149th Meeting of State Expert Appraisal Committee (SEAC-1)

SEAC Meeting number: 149th Day-3 **Meeting Date** April 4, 2018

Subject: Environment Clearance for Proposed Expansion Project of M/s D.R. Coats Ink & Resins Pvt. Ltd., located at Plot No : L-30, Additional Mahad MIDC, Amshet Village, Mahad, District Raigad, Mahatashtra.

Is a Violation Case: No

1.Name of Project	D.R. Coats Ink & Resins Pvt. Ltd.
2.Type of institution	Private
3.Name of Project Proponent	Mr. Yashashvi Drolia
4.Name of Consultant	Sadekar Enviro Engineers Pvt Ltd.
5.Type of project	Not applicable
6.New project/expansion in existing project/modernization/diversification in existing project	Expansion for manufacturing of new products with existing resin blending activity.
7.If expansion/diversification, whether environmental clearance has been obtained for existing project	Environmental Clearance was not required , since company is engaged in formulation/blending of resins.
8.Location of the project	Plot No : L-30, Addl. Mahad MIDC
9.Taluka	Mahad
10.Village	Amshet
Correspondence Name:	Unit no. 203, New Sonal link industrial estate, Bld. No. 2, second floor, Link road, Malad (W), Mumbai-64
Room Number:	Unit no. 203
Floor:	second floor
Building Name:	New Sonal link industrial estate, Bld. No. 2
Road/Street Name:	Link road
Locality:	Malad (W)
City:	Mumbai-64
11.Area of the project	Addl. Mahad MIDC
12.IOD/IOA/Concession/Plan Approval Number	NA
	IOD/IOA/Concession/Plan Approval Number: NA
	Approved Built-up Area: 7090.39
13.Note on the initiated work (If applicable)	NA
14.LOI / NOC / IOD from MHADA/ Other approvals (If applicable)	NA
15.Total Plot Area (sq. m.)	16675 sq.m.
16.Deductions	Not applicable
17.Net Plot area	Not applicable
18 (a).Proposed Built-up Area (FSI & Non-FSI)	**a) FSI area (sq. m.):** Not applicable
	b) Non FSI area (sq. m.): Not applicable
	c) Total BUA area (sq. m.): 7090.39
18 (b).Approved Built up area as per DCR	**Approved FSI area (sq. m.):**
	Approved Non FSI area (sq. m.):
	Date of Approval:
19.Total ground coverage (m2)	Not applicable
20.Ground-coverage Percentage (%) (Note: Percentage of plot not open to sky)	Not applicable
21.Estimated cost of the project	33000000

22.Number of buildings & its configuration

Serial number	Building Name & number	Number of floors	Height of the building (Mtrs)
1	Not applicable	Not applicable	Not applicable

23.Number of tenants and shops	Not applicable
24.Number of expected residents / users	Not applicable
25.Tenant density per hectare	Not applicable
26.Height of the building(s)	
27.Right of way (Width of the road from the nearest fire station to the proposed building(s)	9 meters
28.Turning radius for easy access of fire tender movement from all around the building excluding the width for the plantation	Not applicable
29.Existing structure (s) if any	Not applicable
30.Details of the demolition with disposal (If applicable)	Not applicable

31.Production Details

Serial Number	Product	Existing (MT/M)	Proposed (MT/M)	Total (MT/M)
1	Resin (Blending)	630	490	1120
2	Polyamides Resins	0	1300	1300
3	Ketonic Resin	0	10	10
4	Phenolic Resin	0	300	300
5	Acrylic Resin	0	1000	1000
6	Polyster Resin	0	1000	1000
7	Amino Resin	0	300	300
8	Polyurethane	0	1500	1500
9	Rosin Esters	0	300	300
10	Alkyd Resin	0	600	600

32.Total Water Requirement

Dry season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Wet season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Details of Swimming pool (If any)	Not applicable	

33.Details of Total water consumed

Particulars	Consumption (CMD)			Loss (CMD)			Effluent (CMD)		
Water Requirement	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**
Domestic	1.98	1.17	3.15	0.4	0.23	0.63	1.58	0.94	2.52
Industrial Process	1	1	2	0	0	0	1	6.12	7.12
Cooling tower & thermopack	5.54	41.32	46.86	4.92	36.46	41.38	0.62	4.86	5.48
Gardening	0	27.5	27.5	0	27.5	27.5	0	0	0

34.Rain Water Harvesting (RWH)	**Level of the Ground water table:**	NA
	Size and no of RWH tank(s) and Quantity:	NA
	Location of the RWH tank(s):	NA
	Quantity of recharge pits:	NA
	Size of recharge pits :	NA
	Budgetary allocation (Capital cost) :	NA
	Budgetary allocation (O & M cost) :	NA
	Details of UGT tanks if any :	NA
35.Storm water drainage	**Natural water drainage pattern:**	Storm water drainage of adequate capacity will be provided
	Quantity of storm water:	10.35 M3/Hr
	Size of SWD:	The SWD will be designed as per the quantity of storm water expected to be received during rainy season
Sewage and Waste water	**Sewage generation in KLD:**	2.52
	STP technology:	Sewage from domestic activity will be treated in aeration tank of ETP.
	Capacity of STP (CMD):	NA
	Location & area of the STP:	NA
	Budgetary allocation (Capital cost):	NA
	Budgetary allocation (O & M cost):	NA

36.Solid waste Management

Waste generation in the Pre Construction and Construction phase:	**Waste generation:**	Construction waste such as left off concrete, stone, aggregates, wooden piles, excavation material etc.
	Disposal of the construction waste debris:	The solid waste genereated during construction phase will be disposed off through local body.
Waste generation in the operation Phase:	**Dry waste:**	Office waste such as paper and other domestic waste
	Wet waste:	NA
	Hazardous waste:	Chemical sludge from wastewater treatment : 1.45 MT/M, Used/ spent oil: 5 Kg/M, Discarded containers barrels/liners/ plastic bags/ PPE etc contaminated with hazardous chemicals /waste : 4800 Nos/M, Evaporation Residue from waste water treatment unit : 0.141 MT/D
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	NA
	Others if any:	E-Waste from office (as per Schedule 1 of E-waste management rule,2016) : 10 Kg/M, HDPE drums/Paper bags (Non-Contaminated) : 2000 Nos/M

Mode of Disposal of waste:	**Dry waste:**	Through local municipal waste disposal facility
	Wet waste:	NA
	Hazardous waste:	Chemical sludge from wastewater treatment & Evaporation Residue from waste water treatment unit will be disposed through CHWTSDF And Used/ spent oil, Discarded containers barrels/liners/ plastic bags/ PPE etc contaminated with hazardous chemicals /waste will be sold to MPCB authorized recycler
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	NA
	Others if any:	Sale to MPCB approved scrap dealer
Area requirement:	**Location(s):**	Dedicated area for storage of SHW is provided near to ETP
	Area for the storage of waste & other material:	20 sq.m.
	Area for machinery:	NA
Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	2 Lakh
	O & M cost:	10.4 Lakh

37.Effluent Charecterestics

Serial Number	Parameters	Unit	Inlet Effluent Charecterestics	Outlet Effluent Charecterestics	Effluent discharge standards (MPCB)
1	pH	-	4.5	6.5-7.5	6.5-7.5
2	COD	mg/l	15000	<250	<250
3	BOD	mg/l	6043	<100	<100
4	TDS	mg/l	1000	<1000	<2100
5	TSS	mg/l	200	<100	<100

Amount of effluent generation (CMD):	15.12 CMD
Capacity of the ETP:	30 CMD
Amount of treated effluent recycled :	It will be ZLD unit
Amount of water send to the CETP:	It will be ZLD unit
Membership of CETP (if require):	It will be ZLD unit
Note on ETP technology to be used	Company will utilized existing ETP of 30 CMD capacity, comprises of Primary,Secondary & Tertiary treatment facility. addition to this installation of RO and Evaporator system will be done to achieve complete ZLD
Disposal of the ETP sludge	Disposal of ETP sludge will be done through CHWTSDF

38.Hazardous Waste Details

Serial Number	Description	Cat	UOM	Existing	Proposed	Total	Method of Disposal
1	Chemical sludge from wastewater treatment	34.3	MT/M	0.2	1.25	1.45	Through CHWTSDF
2	Used/ spent oil	5.1	Kg/m	5	0	5	Through MPCB authorized recycler

3	Discarded containers barrels/liners/ plastic bags/ PPE etc contaminated with hazardous chemicals /waste	33.1	Nos/M	4800	0	4800	Through MPCB authorized recycler
4	Evaporation Residue from waste water treatment unit	37.3	MT/D	0	0.141	0.141	Through CHWTSDF
5	E-Waste from office	as per Schedule 1 of E-waste management rule,2016	Kg/M	0	10	10	Through MPCB approved vendor

39.Stacks emission Details

Serial Number	Section & units	Fuel Used with Quantity	Stack No.	Height from ground level (m)	Internal diameter (m)	Temp. of Exhaust Gases
1	Common stack attached to Boiler & Thermopack	FO	01	30	0.4	150 Deg C
2	Stack Attached to DG set	HSD	02	3 m above roof	0.1	190 Deg C
3	Stack attached to scrubber	-	03	11	0.1	35 Deg C

40.Details of Fuel to be used

Serial Number	Type of Fuel	Existing	Proposed	Total
1	FO	0.96 KLD	1.99 KLD	2.95 KLD
2	HSD	25 L/Hr	8 L/hr	33 L/Hr
41.Source of Fuel		Local Vendor		
42.Mode of Transportation of fuel to site		By Road		

43.Green Belt Development

Total RG area :	5502.75 sq.m.
No of trees to be cut :	NA
Number of trees to be planted :	786
List of proposed native trees :	Neolamarckia cadamba, Callicarpa tomentosa, Trema orientalis, Dalbergia sissoo, Azadirachta indica, Erythrina suberosa, Cassia fistula, Bombax ceiba, Asltonia shcolaris, Macaranga peltata, Schleichera oleosa, Microcos paniculata, Terminalia elliptica, Terminalia paniculata, Terminalia bellirica, Cordia dichotoma, Helicteres isora, Holoptelea integrifolia, Butea monosperma, Oroxylum indiccum,Erythrina suberosa, Azadiracta indica, Dalbergia sissoo, Trema orientalis, Callicarpa tomentosa, Neolamar
Timeline for completion of plantation :	1.5 year sAfter grant of Environmental Clearance

44.Number and list of trees species to be planted in the ground

Serial Number	Name of the plant	Common Name	Quantity	Characteristics & ecological importance

