mg/L	252.0	283.0	286,0	214.0	321.0	291.0	283.0	246.0	278.0	200-600
11	Calcium Hardness	mg/L	148.0	149.0	138.0	126.0	189.0	143.0	168.0	145.0	135,0	*-
12	Magnesium Hardness	n\g/L	107.0	115.0	136,0	151.0	129.0	118.0	136.0	139.0	128.0	
13	Calcium (as Ca)	mg/L	55.6	65.2	63.1	55,1	56,2	53,9	53,7	58.3	47.1	75-200
14	Magnesium (as Mg)	mg/L	35.2	28.3	26.4	26,9	33,6	18,3	27.1	29.2	25,1	30-100
15	Sodkum (as Na)	mg/t.	44.2	41.6	48.J	39,6	57,3	45,2	49.1	48.2	36,8	
16	Potassium (as K)	mg/t	1,6	4.1	7.9	1.9	2.8	3.1	S,4	3,8	2.7	-
17	Chloride (as Cl)	mg/L	153.0	174.0	145.0	138.0	179.0	142.0	158.0	151.0	139,0	250-1000
18	Sulphate (as 504)	mg/L	37,2	39.3	42.6	39,1	44,6	38.9	37.1	38,3	36.1	200-400
19	Total Alkalinity (as CaCO ₃)	mg/L	136.0	128.0	109.0	124.0	131,0	137.0	132.0	139,0	99.2	200-600
20	BOD (for 3 days at 27 ^o C)	mg/l.	<4.0	<4.0	<4.0	<4.0	<4.0	<4.0	<4.0	<4.0	<4.0	
21	Chemical Oxygen Demand	mg/l.	19.1	24.3	27.3	23.6	22.9	23,6	19.1	17.2	17,1	
22	Oil & Grease	mg/L	<0.1	1.0>	4,0>	<0,1	<0.1	<0,1	<0,1	<0.1	<0.1	
23	Iron (as Fe)	mg/L	0.2	0.28	0.3	0.1	0,1	0.04	0.19	0.17	0.08	0.3
24	Fluoride (as F)	mg/t,	0.23	0.25	0,34	0.23	0.21	0.21	0,34	0.29	0.31	1.0-1.5
25	Mitrate (as NO ₃₎	mg/L	0.72	1,29	0.71	0.47	0.51	0,61	0.66	0,39	0.48	45
26	Phosphates (as PO4)	mg/L	<0.01	<0.01	¥0.01	<0.01	<0.01	<0.01	<0,01	10,0>	<0.01	
27	Cyanide (as CN)	mg/L	<0.01	<0.01	10.0>	<0.01	<0.01	< 0.01	<0.01	10.0>	<0.01	**
28	Pesticides (as Malathoin)	mg/L	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	
29	Phenulic Compounds (as C ₆ H ₅ Ol	mg/t.	<0.01	<0.01	<0.01	10,0>	<0.01	<0.01	<0.01	<0.01	<0.01	
30	Manganese (as Mn)	mg/L	<0.01	< 0.01	<0.01	10,0>	<0.01	10.0>	<0.01	<0.01	<0.01	
31	Chromium (as Cr ⁺⁶⁾	mg/L	<0.01	<0.01	<0.01	10,0>	<0.01	<0.01	<0.01	<0.01	<0.01	4.0
32	Copper (as Cu)	nig/L	< 0.01	<0.01	10.0>	< 0.01	<0,01	<0.01	<0.01	<0.01	<0.01	1,5
33	Selenium as Se	mg/L	<0.01	<0.0t	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	
34	Aluminium (as Af)	mg/L	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	**
35	Cadmium (as Cd)	mg/L	<0.01	<0.01	<0.01	< 0.01	<0.01	<0.01	<0.01	<0.01	<0.01	**
36	Arsenic as As	mg/L	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	0.05-0.2
37	Boron (as B)	mg/L	<0.01	<0.01	<0,01	<0.01	<0,01	<0.01	<0.01	<0.01	<0.01	2
38	Mercury (as Rg)	mg/L	<0.001	<0.001	<0.001	<0.001	<0.00 F	<0.001	<0.001	100.0>	<0.001	**
39	Lead (as Pb)	mg/L	< 0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	. <0,01	0.1
40	Zinc (as Zn)	mg/L	<0.01	<0,01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0,01	1.5 - 15
41	Percent Sadium	%b	48.20	43,70	38,60	35,10	47.50	43.60	41,80	36.20	39.90	-
42	Total Coliforms	MPN/100 mL	Absent	Absent	Absent	Absent	Absent	Absent	Absent	Absent	Absent	50-5000
43	Faecal Coliforms	MPN/100 mL	Absent	Absent	Absent	Absent	Absent	Λb≤eŋt	Absent	Absent	Absent	-
44	E,Coll	MPN/100 mL	Absent	Absent	Absent	Absent	Absent	Absent	Absent	Absent	Absent	-
14	#Y-ON	WANT TOO IUT	Absent	Absent	Absent	Ausent	Absent	Absent	Absent	Absent	Absent	