1	Cassia fistula	Bahava	19	Native ornamental tree having flowers attracting bees and butterflies
2	Bombax ceiba	Sawar	19	A native deciduous tree with fragrant flowers attracting large number of birds & insects
3	Asltonia shcolaris	Saptaparni	19	A native evergreen tree with fragrant flowers & leaves having comparatively higher dust settling index
4	Macaranga peltata	Chandwar	19	A native tree found in abundance across the plains of Sahyadri ranges
5	Schleichera oleosa	Kususm	19	A native deciduous trees of forest tracts of Sahyadri ranges
6	Microcos paniculata	Shirali	19	A native evergreen medium sized tree of forest tracts of Sahyadri ranges
7	Terminalia elliptica	Ain	19	A native evergreen tree of forest tracts of Sahyadri ranges
8	Terminalia paniculata	Kindal	19	A native deciduous tree of forest tracts of Sahyadri ranges
9	Terminalia bellirica	Baheda	19	A native deciduous tree of forest tracts of Sahyadri ranges
10	Cordia dichotoma	Shelu	19	A native deciduous tree of forest tracts of Sahyadri ranges attracting large number of insects
11	Helicteres isora	Murudsheng	19	A native deciduous medium sized tree of forest tracts of Sahyadri ranges visited by large number of birds
12	Helicteres isora	Murudsheng	19	A native deciduous medium sized tree of forest tracts of Sahyadri ranges visited by large number of birds
13	Holoptelea integrifolia	Ainasadada	19	A native deciduous tree of forest tracts of Sahyadri ranges
14	Butea monosperma	Palash	19	A native brilliantly flowering tree abundant the Palghar District visited by large number of birds
15	Oroxylum indiccum	Tetu	19	A native ornamental Tree
16	Erythrina suberosa	Pangara	19	A native deciduous medium sized tree of forest tracts of Sahyadri ranges visited by large number of birds
17	Azadiracta Indica	Kadulimb	19	A native evergreen tree capable of surviving in comparatively polluted environs
18	Dalbergia sissoo	Shisham	19	A native evergreen tree attracting large number of insects
19	Trema orientalis	Ghol	19	A native deciduous medium sized tree with hairy leaves having comparatively higher dust settling index

20	Callicarpa tomentosa	Aiser	19	A native evergreen medium sized tree of forest tracts of Sahyadri ranges with hairy thick leaves having comparatively higher dust settling index
45.Total quantity of plants on ground				

46.Number and list of shrubs and bushes species to be planted in the podium RG:

Serial Number	Name	C/C Distance	Area m2
1	NA	NA	NA

47.Energy

Power requirement:	**Source of power supply :**	MSEDCL
	During Construction Phase: (Demand Load)	50 KVA
	DG set as Power back-up during construction phase	200 KVA
	During Operation phase (Connected load):	135 KW
	During Operation phase (Demand load):	150 KVA
	Transformer:	135 KW
	DG set as Power back-up during operation phase:	200 KVA
	Fuel used:	HSD
	Details of high tension line passing through the plot if any:	NA

48.Energy saving by non-conventional method:

NA

49.Detail calculations & % of saving:

Serial Number	Energy Conservation Measures	Saving %
1	NA	NA

50.Details of pollution control Systems

Source	Existing pollution control system	Proposed to be installed
Process Emissions	NA, Since it is only blending process	1 nos scrubber of 1000 CFM capacity will be installed
Boiler & Thermopack	Stack of 21 meter height is provided	Common stack of 30 meters height will be provided
D.G. Set	3 m above roof	3 m above roof

Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	NA
	O & M cost:	NA

51.Environmental Management plan Budgetary Allocation

a) Construction phase (with Break-up):

Serial Number	Attributes	Parameter	Total Cost per annum (Rs. In Lacs)
1	Air Emission	Dust Suppression	1
2	Water Environment	Existing sanitation facilities will be utilized	0
3	Solid Hazardous waste	Handling, transportation and disposal of non hazardous solid waste	1
4	Noise Environment	PUC certified vehicles etc, PPE	0.5

b) Operation Phase (with Break-up):

Serial Number	Component	Description	Capital cost Rs. In Lacs	Operational and Maintenance cost (Rs. in Lacs/yr)
1	Air Environment	Construction of common stack of 30 meters and Installation of new scrubber	18	2.5
2	Noise Environment	Noise Pollution Control, Installation of anti-vibration pads, & Enclosures.	1.2	0.25
3	Water Environment	Up gradation of existing ETP by installation of RO & Evaporator for treatment of RO reject.	45	3
4	Environment Monitoring & Management	Quarterly Environment Monitoring	0	3.5
5	Occupational Health	Glares, Breathing Masks,Gloves, Boots, Helmets, Ear Plugs etc. & annual healthmedical checkup of workers	3	0.7
6	Green Belt	Installation of water drip , Greenbelt development and its maintenance	3.065	2.225
7	Solid Waste Management	Solid Waste Management	2	10.4

51.Storage of chemicals (inflamable/explosive/hazardous/toxic substances)

Description	Status	Location	Storage Capacity in MT	Maximum Quantity of Storage at any point of time in MT	Consumption / Month in MT	Source of Supply	Means of transportation
Dimer Acid	Liquid	Tanks	60	60	778	Local	By Road
Ethylenediamine	Liquid	Drums	7.5	7.5	186	Local	By Road
Diethylenetriamine	Liquid	Drums	7.5	7.5	186	Local	By Road
Tetraethylenepentamine	Liquid	Drums	7.5	7.5	186	Local	By Road
Triethylenetetramine	Liquid	Drums	7.5	7.5	186	Local	By Road
Fatty Acid	Liquid	Tank	30	30	240	Local	By Road
Cyclohexanone	Liquid	Drums	2	2	5	Local	By Road
Paraformaldehyde	Solid	Bags	8	8	95	Local	By Road
Phenol	Liquid	Tank	30	30	243.66	Local	By Road
Rosin	Liquid	Drums	25	25	289	Local	By Road
Bisphenol-A	Solid	Bags	1	1	15	Local	By Road
Maleic Anhydride	Solid	Bags	12	12	160.75	Local	By Road
Pentaerythritol	Solid	Bags	1	1	9	Local	By Road
Oxalic Acid	Solid	Bags	0.1	0.1	0.99	Local	By Road
Acrylates	Liquid	Drums	2.9	2.9	75	Local	By Road
Methyl Methacrylate	Liquid	Drums	2.9	2.9	75	Local	By Road
Butyl Acrylate Monomer	Liquid	Drums	2.9	2.9	75	Local	By Road
N-butyl Methacrylate	Liquid	Drums	2.9	2.9	75	Local	By Road
2-Hydroxyethyl Methacrylate	Liquid	Drums	2.9	2.9	75	Local	By Road
Ethyl Acrylate	Liquid	Drums	2.9	2.9	75	Local	By Road
Methacrylates	Liquid	Drums	2.9	2.9	75	Local	By Road
Styrene	Liquid	Tank	25	25	173	Local	By Road
Xylene	Liquid	Tank	50	50	170.13	Local	By Road
Toluene	Liquid	Tank	25	25	170.13	Local	By Road
Cellosolve Acetate	Liquid	Tank	30	30	80	Local	By Road
Butyl Acetate	Liquid	Tank	30	30	80	Local	By Road
Solvent Naphtha	Liquid	Tank	25	25	80	Local	By Road
Initiators	Liquid	Carboy	0.5	0.5	5	Local	By Road
Pthalic Anhydride	Solid	Bags	20.5	20.5	354.75	Local	By Road
Isophthalic acid	Solid	Bags	10	10	128.75	Local	By Road
Poly Acid	Liquid	Drums	13.5	13.5	191.75	Local	By Road
Mono Glycol	Liquid	Drums	10	10	66.66	Local	By Road
Di Glycol	Liquid	Drums	10	10	66.66	Local	By Road
Poly Glycol	Liquid	Drums	10	10	66.66	Local	By Road
Benzoic Acid	Solid	Bags	2	2	42	Local	By Road
Solvent CIX	Liquid	Tank	30	30	98	Local	By Road
Butyl Cellosolve	Liquid	Tank	30	30	98	Local	By Road
Butanol	Liquid	Tank	30	30	56.66	Local	By Road
Octanol	Liquid	Tank	30	30	56.66	Local	By Road
Methanol	Liquid	Tank	25	25	56.66	Local	By Road
Melamine	Solid	Bags	2.5	2.5	33	Local	By Road
Urea	Solid	Bags	2.5	2.5	33	Local	By Road

Epoxy Resins	Liquid	Drums	40	40	430	Local	By Road
Mineral Terpentine Oil	Liquid	Tank	50	50	90.13	Local	By Road
Benzyl Alcohol	Liquid	Drums	1	1	170	Local	By Road
C12-C14 / Ortho Cresol	Liquid	Drums	1	1	73.33	Local	By Road
Monoethylene Glycol	Liquid	Drums	8	8	180	Local	By Road
Diethylene Glycol	Liquid	Drums	8	8	180	Local	By Road
Terepthalic Acid	Liquid	Drums	8	8	180	Local	By Road
Adepic Acid	Liquid	Drums	8	8	180	Local	By Road
Methylene diphenyl diisocyanate	Liquid	Drums	1.33	1.33	30	Local	By Road
Toluene diisocyanate	Liquid	Drums	1.33	1.33	30	Local	By Road
Isophorone diisocyanate	Liquid	Drums	1.33	1.33	30	Local	By Road
Chain extender & cross linkers (Polypropylene Glycol)	Liquid	Drums	2	2	75	Local	By Road
Chain extender & cross linkers (1:4 Butanediol)	Liquid	Drums	2	2	75	Local	By Road
Chain extender & cross linkers (Neopentyl glycol)	Liquid	Drums	2	2	75	Local	By Road
Ethyl Acetate (Thinner)	Liquid	Tank	30	30	263	Local	By Road
Catalyst (TPP / TMP)	Liquid	Carboy	1	1	23	Local	By Road
Glycerin/ Penta Polyol	Liquid	Drum	5	5	115	Local	By Road
Vegetable Oil	Liquid	Drum	10	10	117	Local	By Road
C9 Solvent	Liquid	Tank	25	25	46.8	Local	By Road
White Spirit	Liquid	Tank	25	25	46.8	Local	By Road

52.Any Other Information

No Information Available

53.Traffic Management

	Nos. of the junction to the main road & design of confluence:	NA

Parking details:	**Number and area of basement:**	NA
	Number and area of podia:	NA
	Total Parking area:	1667.5 sq.m.
	Area per car:	NA
	Area per car:	NA
	Number of 2-Wheelers as approved by competent authority:	NA
	Number of 4-Wheelers as approved by competent authority:	NA
	Public Transport:	NA
	Width of all Internal roads (m):	6 m
	CRZ/ RRZ clearance obtain, if any:	NA
	Distance from Protected Areas / Critically Polluted areas / Eco-sensitive areas/ inter-State boundaries	NA
	Category as per schedule of EIA Notification sheet	5(f) Category : B-1
	Court cases pending if any	NA
	Other Relevant Informations	NA
	Have you previously submitted Application online on MOEF Website.	Yes
	Date of online submission	14-02-2018

SEAC DISCUSSION ON ENVIRONMENTAL ASPECTS

Environmental Impacts of the project	Not Applicable
Water Budget	Not Applicable
Waste Water Treatment	Not Applicable
Drainage pattern of the project	Not Applicable
Ground water parameters	Not Applicable
Solid Waste Management	Not Applicable

Air Quality & Noise Level issues	Not Applicable
Energy Management	Not Applicable
Traffic circulation system and risk assessment	Not Applicable
Landscape Plan	Not Applicable
Disaster management system and risk assessment	Not Applicable
Socioeconomic impact assessment	Not Applicable
Environmental Management Plan	Not Applicable
Any other issues related to environmental sustainability	Not Applicable

Brief information of the project by SEAC

PP submitted their application for the grant of TOR under category 5(f)B1 as per EIA Notification, 2006. PP presented draft TOR based on standard TOR issued by MoEF & CC published in April, 2015.

As the industry is located in the notified industrial area/estate (MIDC), Public Hearing is exempted under the provisions as per para 7 III Stage (3) (b) of the EIA Notification, 2006

DECISION OF SEAC

Based on the presentation made by PP; committee decided to approve the TOR for the preparation of EIA/EMP report as per standard TOR and additional TOR points mentioned below.

PP to collect base line data as per Office Memorandum issued by MoEF&CC dated 27.08.2017.

Specific Conditions by SEAC:

1) PP to submit certificate of incorporation of the company, list of directors and memorandum of articles and memorandum of association.
2) PP to submit lay out plan showing entry/exit gates, internal roads with minimum width of six meters and turning radius of nine meters, location of pollution control equipment, parking areas, 33% green belt within the premises, solid and hazardous waste storage areas, rain water harvesting etc.
3) PP to carry out life cycle analysis of the activities carried out on site with respect to the sustainability index, green house and ozone depletion potential etc.
4) PP to include detailed material balance charts for each product showing consumption of raw material, sources of pollution and mitigation measures to control the pollution and justified use of resources along with quantities in the EIA report.
5) PP to carry out HAZOP and Risk Assessment study and submit a Disaster Management Plan.
6) PP to submit details of the waste material management plan in the EIA report.
7) PP to submit details of the maximum storage of raw material against the production quantity and make changes in the product manufacturing quantity if storage is found inadequate on the site.
8) PP to submit process engineering design details like reactors and other process equipment design along with proposed process controls to ensure quality of the products.
9) PP to submit design details of the ETP to achieve Zero Liquid Discharge.
10) PP to submit CSR plan to be prepared in consultation with the District Authorities along with its implementation schedule. PP to maintain separate account for CSR funds.
11) PP to submit an undertaking for not having any eco sensitive area within the range of 5 KM from the proposed project site.

FINAL RECOMMENDATION

The Committee decided to Grant ToR subject to the above observations,PP requested to prepare and submit EIA report as per EIA Notification, 2006 and amendments thereof.

Subject: Environment Clearance for proposed expansion project for manufacturing API products of Reliance Life Sciences Pvt. Ltd.

Is a Violation Case: No

1.Name of Project	M/s Reliance Life Sciences Pvt. Ltd.
2.Type of institution	Private
3.Name of Project Proponent	Mr. Dinesh Sathe
4.Name of Consultant	M/s Sadekar Enviro Engineers Pvt. Ltd.
5.Type of project	Not applicable
6.New project/expansion in existing project/modernization/diversification in existing project	Expansion in the existing project
7.If expansion/diversification, whether environmental clearance has been obtained for existing project	Environmental Clearance has been obtained vide letter no F. No. - J-11011/1244/2007-IA(II) dated April 9, 2008.
8.Location of the project	Plot no. R - 282, TTC Industrial Area, MIDC Rabale.
9.Taluka	Thane
10.Village	TTC Industrial Area
Correspondence Name:	Mr. Dinesh Sathe
Room Number:	Plot no. R - 282,
Floor:	--
Building Name:	Reliance Life Sciences Pvt. Ltd.
Road/Street Name:	Thane - Belapur Road
Locality:	TTC Industrial Area, MIDC Rabale
City:	Thane
11.Area of the project	Navi Mumbai Municipal Corporation
12.IOD/IOA/Concession/Plan Approval Number	Not Applicable
	IOD/IOA/Concession/Plan Approval Number: Not Applicable
	Approved Built-up Area: 87884
13.Note on the initiated work (If applicable)	No work has been initiated with respect to the proposed expansion.
14.LOI / NOC / IOD from MHADA/ Other approvals (If applicable)	Not Applicable
15.Total Plot Area (sq. m.)	79990 sq. m.
16.Deductions	Not Applicable
17.Net Plot area	Not applicable
18 (a).Proposed Built-up Area (FSI & Non-FSI)	**a) FSI area (sq. m.):** Not applicable
	b) Non FSI area (sq. m.): Not applicable
	c) Total BUA area (sq. m.):
18 (b).Approved Built up area as per DCR	**Approved FSI area (sq. m.):**
	Approved Non FSI area (sq. m.):
	Date of Approval:
19.Total ground coverage (m2)	Not applicable
20.Ground-coverage Percentage (%) (Note: Percentage of plot not open to sky)	Not applicable
21.Estimated cost of the project	280000000

22.Number of buildings & its configuration

Serial number	Building Name & number	Number of floors	Height of the building (Mtrs)
1	Not Applicable	Not applicable	Not applicable

23.Number of tenants and shops	Not applicable
24.Number of expected residents / users	Not applicable
25.Tenant density per hectare	Not applicable
26.Height of the building(s)	
27.Right of way (Width of the road from the nearest fire station to the proposed building(s)	6 meter internal roads have been provided with 9 meter turning radius.
28.Turning radius for easy access of fire tender movement from all around the building excluding the width for the plantation	6 meter internal roads have been provided with 9 meter turning radius.
29.Existing structure (s) if any	The plant is an existing unit wherin the expansion will be done.
30.Details of the demolition with disposal (If applicable)	Not applicable

31.Production Details

Serial Number	Product	Existing (MT/M)	Proposed (MT/M)	Total (MT/M)
1	For CGMP Units	--	--	--
2	Therapeutic proteins	0.025	--	0.025
3	Monoclonal Antibodies	0.05	--	0.05
4	Cell and Gene Therapies	1000 Procedures	--	1000 Procedures
5	Biochemicals and Nutraceuticals	3.3	--	3.3
6	Plasma Proteins	--	--	-
7	a. Intermediates	35	--	35
8	b. Albumin	21	--	21
9	c. Immunoglobulin	3.5	--	3.5
10	d. Factor VIII	24	--	24
11	Biotechnology byproducts spent celite	9	--	9
12	For Pharmaceutical Formulations	--	--	--

13	Formulation oral solid dosage forms including granules, bulk coated and non - coated tablets, finished packed tablets.	15 Million units/ Annum	--	15 Million units/ Annum
14	Formulation oral solid dosage forms including granules, bulk capsules, finished packed capsules	15 Million units/ Annum	--	15 Million units/ Annum
15	Formulation oral solid dosage forms including granules, bulk capsules, finished packed capsules	15 Million units/ Annum	--	15 Million units/ Annum
16	Formulation Injectable	3 Million Units/Annum	--	3 Million Units/Annum
17	For API Products	--	--	--
18	Temozolomide	0.080 (Quantity reduced)	0.050	0.050
19	Clopidogrel	0.025 (Production stopped)	(Production stopped)	(Production stopped)
20	Zolendric acid	0.008 (Production stopped)	(Production stopped)	(Production stopped)
21	Rizatriptran Benzoate	0.001 (Production stopped)	(Production stopped)	(Production stopped)
22	Aripiperazole	0.015 (Production stopped)	(Production stopped)	(Production stopped)
23	Irbesartan	0.025 (Production stopped)	(Production stopped)	(Production stopped)
24	Eszopiclone	0.025 (Production stopped)	(Production stopped)	(Production stopped)
25	Rocuronium bromide	0.025 (Production stopped)	(Production stopped)	(Production stopped)
26	Aprepitant	0.025 (Production stopped)	(Production stopped)	(Production stopped)
27	Exemestane	0.020 (Production stopped)	(Production stopped)	(Production stopped)
28	Medroxy Progesterone	0.01 (Production stopped)	(Production stopped)	(Production stopped)
29	Ethyndiol diacetate	0.05 (Production stopped)	(Production stopped)	(Production stopped)
30	Estriol	0.015 (Production stopped)	(Production stopped)	(Production stopped)
31	Estradiol	0.020 (Production stopped)	(Production stopped)	(Production stopped)
32	Etynyl Estradiol	0.05 (Production stopped)	(Production stopped)	(Production stopped)
33	Medroxy Megesterol	0.010 (Production stopped)	(Production stopped)	(Production stopped)
34	Samnetrol Xinafoate	0.015 (Production stopped)	(Production stopped)	(Production stopped)
35	Finasteride	0.030 (Production stopped)	(Production stopped)	(Production stopped)

36	Dutasteride	0.010 (Production stopped)	(Production stopped)	(Production stopped)
37	Dulaxitene Hydrochloride	0.015 (Production stopped)	(Production stopped)	(Production stopped)
38	Pemetrexed disodium	0.025 (Production reduced)	0.009	0.009
39	Capecitabine	--	0.602	0.602
40	Imatinib	--	0.29	0.29
41	Erlotinib	--	0.025	0.025
42	Azecitadine	--	0.002	0.002
43	Decitabine	--	0.002	0.002
44	Sorafenib	--	0.015	0.015
45	Sunitinib	--	0.012	0.012
46	Lenalidomide	--	0.0035	0.0035
47	Dasatinib	--	0.015	0.015
48	Lapatinib	--	0.00418	0.00418
49	Pazopanib	--	0.00416	0.00416
50	Regorafenib	--	0.00416	0.00416
51	Nilotinib	--	0.00416	0.00416
52	Bosutinib	--	0.00416	0.00416
53	Vandetanib	--	0.00416	0.00416
54	Bortezomib	--	0.005	0.005
55	Small Volume Products	--	--	--
56	Small molecules like Paricalcitol	--	0.001	0.001
57	Peptides like Leuprolide, Terlipressin, Atosiban, Eptifibatide,Liraglutide, Linaclotide, Bivalirudin, Octreotide, Lanreotide, Exenatide, Pasireotide, Ziconotide, Romiplostim, Buserelin, Deslorelin	--	0.0025	0.0025
58	Antineoplastic molecules like Goserelin, Carfilzomib, Ruxolitinib phosphate, Crizotinib, Vemurafenib, Bendamustine hydrochloride, Plerixafor, Vismodegib, Axitinib, Ixabepilone, Pralatrexate, Afatinib dimaleate, Trametinib, Dabrafenib mesylate	--	0.0025	0.0025
59	Immunomodulatory molecules like Icatibant,Mifamurtide, Thymalfasin,Glatiramer	--	0.001	0.001

32.Total Water Requirement

Dry season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Wet season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Details of Swimming pool (If any)	Not applicable	

33.Details of Total water consumed

Particulars	Consumption (CMD)			Loss (CMD)			Effluent (CMD)		
Water Requirement	Existing	Proposed	Total	Existing	Proposed	Total	Existing	Proposed	Total
Domestic	154	1	155	26.90	0.2	27.10	127.10	0.8	127.9
Cooling tower & thermopack	581	8	589	503	7	510	78	1	79
Industrial Process	829.65	31	860.65	212.69	6	218.69	616.96	25	641.96

Gardening	50 (Treated water from ETP is reused for gardening)	--	50 (Treated water from ETP is reused for gardening)	50	--	50	--	--	--