THE RAMCO CEMENTS LIMITED, KSR NAGAR ORGANIZATIONAL CHART OF ENVIRONMENTAL CELL



THE RAMCO CEMENTS LIMITED, KSR NAGAR AUTO GARAGE OIL & GREASE TRAP OUTLET WATER QUALITY DATA PERIOD - April 2024 to September 2024

						Month				
s. Ro	S. No Parameter	Unit	April 2024	May 2024	June 2024	July 2024	August 2024	April 2024 May 2024 June 2024 July 2024 August 2024 September 2024	Range / Average	Norm
_	- A		7.88	7.79	7.83	7.98	7.48	7.52	7.52 - 7.98 5.5 - 9.0	5.5 - 9.0
2	2 Total Dissolved Solids	mg/L	823	856	891	978	952	911	902	2100
3	3 Total Suspended Solids	mg/L	9:02	73.6	75.3	9.07	73.6	70.2	72.3	100
4	4 Chemical Oxygen Demand mg/L	mg/L	123	131	148	139	126	118	131	250
5	5 BOD (for 3 days at 27 ⁰ C)	mg/L	43.9	45.2	42.3	40.6	42.3	43.6	42.98	100
9	6 Oil & Grease	mg/L	2.4	2.8	2.2	1.3	7	1.7	1.97	10

THE RAMCO CEMENTS LIMITED, KSR NAGAR JAYANTHIPURAM LIMESTONE MINE (SOUTH BAND) MINE DISCHARGE WATER QUALITY DATA PERIOD - April 2024 to September 2024

						Month	4		
S. No	Parameter	Unit	April 2024	May 2024	June 2024	July 2024	August 2024	September 2024	Limits
н	нd		7.88	7.98	7.78	7.84	7.91	7.87	5.5 - 9.0
2	Total Suspended Solids	mg/L	65.3	6.99	67.3	9.69	73.8	72.6	100
ε	Total Dissolved Solids	mg/L	792	692	812	968	852	841	2100
4	Chlorides (as CI)	mg/L	151	158	163	171	166	160	1000
2	Sulphates (as SO ₄₎	mg/L	68.3	69.2	68.1	2'69	65.3	62.3	1000
9	BOD (for 3 days at 27 ^o C)	1/6m	< 4.0	< 4.0	< 4.0	< 4.0	< 4.0	< 4.0	30
2	Chemical Oxygen Demand	T/6m	18.20	19.30	18.60	19.20	18.20	19.10	250
8	Oil & Grease	mg/L	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	10
6	Iron (as Fe)	mg/L	0.51	0.48	0.54	0.48	0.53	0.57	3.0
10	Fluoride (as F)	mg/L	0.49	0.53	0.59	0.61	0.68	0.73	2.0