34.Rain Water Harvesting (RWH)	**Level of the Ground water table:**	approximate 3 m bgl.
	Size and no of RWH tank(s) and Quantity:	The water collected from the rooftop is directly connected to the cooling tower
	Location of the RWH tank(s):	Not Applicable.
	Quantity of recharge pits:	Not Applicable
	Size of recharge pits :	Not Applicable
	Budgetary allocation (Capital cost) :	--
	Budgetary allocation (O & M cost) :	10 thousand per annum
	Details of UGT tanks if any :	Methanol - 6 MT No. of tanks - 1 Acetone - 6 MT No. of tanks - 1 IPA - 6 MT No. of tanks - 1 Toluene - 6 MT No. of tanks - 1 Ethanol - 25 MT No. of tanks - 2 Spent Ethanol - 15 MT No. of tanks - 1 Fire Fighting Tank Underground raw water storage tank
35.Storm water drainage	**Natural water drainage pattern:**	The plant is an existing unit established in an existing industrial area, the natural contour of the area has been disturbed however surface water drains have been provided by the MIDC for proper drainage of storm water.
	Quantity of storm water:	A maximum quantity of 1078 m3/hr of storm water may be generated which would be channelized through storm water drains.
	Size of SWD:	2070 m (length) x 1.3 m (width) x 1 m (depth)
Sewage and Waste water	**Sewage generation in KLD:**	127.9
	STP technology:	The sewage generated is treated in the aeration tank of the ETP.
	Capacity of STP (CMD):	Not required. The sewage will be treated in the aeration tank of the ETP.
	Location & area of the STP:	Not required.
	Budgetary allocation (Capital cost):	--
	Budgetary allocation (O & M cost):	--

36.Solid waste Management

Waste generation in the Pre Construction and Construction phase:	**Waste generation:**	Construction debris will be generated from the minor civil work required for the proposed expansion.
	Disposal of the construction waste debris:	The waste will be disposed through local facilities for landfiling or leveling purposes.
Waste generation in the operation Phase:	**Dry waste:**	Empty Glass Bottles - 8 MT/A, Wooden boxes - 18 MT/A, Sweeping (mixed materials) - 70 MT/A, Cardboard boxes - 24 MT/A, HDPE/LDPE/PVC Containers (Non contaminated) - 3 MT/A. Disposal of shoe covers, Head Caps, Face Mask- 5000 Nos. / Month, Glass container - 1000 Nos/ Month, Paper waste - 250 Kgs/ Month, Cable ties, Polybags, Nylon Scrubber - 3000 Nos. / Month, Vials/Seals/Stopper during machine trial - 20,000 Nos. /Month, Aluminum foil/PVC scrap - 500 Kg/ Month, Air Filters (Different sizes)
	Wet waste:	Plant Tissue Culture waste - 100 MT/A.
	Hazardous waste:	Used/Spent oil - 200 Kg/Month, Contaminated aromatic, aliphatic or naphthenic solvents may or may not be fit for reuse - 2 MT/M, Spent aqueous solvents - 196 MT/M, Spent solvent (Ethyl Acetate,Butanol, Isopropanol, Methanol) - 14 MT/M, Residues and wastes - 4000 Kg/ Month, Spent catalyst/Spent carbon - 50 kg/ Month, Date Expired , discarded medicines - 101 kg/Month, Spent Organic Solvents - 150 kg/ Month, HDPE/LDPE/PVC container - 6 MT/ A, Flue Gas cleaning residue - 1200 kg / Month, Spent ion
	Biomedical waste (If applicable):	Category - Yellow (a). Human Anatomical waste - 500 kg/ Month, (b) Animal Anatomical waste - 600 kg/ Month, (c) Soiled waste - 11000 Kg/Month, (d) Expired or Discarded Medicines - 10 Kg/Month, (h) Microbiology, Biotechnology and other clinical laboratory waste - 500 Kg/Month, Category - Red : Contaminated waste (Recyclable) - 11250 kg/Month, Category - White (Translucent) : Waste Sharps including metals- 100 kg/Month.
	STP Sludge (Dry sludge):	Not Applicable
	Others if any:	E-waste electronics and electrical equipment - 3 T/A.
Mode of Disposal of waste:	**Dry waste:**	The solid waste will be sold to authorized vendors.
	Wet waste:	Disposed to NMMC.
	Hazardous waste:	Recyclables will be sent to authorized facilities for recovery the rest will be disposed through CHWTSDF.
	Biomedical waste (If applicable):	The biomedical wastes of different categories will be disposed according to the BMW Rules, 2016.
	STP Sludge (Dry sludge):	Not Applicable
	Others if any:	Not Applicable
Area requirement:	**Location(s):**	The hazardous waste storage area and scrap yard are located in the north west area of the plot near the cooling tower area
	Area for the storage of waste & other material:	Seperate storages for hazardous waste, scrap yard and biomedical waste have been provided. An area of 30 sq. metres is provided for storage of hazardous waste.
	Area for machinery:	Not Applicable
Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	--
	O & M cost:	700000

37.Effluent Charecterestics

Serial Number	Parameters	Unit	Inlet Effluent Charecterestics	Outlet Effluent Charecterestics	Effluent discharge standards (MPCB)
1	pH	--	8.0 - 9.0	7.0 - 8.0	5.5 - 9.0

2	Oil & Grease	mg/l	< 10	< 10	< 10
3	Total Suspended Solids	mg/l	500-600	40-50	< 100
4	COD	mg/l	3000-4000	65-75	<250
5	BOD	mg/l	1500-2000	20-25	<100

Amount of effluent generation (CMD):	848.86 m3/day
Capacity of the ETP:	860 m3/day
Amount of treated effluent recycled :	395 m3/day
Amount of water send to the CETP:	453.86 m3/day
Membership of CETP (if require):	The company already has membership with CETP at TTC (Thane - Belapur Association)
Note on ETP technology to be used	A full fledged ETP with primary, secondary and tertiary treatment is already provided.
Disposal of the ETP sludge	It will disposed through CHWTSDF.

38.Hazardous Waste Details

Serial Number	Description	Cat	UOM	Existing	Proposed	Total	Method of Disposal
1	Used/Spent oil	5.1	Kg/Month	200	--	200	Sale to authorized recyclers.
2	Contaminated aromatic, aliphatic or naphthenic solvents may or may not be fit for reuse	20.1	T/Month	2	--	2	Sent to CHWTSDF
3	Spent aqueous solvents	20.2	T/Month	196	--	196	Treated in ETP/Sold to authorized recyclers
4	Spent solvent (Ethyl Acetate,Butanol, Isopropanol, Methanol)	20.2	T/Month	8	6	14	Sent to CHWTSDF
5	Residues and wastes	28.1	Kg/Month	3750	250	4000	Sent to CHWTSDF
6	Spent catalyst/Spent carbon	28.2	Kg/Month	50	--	50	Sent to CHWTSDF
7	Date Expired , discarded medicines	28.4	Kg/Month	101	--	101	Sent to CHWTSDF
8	Spent Organic Solvents	28.5	Kg/Month	150	--	150	Sent to CHWTSDF
9	HDPE/LDPE/PVC container	33.3	T/Annum	6	--	6	Sold to authorized reprocessors/recyclers
10	Flue Gas cleaning residue	34.1	Kg/Month	700	500	1200	Sent to CHWTSDF
11	Spent ion exchange resin containing toxic metals	34.2	Kg/Month	100	50	150	Sent to CHWTSDF
12	Chemical Sludge from Waste water treatment plant	34.3	Kg/Month	1000	--	1000	Sent to CHWTSDF

39.Stacks emission Details

Serial Number	Section & units	Fuel Used with Quantity	Stack No.	Height from ground level (m)	Internal diameter (m)	Temp. of Exhaust Gases
1	Boiler 1 (1 nos.)	14300 kg/day	1	33	1.73	120 deg C
2	Boiler 2 (1 nos.)	14300 kg/Day	2	48	3.37	120 deg C
3	Boiler 3 (1 nos.)	14300 kg/day	3	48	3.37	120 deg C
4	D.G Set 2575 - 2 nos, 2500 KVA - 1 nos.	11280 kg/day	4,5,6	21 m each	0.9	160 deg C
5	Scrubber (8 nos.)	--	--	3 m above each	0.2	35 deg C

40.Details of Fuel to be used

Serial Number	Type of Fuel	Existing	Proposed	Total
1	Furnace Oil	42900 Kg/ Day	--	42900 Kg/Day
2	Diesel	11280 Kg/Day	--	11280 Kg/Day
41.Source of Fuel		Local		
42.Mode of Transportation of fuel to site		By Road		

43.Green Belt Development	**Total RG area :**	10,000 sq. m. Green belt has been already developed.
	No of trees to be cut :	none
	Number of trees to be planted :	none
	List of proposed native trees :	none
	Timeline for completion of plantation :	N.A.

44.Number and list of trees species to be planted in the ground

Serial Number	Name of the plant	Common Name	Quantity	Characteristics & ecological importance
1	Green belt has already been developed	N.A.	N.A.	N.A.
45.Total quantity of plants on ground				

46.Number and list of shrubs and bushes species to be planted in the podium RG:

Serial Number	Name	C/C Distance	Area m2
1	N.A.	N.A.	N.A.

47.Energy

Power requirement:	**Source of power supply :**	MSEDCL
	During Construction Phase: (Demand Load)	Existing sanctioned load of 11073 KW is sufficient to meet the power requirements during construction phase.
	DG set as Power back-up during construction phase	Not required
	During Operation phase (Connected load):	Existing sanctioned load of 11073 KW is sufficient to meet the power requirements.
	During Operation phase (Demand load):	The maximum power demand is approx. 7500 KVA
	Transformer:	Not Applicable
	DG set as Power back-up during operation phase:	2 D.G Sets of capacity - 2575 KVA and 1 D.G Set - 2500 KVA
	Fuel used:	Diesel - 11280 kg/Day
	Details of high tension line passing through the plot if any:	Not Applicable

48.Energy saving by non-conventional method:

Not Applicable

49.Detail calculations & % of saving:

Serial Number	Energy Conservation Measures	Saving %
1	Not Applicable	Not Applicable

50.Details of pollution control Systems

Source	Existing pollution control system	Proposed to be installed
Air Pollution	Sufficient stack height have been provided to boiler and D.G Sets to ensure effective dispersion of pollutants. 4 nos. of water scrubber to scrub the process emissions and 1 no. of scrubber with sodium thiosulphate as scrubbing media for scrubbing bromine.	Additional 3 water scrubbers will be provided for the proposed expansion.
Waste water treatment	ETP of hydraulic load 860 CMD is already provided at site with primary, secondary and tertiary treatment. The treated effluent is partially used within the plant premises and surplus is discharged to CETP.	Existing pollution control systems are sufficient for the proposed expansion
Noise Pollution	Acoustic enclosures have been provided to D.G Sets. A thick green belt has been provided on the periphery of the plant premises. Preventive maintain of all the noise generating equipments is being done and records are maintained.	Existing pollution control systems are sufficient for the proposed expansion
Soild hazardous waste	The hazardous waste is stored in a seperate demarcated area, the recyclables are sent to authorized vendors and the rest are sent to CHWTSDF for disposal	Existing pollution control systems are sufficient for the proposed expansion
Biomedical waste	The biomedical waste is segregated category wise and disposed as per BMW rules, 2016	Existing pollution control systems are sufficient for the proposed expansion

Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	--
	O & M cost:	--

51.Environmental Management plan Budgetary Allocation

a) Construction phase (with Break-up):

Serial Number	Attributes	Parameter	Total Cost per annum (Rs. In Lacs)
1	It is an existing facility there is not much construction activity involved.	For mitigation of dust during construction and provision of PPE's to workers.	0.2 lakhs

b) Operation Phase (with Break-up):

Serial Number	Component	Description	Capital cost Rs. In Lacs	Operational and Maintenance cost (Rs. in Lacs/yr)
1	Stack gas emissions from Boiler and D.G Sets	Maintenance of boiler and D.G Set set	--	1.0 lakhs
2	Process emissions	Installation of 3 nos. of water scrubbers. Maintenance and operation of scrubber	38 lakhs	4.0 lakhs
3	Waste water treatment	Operation and maintenance of ETP	--	12.0 lakhs
4	Hazardous waste	Segregation and disposal of hazardous waste to CHWTSDF	--	7.0 lakhs
5	Biomedical waste	Segregation and disposal of biomedical waste	--	100 lakhs
6	Environmental Monitoring Programme	Monitoring of efficiency of pollution control equipments and systems	--	4 lakhs
7	Noise Pollution	Providing PPE's to workers exposed to high intensity noise. Preventive maintain of all the noise generating equipments	--	1.5 Lakhs
8	Green belt development	Maintenance of the green belt	--	10.0 Lakhs
9	Occupational health and safety	Regular health check up of workers	--	8.0 lakhs
10	Rain water Harvesting	Maintainence of the RHW System.	--	0.1lakhs

51.Storage of chemicals (inflamable/explosive/hazardous/toxic substances)

Description	Status	Location	Storage Capacity in MT	Maximum Quantity of Storage at any point of time in MT	Consumption / Month in MT	Source of Supply	Means of transportation
Attached as annexure-1	Attached as annexure-1	Attached as annexure-1	Attached as annexure-1	Attached as annexure-1	Attached as annexure-1	Attached as annexure-1	Attached as annexure-1

52.Any Other Information

No Information Available

53.Traffic Management

	Nos. of the junction to the main road & design of confluence:	The industry is located on Thane - Belapur road.
Parking details:	**Number and area of basement:**	Not Applicable
	Number and area of podia:	Not Applicable
	Total Parking area:	9999 sq. m.
	Area per car:	--
	Area per car:	--
	Number of 2-Wheelers as approved by competent authority:	--
	Number of 4-Wheelers as approved by competent authority:	--
	Public Transport:	--
	Width of all Internal roads (m):	6 meters with a turning radius of 9 meters
	CRZ/ RRZ clearance obtain, if any:	Not required
	Distance from Protected Areas / Critically Polluted areas / Eco-sensitive areas/ inter-State boundaries	Project location is at an approximate distance of 25 kms from Karnala Bird Sanctuary. Project location is at an approximate distance of 8.4 kms from Sanjay Gandhi National Park.
	Category as per schedule of EIA Notification sheet	Schedule - 5 'f', Category - B-1
	Court cases pending if any	None
	Other Relevant Informations	None

	Have you previously submitted Application online on MOEF Website.	Yes
	Date of online submission	19-01-2018

SEAC DISCUSSION ON ENVIRONMENTAL ASPECTS

Environmental Impacts of the project	Not Applicable
Water Budget	Not Applicable
Waste Water Treatment	Not Applicable
Drainage pattern of the project	Not Applicable
Ground water parameters	Not Applicable
Solid Waste Management	Not Applicable
Air Quality & Noise Level issues	Not Applicable
Energy Management	Not Applicable
Traffic circulation system and risk assessment	Not Applicable
Landscape Plan	Not Applicable
Disaster management system and risk assessment	Not Applicable
Socioeconomic impact assessment	Not Applicable
Environmental Management Plan	Not Applicable
Any other issues related to environmental sustainability	Not Applicable

Brief information of the project by SEAC

PP submitted their application for the grant of TOR under category 5(f)B1 as per EIA Notification, 2006. PP presented draft TOR based on standard TOR issued by MoEF & CC published in April, 2015.

DECISION OF SEAC

PP to collect base line data after the grant of ToR.

As the industry is located in the notified industrial area/estate (MIDC), Public Hearing is exempted under the provisions as per para 7 III Stage (3) (b) of the EIA Notification, 2006

PP obtained earlier EC vide No. J11011/1244/2007 - IA (I) dated 09.04.2008.

PP to submit copy of certified compliance report of the earleir EC received from the Regional Office of MOEF&CC as per OM dated 15.01.2018.

Based on the presentation made by PP; committee decided to approve the TOR for the preparation of EIA/EMP report as per standard TOR and additional TOR points mentioned below.

Specific Conditions by SEAC:

1) PP to submit certificate of incorporation of the company. list of directors and memorandum of articles and memorandum of association.
2) PP to submit lay out plan showing entry and exit gates ,internal roads with minimum width of six meters and turning radius of nine meters, location of pollution control equipment, parking areas, 33% green belt in the plant premises, solid and hazardous waste storage areas, rain water harvesting etc
3) PP to carry out life cycle analysis of the activities carried out on site with respect to the sustainability index, green house and ozone depletion potential etc.
4) PP to include detailed material balance charts for each product showing consumption of raw material, sources of pollution and mitigation measures to control the pollution and justified use of resources along with quantities in the EIA report.
5) PP to submit details of the waste material management plan in the EIA report.
6) PP to submit process engineering design details like reactors and other process equipment design along with proposed process controls to ensure the safety of people and quality of the products.
7) PP to submit CSR plan to be prepared in consultation with the District Authorities along with its implementation schedule. PP to maintain separate account for CSR funds.
8) PP to carry out HAZOP and Risk Assessment study and submit a Disaster Management Plan.
9) PP to submit an undertaking for not having any eco sensitive area within the range of 5 KM from the proposed project site.
10) PP to submit permission obtained from CETP to discharge 453.86 CMD effluent.
11) PP to submit chemical handling protocol for all the raw materials to be used on site.
12) PP to use solar energy for office building and street lights.
13) PP to provide lightening arrestors.

FINAL RECOMMENDATION

The Committee decided to Grant ToR subject to the above observations,PP requested to prepare and submit EIA report as per EIA Notification, 2006 and amendments thereof.

149th Meeting of State Expert Appraisal Committee (SEAC-1)

SEAC Meeting number: 149th Day-3 **Meeting Date** April 4, 2018

Subject: Environment Clearance for Proposed capacity enhancement project of M/s D.R.Coats Ink & Resins Pvt. Ltd. located at plot no : J-51, Tarapur MIDC, Tal & Dist : Palghar

Is a Violation Case: No

1.Name of Project	D.R. Coats Ink & Resins Pvt. Ltd.
2.Type of institution	Private
3.Name of Project Proponent	Mr. Yashashvi Drolia
4.Name of Consultant	Sadekar Enviro Engineers Pvt. Ltd.
5.Type of project	Not applicable
6.New project/expansion in existing project/modernization/diversification in existing project	Expansion by discontinuing existing formulation products and manufacturing of new products
7.If expansion/diversification, whether environmental clearance has been obtained for existing project	Environmental Clearance is not required for existing formulation activity of industry
8.Location of the project	Plot No : J-51, Tarapur MIDC
9.Taluka	Palghar
10.Village	-
Correspondence Name:	Unit no. 230 & 231, New Sonal link industrial estate, Bld. No. 2, second floor, Link road, Malad (W), Mumbai-64
Room Number:	Unit no. 230 & 231
Floor:	Second Floor
Building Name:	New Sonal link industrial estate
Road/Street Name:	Link Road
Locality:	Malad (W)
City:	Mumbai-64
11.Area of the project	Tarapur MIDC
12.IOD/IOA/Concession/Plan Approval Number	NA
	IOD/IOA/Concession/Plan Approval Number: NA
	Approved Built-up Area: 853.95
13.Note on the initiated work (If applicable)	NA
14.LOI / NOC / IOD from MHADA/ Other approvals (If applicable)	NA
15.Total Plot Area (sq. m.)	2155 Sq.m.
16.Deductions	Not applicable
17.Net Plot area	Not applicable
18 (a).Proposed Built-up Area (FSI & Non-FSI)	**a) FSI area (sq. m.):** Not applicable
	b) Non FSI area (sq. m.): Not applicable
	c) Total BUA area (sq. m.): 853.95
18 (b).Approved Built up area as per DCR	**Approved FSI area (sq. m.):**
	Approved Non FSI area (sq. m.):
	Date of Approval:
19.Total ground coverage (m2)	Not applicable
20.Ground-coverage Percentage (%) (Note: Percentage of plot not open to sky)	Not applicable
21.Estimated cost of the project	9800000

22.Number of buildings & its configuration

Serial number	Building Name & number	Number of floors	Height of the building (Mtrs)
1	Not applicable	Not applicable	Not applicable
2	Not applicable	Not applicable	Not applicable

23.Number of tenants and shops	Not applicable
24.Number of expected residents / users	Not applicable
25.Tenant density per hectare	Not applicable
26.Height of the building(s)	
27.Right of way (Width of the road from the nearest fire station to the proposed building(s)	9 meters
28.Turning radius for easy access of fire tender movement from all around the building excluding the width for the plantation	Not applicable
29.Existing structure (s) if any	Not applicable
30.Details of the demolition with disposal (If applicable)	Not applicable

31.Production Details

Serial Number	Product	Existing (MT/M)	Proposed (MT/M)	Total (MT/M)
1	Non Reactive Polyamide Resin (Blending Activity)	100	Will be discontinued	Will be discontinued
2	Reactive Polyamide Resin (Blending Activity)	280	Will be discontinued	Will be discontinued
3	Polyamides Resins	0	1000	1000
4	Ketonic Resin	0	10	10
5	Phenolic Resin	0	100	100
6	Acrylic Resin	0	200	200
7	Polyster Resin	0	300	300
8	Amino Resin	0	200	200
9	Polyurethane	0	200	200
10	Rosin Esters	0	100	100
11	Alkyd Resin	0	200	200
12	Resin Blending	0	100	100

32.Total Water Requirement

Dry season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Wet season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Details of Swimming pool (If any)	Not applicable	

33.Details of Total water consumed

Particulars	Consumption (CMD)			Loss (CMD)			Effluent (CMD)		
Water Requirement	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**
Domestic	0.9	0.675	1.575	0.18	0.135	0.315	0.72	0.54	1.26
Industrial Process	0.5	0.5	1	0	0	0	0.5	3.18	3.68
Cooling tower & thermopack	2.99	22.6	25.59	2.53	19.09	21.62	0.46	3.51	3.97
Gardening	0	3.55	3.55	0	3.55	3.55	0	0	0

34.Rain Water Harvesting (RWH)	**Level of the Ground water table:**	NA
	Size and no of RWH tank(s) and Quantity:	NA
	Location of the RWH tank(s):	NA
	Quantity of recharge pits:	NA
	Size of recharge pits :	NA
	Budgetary allocation (Capital cost) :	NA
	Budgetary allocation (O & M cost) :	NA
	Details of UGT tanks if any :	NA
35.Storm water drainage	**Natural water drainage pattern:**	Storm water drainage of adequate capacity will be provided
	Quantity of storm water:	36.8 M3 /Hr
	Size of SWD:	The SWD will be designed as per the quantity of storm water to be received during the rainy season
Sewage and Waste water	**Sewage generation in KLD:**	1.26 CMD
	STP technology:	Sewage waste water will be treated in aeration tank of the effluent treatment plant
	Capacity of STP (CMD):	NA
	Location & area of the STP:	NA
	Budgetary allocation (Capital cost):	NA
	Budgetary allocation (O & M cost):	NA
36.Solid waste Management		
Waste generation in the Pre Construction and Construction phase:	**Waste generation:**	No construction activities are involved hence such waste generation is not envisaged
	Disposal of the construction waste debris:	No construction activities are involved hence generation and disposal of such wastes is not envisaged
Waste generation in the operation Phase:	**Dry waste:**	Office waste such as papers and other domestic waste
	Wet waste:	NA
	Hazardous waste:	Chemical sludge from wastewater treatment : 7.2 MT/A, Used /Spent Oil: 50 Kg/A, Discarded containers barrels/liners/ plastic bags/ PPE etc : 2000 Nos/M, Evaporation residue : 1 MT/M
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	NA
	Others if any:	E-Waste from office ,as per Schedule 1 of E-waste management rule,2016 : 10 Kg/M, Packing boards : 50 Kg/M

Mode of Disposal of waste:	**Dry waste:**	Through local muinicipal waste disposal system
	Wet waste:	NA
	Hazardous waste:	ETP Sludge & Evaporator Residue to Mumbai Waste Management Ltd. - CHWTSDF at Taloja and Used /Spent Oil:, Discarded containers barrels/liners/ plastic bags/ PPE etc will be sold to authorized recycler
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	NA
	Others if any:	Sale to MPCB approved scrap dealers
Area requirement:	**Location(s):**	Dedicated hazardous waste storage area will be provided as per the project plot layout
	Area for the storage of waste & other material:	10 sq.m.0
	Area for machinery:	NA
Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	1 Lakh
	O & M cost:	1.80 Lakh

37.Effluent Charecterestics

Serial Number	Parameters	Unit	Inlet Effluent Charecterestics	Outlet Effluent Charecterestics	Effluent discharge standards (MPCB)
1	pH	-	4.5	6.5-7.5	6.5-7.5
2	COD	mg/l	15000 mg/l	< 250 mg/l	< 250 mg/l
3	BOD	mg/l	6043 mg/l	< 100 mg/l	< 100 mg/l
4	TDS	mg/l	1000 mg/l	< 2100 mg/l	< 2100 mg/l
5	TSS	mg/l	200 mg/l	< 100 mg/l	< 100 mg/l

Amount of effluent generation (CMD):	8.91 CMD
Capacity of the ETP:	10 CMD
Amount of treated effluent recycled :	It will be ZLD unit
Amount of water send to the CETP:	It will be ZLD unit
Membership of CETP (if require):	Company have obtained membership of Tarapur Environment Protection Society
Note on ETP technology to be used	It will be ZLD unit. Company will treat their effluent by giving primary, secondary, tertiary treatment followed by single effect evaporator. The sewage load from domestic activity will be connected to the aeration tank of the ETP.
Disposal of the ETP sludge	Through CHWTSDF

38.Hazardous Waste Details

Serial Number	Description	Cat	UOM	Existing	Proposed	Total	Method of Disposal
1	Chemical sludge from wastewater treatment	34.3	MT/A	2	5.2	7.2	Through CHWTSDF
2	Used/ spent oil	5.1	Kg/A	0	50	50	Through MPCB authorized recycler
3	Discarded containers barrels/liners/ plastic bags/ PPE etc	33.1	Nos/M	0	2000	2000	Through MPCB authorized recycler
4	Evaporation Residue	37.3	MT/M	0	1	1	Through CHWTSDF

5	E-Waste from office	as per Schedule 1 of E-waste management rule,2016	Kg/m	0	10	10	Through Authorized recycler

39.Stacks emission Details

Serial Number	Section & units	Fuel Used with Quantity	Stack No.	Height from ground level (m)	Internal diameter (m)	Temp. of Exhaust Gases
1	Common Stack Attached to Thermopack	FO	01	30	0.4	150 Deg C
2	Stack Attached to DG set	HSD	02	3 m above roof	0.1	190 Deg C
3	Stack Attached to Scrubber	-	0.3	11	0.1	35 Deg C

40.Details of Fuel to be used

Serial Number	Type of Fuel	Existing	Proposed	Total
1	Furnace Oil	0.5 KLD	1.0 KLD	1.5 KLD
2	HSD	10 L/Hr	20 L/Hr	30 L/Hr
41.Source of Fuel		Local vendor		
42.Mode of Transportation of fuel to site		By road		

43.Green Belt Development	**Total RG area :**	711.15 Sq.m.
	No of trees to be cut :	NA
	Number of trees to be planted :	101
	List of proposed native trees :	Neolamarckia cadamba, Callicarpa tomentosa, Trema orientalis, Dalbergia sissoo, Azadirachta indica, Erythrina suberosa, Cassia fistula, Bombax ceiba, Asltonia shcolaris, Macaranga peltata, Schleichera oleosa, Microcos paniculata, Terminalia elliptica, Terminalia paniculata, Terminalia bellirica, Cordia dichotoma, Helicteres isora, Holoptelea integrifolia, Butea monosperma, Oroxylum indiccum,
	Timeline for completion of plantation :	6 month after grant of Environmental Clearance

44.Number and list of trees species to be planted in the ground

Serial Number	Name of the plant	Common Name	Quantity	Characteristics & ecological importance
1	Cassia fistula	Bahava	5	Native ornamental tree having flowers attracting bees and butterflies
2	Bombax ceiba	Sawar	5	A native deciduous tree with fragrant flowers attracting large number of birds & insects
3	Asltonia shcolaris	Saptaparni	5	A native evergreen tree with fragrant flowers & leaves having comparatively higher dust settling index

4	Macaranga peltata	Chandwar	5	A native tree found in abundance across the plains of Sahyadri ranges
5	Schleichera oleosa	Kususm	5	A native deciduous trees of forest tracts of Sahyadri ranges
6	Microcos paniculata	Shirali	5	A native evergreen medium sized tree of forest tracts of Sahyadri ranges
7	Terminalia elliptica	Ain	5	A native evergreen tree of forest tracts of Sahyadri ranges
8	Terminalia paniculata	Kindal	5	A native deciduous tree of forest tracts of Sahyadri ranges
9	Terminalia bellirica	Baheda	5	A native deciduous tree of forest tracts of Sahyadri ranges
10	Cordia dichotoma	Shelu	5	A native deciduous tree of forest tracts of Sahyadri ranges attracting large number of insects
11	Helicteres isora	Murudsheng	5	A native deciduous medium sized tree of forest tracts of Sahyadri ranges visited by large number of birds
12	Holoptelea integrifolia	Ainasadada	5	A native deciduous tree of forest tracts of Sahyadri ranges
13	Butea monosperma	Palash	5	A native brilliantly flowering tree abundant the Palghar District visited by large number of birds
14	Oroxylum indiccum	Tetu	5	A native ornamental Tree
15	Erythrina suberosa	Pangara	5	A native deciduous medium sized tree of forest tracts of Sahyadri ranges visited by large number of birds
16	Azadirachta indica	Kadulimb	5	A native evergreen tree capable of surviving in comparatively polluted environs
17	Dalbergia sissoo	Shisham	5	A native evergreen tree attracting large number of insects
18	Trema orientalis	Ghol	5	A native deciduous medium sized tree with hairy leaves having comparatively higher dust settling index
19	Callicarpa tomentosa	Aiser	5	A native evergreen medium sized tree of forest tracts of Sahyadri ranges with hairy thick leaves having comparatively higher dust settling index
20	Neolamarckia cadamba	Kadamba	6	A native evergreen tree with tremendous blooms attracting large number of insects
45.Total quantity of plants on ground				

46.Number and list of shrubs and bushes species to be planted in the podium RG:

Serial Number	Name	C/C Distance	Area m2
1	NA	NA	NA

47.Energy

Power requirement:	**Source of power supply :**	MSEDCL
	During Construction Phase: (Demand Load)	107 KW
	DG set as Power back-up during construction phase	150 KVA
	During Operation phase (Connected load):	107 KW
	During Operation phase (Demand load):	89 KVA
	Transformer:	107 KW
	DG set as Power back-up during operation phase:	200 KVA
	Fuel used:	HSD
	Details of high tension line passing through the plot if any:	NA

48.Energy saving by non-conventional method:

NA

49.Detail calculations & % of saving:

Serial Number	Energy Conservation Measures	Saving %
1	NA	NA

50.Details of pollution control Systems

Source	Existing pollution control system	Proposed to be installed
Process Emissions	NA (Since it is only blending process)	1 nos scrubber of 500 CFM capacity will be installed
Thermopacks	Stack of 13 meters of height is provided	Common stack of 30 meters height will be provided
D.G. Set	3 meter above roof	3 meter above roof

Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	NA
	O & M cost:	NA

51.Environmental Management plan Budgetary Allocation

a) Construction phase (with Break-up):

Serial Number	Attributes	Parameter	Total Cost per annum (Rs. In Lacs)
1	Air Emission	Dust Suppression	0.5
2	Water Envitonment	Existing sanitation facilities will be utilized	0
3	Solid Hazardous waste	Handling, transportation and disposal of non hazardous solid waste	0.5

4	Noise Environment	PUC certified vehicles etc, PPE	0.4

b) Operation Phase (with Break-up):

Serial Number	Component	Description	Capital cost Rs. In Lacs	Operational and Maintenance cost (Rs. in Lacs/yr)
1	Air Environment	Construction of common stack of 30 meters and Installation of new scrubber	13	2
2	Noise Environment	Noise Pollution Control, Installation of anti-vibration pads, & Enclosures.	1	0.2
3	Water Environment	Up gradation of existing ETP upto 10 CMD capacity + Installation of Single effect evaporator	45	2
4	Environment Monitoring & Management	Quarterly Environment Monitoring	0	3.5
5	Occupational Health	Glares, Breathing Masks,Gloves, Boots, Helmets, Ear Plugs etc. & annual health-medical checkup of workers,	0.6	0.1
6	Green Belt	Installation of water drip , Green Belt Maintenance	1.1	0.932
7	Solid Waste Management	Solid Waste Management	1.0	1.8

51.Storage of chemicals (inflamable/explosive/hazardous/toxic substances)

Description	Status	Location	Storage Capacity in MT	Maximum Quantity of Storage at any point of time in MT	Consumption / Month in MT	Source of Supply	Means of transportation
Benzoic Acid	Solid	Bags	2	2	13	Local	By Road
Benzyl Alcohol	Liquid	Drums	1	1	15	Local	By Road
Bisphenol-A	Solid	Bags	1	1	5	Local	By Road
Butanol	Liquid	Drums	2	2	56.5	Local	By Road
Octanol	Liquid	Drums	2	2	56.5	Local	By Road
C12-C14 / Ortho Cresol	Liquid	Drums	1	1	10	Local	By Road
Catalyst (TPP / TMP)	Liquid	Carboy	0.3	0.3	3	Local	By Road
Chain extender & cross linkers (Polypropylene Glycol)	Liquid	Drums	2	2	10	Local	By Road
Chain extender & cross linkers (1:4 Butanediol)	Liquid	Drums	2	2	10	Local	By Road

Chain extender & cross linkers (Neopentyl glycol)	Liquid	Drums	2	2	10	Local	By Road
Cyclohexanone	Liquid	Drums	1	1	5	Local	By Road
Dimer Acid	Liquid	Tank	50	50	599	Local	By Road
Epoxy Resin	Liquid	Drums	2	2	38	Local	By Road
Vegetable Oil	Liquid	Tank	20	20	39	Local	By Road
Formaldehyde 37%	Liquid	Drum	20	20	53	Local	By Road
Paraformaldehyde	Solid	Bags	3	3	12	Local	By Road
Glycerine / Penta or any Polyol	Liquid	Drum	4	4	38	Local	By Road
Initiators	Liquid	Carboy	0.03	0.03	1	Local	By Road
Maleic Anhydride	Solid	Bags	4.83	4.83	67	Local	By Road
Methylene diphenyl diisocyanate	Liquid	Drum	0.33	0.33	4	Local	By Road
Toluene diisocyanate	Liquid	Drum	0.33	0.33	4	Local	By Road
Isophorone diisocyanate	Liquid	Drum	0.33	0.33	4	Local	By Road
Mono Ethylene Glycol	Liquid	Drum	4	4	24	Local	By Road
Diethylene glycol	Liquid	Drum	4	4	24	Local	By Road
Phthalic Anhydride	Solid	Bags	12.33	12.33	106	Local	By Road
Terephthelic Acid	Solid	Bags	4	4	24	Local	By Road
Adipic Acid	Solid	Bags	4	4	24	Local	By Road
Melamine	Solid	Bags	2.5	2.5	22	Local	By Road
Urea	Solid	Bags	2.5	2.5	22	Local	By Road
Monoethylene Glycol	Liquid	Drum	1.66	1.66	20	Local	By Road
Diethylene Glycol	Liquid	Drum	1.66	1.66	20	Local	By Road
Polyethylene Glycol	Liquid	Drum	1.66	1.66	20	Local	By Road
Acrylates	Liquid	Drum	1.42	1.42	17.14	Local	By Road
Methyl Methacrylate	Liquid	Drum	1.42	1.42	17.14	Local	By Road
Butyl Acrylate Monomer	Liquid	Drum	1.42	1.42	17.14	Local	By Road
N-butyl Methacrylate	Liquid	Drum	1.42	1.42	17.14	Local	By Road
2-Hydroxyethyl Methacrylate	Liquid	Drum	1.42	1.42	17.14	Local	By Road
Ethyl Acrylate	Liquid	Drum	1.42	1.42	17.14	Local	By Road
Methacrylates	Liquid	Drum	1.42	1.42	17.14	Local	By Road
Oxalic Acid	Solid	Bags	0.1	0.1	0.33	Local	By Road
Pentaerythritol	Solid	Bags	1	1	3	Local	By Road
Phenol	Liquid	Tank	15	15	69	Local	By Road
Isophthalic Acid	Solid	Bags	3.33	3.33	51	Local	By Road
Ethylenediamine	Liquid	Drum	8	8	95.5	Local	By Road
Diethylenetriamine	Liquid	Drum	8	8	95.5	Local	By Road
Tetraethylenepentamine	Liquid	Drum	8	8	95.5	Local	By Road
Triethylenetetramine	Liquid	Drum	8	8	95.5	Local	By Road
Rosin	Liquid	Drum	15	15	95	Local	By Road
Xylene	Liquid	Drum	2.5	2.5	45	Local	By Road
Cellosolve Acetate	Liquid	Drum	2.5	2.5	42	Local	By Road
Butyl Acetate	Liquid	Drum	2.5	2.5	42	Local	By Road
Styrene	Liquid	Drum	2.5	2.5	42	Local	By Road
Thinner (Ethyl Acetate)	Liquid	Drum	2	2	35	Local	By Road
Mineral Terpentine Oil	Liquid	Drum	2.5	2.5	78	Local	By Road

Fatty Acid	Liquid	Tank	35	35	134	Local	By Road

52.Any Other Information

No Information Available

53.Traffic Management

	Nos. of the junction to the main road & design of confluence:	NA
Parking details:	**Number and area of basement:**	NA
	Number and area of podia:	NA
	Total Parking area:	258.6 sq.m. (The parking area will be provided at plot no J-50 , occupied by same company for storage of raw materials)
	Area per car:	NA
	Area per car:	NA
	Number of 2-Wheelers as approved by competent authority:	NA
	Number of 4-Wheelers as approved by competent authority:	NA
	Public Transport:	NA
	Width of all Internal roads (m):	6 meters
	CRZ/ RRZ clearance obtain, if any:	NA
	Distance from Protected Areas / Critically Polluted areas / Eco-sensitive areas/ inter-State boundaries	NA
	Category as per schedule of EIA Notification sheet	5(f) Category : B-1
	Court cases pending if any	NA
	Other Relevant Informations	1) Storage of entire raw material , other than tank storage, will be done at plot no J-50, Tarapur MIDC owned by D.R. Coats Ink & Resins Pvt. Ltd. 2) Parking will be provided at plot no J-50, which is present towards west site of proposed expansion site, behind MIDC road. The distance between two plots boundaries are 27 meters.
	Have you previously submitted Application online on MOEF Website.	No
	Date of online submission	-

SEAC DISCUSSION ON ENVIRONMENTAL ASPECTS

Environmental Impacts of the project	Not Applicable
Water Budget	Not Applicable
Waste Water Treatment	Not Applicable
Drainage pattern of the project	Not Applicable
Ground water parameters	Not Applicable
Solid Waste Management	Not Applicable
Air Quality & Noise Level issues	Not Applicable
Energy Management	Not Applicable
Traffic circulation system and risk assessment	Not Applicable
Landscape Plan	Not Applicable
Disaster management system and risk assessment	Not Applicable
Socioeconomic impact assessment	Not Applicable
Environmental Management Plan	Not Applicable
Any other issues related to environmental sustainability	Not Applicable

Brief information of the project by SEAC

PP submitted their application for the grant of TOR under category 5(f)B1 as per EIA Notification, 2006. PP presented draft TOR based on standard TOR issued by MoEF & CC published in April, 2015.

As the industry is located in the notified industrial area/estate (MIDC), Public Hearing is exempted under the provisions as per para 7 III Stage (3) (b) of the EIA Notification, 2006

DECISION OF SEAC

Based on the presentation made by PP; committee decided to approve the TOR for the preparation of EIA/EMP report as per standard TOR and additional TOR points mentioned below.

PP to collect base line data as per Office Memorandum issued by MoEF&CC dated 27.08.2017.

Specific Conditions by SEAC:

1) PP to submit certificate of incorporation of the company, list of directors and memorandum of articles and memorandum of association.
2) PP to submit lay out plan showing entry/exit gates, internal roads with minimum width of six meters and turning radius of nine meters, location of pollution control equipment, parking areas, 33% green belt within the premises, solid and hazardous waste storage areas, rain water harvesting etc.
3) PP to carry out life cycle analysis of the activities carried out on site with respect to the sustainability index, green house and ozone depletion potential etc.
4) PP to include detailed material balance charts for each product showing consumption of raw material, sources of pollution and mitigation measures to control the pollution and justified use of resources along with quantities in the EIA report.
5) PP to carry out HAZOP and Risk Assessment study and submit a Disaster Management Plan.
6) PP to submit details of the waste material management plan in the EIA report.
7) PP to submit details of the maximum storage of raw material storage against the production quantity and make changes in the product manufacturing quantity if storage is found inadequate in the site.
8) PP to submit process engineering design details like reactors and other process equipment design along with proposed process controls to ensure quality of the products.
9) PP to submit design details of the ETP to achieve Zero Liquid Discharge.
10) PP to submit CSR plan prepared in consultation with the District Authorities along with its implementation schedule.
11) PP to submit an undertaking for not having any eco sensitive area within the range of 10 KM from the proposed project site.

FINAL RECOMMENDATION

The Committee decided to Grant ToR subject to the above observations,PP requested to prepare and submit EIA report as per EIA Notification, 2006 and amendments thereof.

Subject: Environment Clearance for Schedule 5(f), Synthetic Organic Chemical Industries, 'B' Category

Is a Violation Case: No

1.Name of Project	Manufacturing of Dye & Dye Intermediates
2.Type of institution	Private
3.Name of Project Proponent	M/s. Indychem Industries
4.Name of Consultant	M/s. Green Circle, Inc.
5.Type of project	Industrial project at MIDC Taloja area
6.New project/expansion in existing project/modernization/diversification in existing project	Expansion project (Product mix)
7.If expansion/diversification, whether environmental clearance has been obtained for existing project	Environmental Clearance was not requisite for mixing and blending of dye-stuff & pigments. CTE and CTO was obtained from Maharashtra Pollution Control Board (MPCB)
8.Location of the project	Plot. No. J-30/1, MIDC Industrial area Taloja
9.Taluka	Panvel
10.Village	Taloja
11.Area of the project	Maharashtra Industrial Development Corporation (MIDC), Taloja
12.IOD/IOA/Concession/Plan Approval Number	Plant approval from MIDC, Taloja
	IOD/IOA/Concession/Plan Approval Number: Plant approval subject to office letter No. SPA/TLJ/A27958 dated 24.01.2014
	Approved Built-up Area: 786.20
13.Note on the initiated work (If applicable)	NA
14.LOI / NOC / IOD from MHADA/ Other approvals (If applicable)	NA
15.Total Plot Area (sq. m.)	1200 sq.m
16.Deductions	Not applicable
17.Net Plot area	Not applicable
18 (a).Proposed Built-up Area (FSI & Non-FSI)	**a) FSI area (sq. m.):** Not applicable
	b) Non FSI area (sq. m.): Not applicable
	c) Total BUA area (sq. m.): 786.20 Sq. m
18 (b).Approved Built up area as per DCR	**Approved FSI area (sq. m.):**
	Approved Non FSI area (sq. m.):
	Date of Approval:
19.Total ground coverage (m2)	Not applicable
20.Ground-coverage Percentage (%) (Note: Percentage of plot not open to sky)	Not applicable
21.Estimated cost of the project	38400000

22.Number of buildings & its configuration

Serial number	Building Name & number	Number of floors	Height of the building (Mtrs)
1	Not applicable	Not applicable	Not applicable

23.Number of tenants and shops	Not applicable
24.Number of expected residents / users	Not applicable

25.Tenant density per hectare	Not applicable
26.Height of the building(s)	
27.Right of way (Width of the road from the nearest fire station to the proposed building(s)	25 m
28.Turning radius for easy access of fire tender movement from all around the building excluding the width for the plantation	6 m
29.Existing structure (s) if any	Existing industry (as per CTO)
30.Details of the demolition with disposal (If applicable)	Not applicable

31.Production Details

Serial Number	Product	Existing (MT/M)	Proposed (MT/M)	Total (MT/M)
1	Mixing & Blending of Pigments & Paints-By dry process	50	0	50
2	Mixing & Blending of Pigments & Paints-By Wet process	50	0	50
3	Dyestuff & Pigment in Powder Form (Such as Chrysodine, Bismark Brown, Malachite Green, Rhodamine B, Victoria Blue, Solvent Black, Pigments etc) - Powder form	0	50	50
4	Dyestuff & Pigment in Liquid form (Such as Methyl Violet Liquid, Chrystal Violet Liquid, Malachite Green Liquid, Brilliant Green Liquid, Victoria Blue Liquid, Chrysodine Liquid, Bismark Brown Liquid, Rhodamine B Liquid, Basic Yellow Liquid etc) - Liquid	0	75	75
5	Mixing & Blending of Dyestuff & Pigments - Powder	0	30	30
6	Byproduct	0	6	6

32.Total Water Requirement

Dry season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Wet season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Details of Swimming pool (If any)	Not applicable	

33.Details of Total water consumed

Particulars	Consumption (CMD)			Loss (CMD)			Effluent (CMD)		
Water Requirement	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**
Domestic	-	-	3	-	-	0.6	-	-	2.4
Gardening	-	-	5	-	-	5	-	-	0
Industrial Process	-	-	28	-	-	5.7	-	-	22.3
Cooling tower & thermopack	-	-	19	-	-	18	-	-	1.0

34.Rain Water Harvesting (RWH)	**Level of the Ground water table:**	Pre-monsoon: 0.95 to 7.70 m bgl & Post-monsoon: 1.10 to 4.05 m bgl
	Size and no of RWH tank(s) and Quantity:	NA
	Location of the RWH tank(s):	NA
	Quantity of recharge pits:	NA
	Size of recharge pits :	NA
	Budgetary allocation (Capital cost) :	NA
	Budgetary allocation (O & M cost) :	NA
	Details of UGT tanks if any :	Domestic & flushing tank: 15 KL and Fire fighting tank: 50 KL
35.Storm water drainage	**Natural water drainage pattern:**	The industry is located in Taloja MIDC area where all the facilities are available by MIDC. The land is having gentle slope.
	Quantity of storm water:	1320 m3
	Size of SWD:	1.0 m x 1.0 m
Sewage and Waste water	**Sewage generation in KLD:**	2.4
	STP technology:	MBBR
	Capacity of STP (CMD):	1 No. x 3 KLD
	Location & area of the STP:	12 Sq.m
	Budgetary allocation (Capital cost):	Rs. 5 Lakhs
	Budgetary allocation (O & M cost):	Rs. 1 Lakhs/Annum

36.Solid waste Management

Waste generation in the Pre Construction and Construction phase:	**Waste generation:**	Construction debris, Waste concrete, metallic waste, plastics, broken bricks etc.
	Disposal of the construction waste debris:	Construction debris, Waste concrete and broken bricks will be utilized in low-land leveling, secondary concrete, below roads. Some quantity of Excavation soil will be use for back-filling and remaining will be hand over to authorized vendor.
Waste generation in the operation Phase:	**Dry waste:**	Paper, cardboard, Empty Drum, HDPE bags, Metal scrap etc. - 2 MT/M
	Wet waste:	Food waste
	Hazardous waste:	Used oil, ETP Sludge
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	10 Kg/Month
	Others if any:	NA

Mode of Disposal of waste:	**Dry waste:**	Sale to authorized vendors
	Wet waste:	Sent to disposal site
	Hazardous waste:	Sale to authorized vendors/Sent to CHWTSDF
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	Will be used as manure for gardening.
	Others if any:	NA
Area requirement:	**Location(s):**	NA
	Area for the storage of waste & other material:	NA
	Area for machinery:	NA
Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	NA
	O & M cost:	NA

37.Effluent Charecterestics

Serial Number	Parameters	Unit	Inlet Effluent Charecterestics	Outlet Effluent Charecterestics	Effluent discharge standards (MPCB)
1	pH	-	4.5 -9.5	7.5 - 7.6	5.5-8.0
2	COD	mg/L	35000 - 45000	1000 - 1800	< 2700
3	BOD	mg/L	4000 - 6000	500 - 800	< 1500

Amount of effluent generation (CMD):	23.3
Capacity of the ETP:	30
Amount of treated effluent recycled :	10
Amount of water send to the CETP:	Remaining treated effluent from ETP after recycling will be sent to CETP
Membership of CETP (if require):	Yes, Membership obtained
Note on ETP technology to be used	The ETP is comprised of primary, secondary & tertiary treatment unit's viz. equalization tank, neutralization tank, aeration tank, primary & secondary clarifiers, PSF, ACF and final collection sump.
Disposal of the ETP sludge	Forwarded to CHWTSDF

38.Hazardous Waste Details

Serial Number	Description	Cat	UOM	Existing	Proposed	Total	Method of Disposal
1	Used oil	5.1	L/yr	-	20	20	Sale to Authorized vendors/recyclers
2	ETP Sludge	34.3	MT/M	-	0.30	0.30	Sent to CHWTSDF

39.Stacks emission Details

Serial Number	Section & units	Fuel Used with Quantity	Stack No.	Height from ground level (m)	Internal diameter (m)	Temp. of Exhaust Gases
1	Boiler (Non IBR) 1	Furness oil - 100 lit/day	1	12	0.4	110 oC
2	Thermo pack	Coal/wood/ Briquette - 2.5 MT/day	2	12	0.5	110 oC
3	D.G Set	HSD - 20 lit/day	3	5	0.08	90 oC

40.Details of Fuel to be used

Serial Number	Type of Fuel	Existing	Proposed	Total
1	Furness oil	-	100 lit/day	100 lit/day
2	Coal/wood/ Briquette	-	2.5 MT/day	2.5 MT/day
3	HSD	-	20 lit/day	20 lit/day
41.Source of Fuel		Local Market		
42.Mode of Transportation of fuel to site		Road Transport		

43.Green Belt Development	**Total RG area :**	396 sq. m (150 sq. m. within premises & 246 sq. m. on Land allotted by MIDC)
	No of trees to be cut :	NA
	Number of trees to be planted :	25
	List of proposed native trees :	Asok, Kadamb, Neem, Bakul, Apta etc.
	Timeline for completion of plantation :	2 years

44.Number and list of trees species to be planted in the ground

Serial Number	Name of the plant	Common Name	Quantity	Characteristics & ecological importance
1	Cassia fistula	Bahava	-	Medium sized deciduous tree. Beautiful yellow flowers, Butterfly host plant
2	Mimusops elengi	Bakul	-	Shady tree, small white fragrant flowers
3	Nyctanthes arbor-tristis	Parijatak	-	Small deciduous fast growing tree, beautiful flowrers.
4	Lagerstroemia flos-regineae	Tamhan	-	State flower tree of Maharashtra Medium sized tree, beautiful purple flowers
5	Murraya paniculata	Kunti	-	Small tree, Fragrant white flowers, Butterfly host plant
6	Saraca asoka	Sita Ashok	-	Shady tree with red-yellow flowers.
7	Gmelina arborea	Shivan	-	Fast growing tree with beautiful yellow flowers
8	Azadirachta indica	Neem	-	Semi-evergreen tree with medicinal value
9	Bombax ceiba	Kate sawar	-	Large deciduous tree. Flowers attract many birds.
10	Michelia champaca	Son chafa	-	Medium sized evergreen tree, fragrant yellow flowers, Butterfly host plant
11	Anthocephallus cadamba	Kadamb	-	Shady, large deciduous tree, fast-growing graceful tree, ball shaped flowers.
45.Total quantity of plants on ground				

46.Number and list of shrubs and bushes species to be planted in the podium RG:

Serial Number	Name	C/C Distance	Area m2
1	NA	NA	NA

47.Energy

Power requirement:	**Source of power supply :**	MSEDCL
	During Construction Phase: (Demand Load)	10 KW
	DG set as Power back-up during construction phase	NA
	During Operation phase (Connected load):	15 KW (existing)
	During Operation phase (Demand load):	125 KW
	Transformer:	NA
	DG set as Power back-up during operation phase:	1 No. x 82 KVA
	Fuel used:	HSD
	Details of high tension line passing through the plot if any:	NA

48.Energy saving by non-conventional method:

1. The proposed project will provide enough day light factors in the building to permit maximum day light to interior to minimize overall energy consump
2. Focusing on the high performance energy efficient U & R values can bring down the building energy consumption i.e. the operational cost for the any commercial buildings.
3. To the extent possible and technically feasible, energy efficient equipment will be selected.
4. Maximize the use of natural lighting through design
5. Gravity flow will be preferred wherever possible to save pumping energy.
6. Proper temperature controls will be provided to reduce load on heating systems

49.Detail calculations & % of saving:

Serial Number	Energy Conservation Measures	Saving %
1	NA	NA

50.Details of pollution control Systems

Source	Existing pollution control system	Proposed to be installed
Air emission - Process vents & flue gas stacks	-	Air preheater, Multiple Cyclone Seperator, ID Fan, Wet Scrubber, Dueting with Adequate chimney height

Wastewater - Domestic use, process, boiler blowdown, cooling tower blowdown, washing	-	ETP & STP
Noise - Process area, Utility area, ETP area	-	The Boiler would be kept in an isolated area with proper acoustic treatment to have the ambient noise level as per CPCB standards. The workers would be provided with proper personal protective equipment (PPE) such as ear plugs,ear muffs etc. The DG sets would be enclosed in canopy as well as silencer.
Solid Waste	-	Sale/ Recycle/ disposal to CHWTSDF

Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	-
	O & M cost:	-

51.Environmental Management plan Budgetary Allocation

a) Construction phase (with Break-up):

Serial Number	Attributes	Parameter	Total Cost per annum (Rs. In Lacs)
1	Air	Dust suppression	1.0
2	Green area	Green Belt development	1.0
3	Solid waste	Solid waste management facility	0.5
4	Air, water, noise	Environment Monitoring	1.5
5	Health & safety	Occupational Health	1.0

b) Operation Phase (with Break-up):

Serial Number	Component	Description	Capital cost Rs. In Lacs	Operational and Maintenance cost (Rs. in Lacs/yr)
1	Air emission	Provision for stack & APCM	4.0	1.5
2	Air & Flue gas	Provision of Boiler & Thermopack	8.0	-
3	Wastewater	Up gradation ETP Plant & O & M	30.00	4.80
4	other	other	10.00	-
5	Green area	Development of Green Belt	0.50	0.20
6	Solid /Hazardous waste	Solid waste management	-	3.60

51.Storage of chemicals (inflamable/explosive/hazardous/toxic substances)

Description	Status	Location	Storage Capacity in MT	Maximum Quantity of Storage at any point of time in MT	Consumption / Month in MT	Source of Supply	Means of transportation
Diethyl meta amino phenol	Solid	Drums-Raw material storage area	12.00	12.00	12.00	Local supplier	Road transport
Phthalic anhydride	Solid	Bags-Raw material storage area	12.00	12.00	12.00	Local supplier	Road transport
Di methyl aniline	Liquid	Drums-Raw material storage area	30.00	30.00	30.00	Local supplier	Road transport
Mono methyl aniline	Liquid	Drums-Raw material storage area	1.20	1.20	1.20	Local supplier	Road transport
Diethyl aniline	Liquid	Drums-Raw material storage area	2.00	2.00	2.00	Local supplier	Road transport
Aniline	Liquid	Drums-Raw material storage area	1.20	1.20	1.20	Local supplier	Road transport
Benzel dehyde	Liquid	Drums-Raw material storage area	11.00	11.00	11.00	Local supplier	Road transport
Meta phenylene diamine/meta toluable diamine	Solid	Drums-Raw material storage area	3.00	3.00	3.00	Local suppliaer	Road transport
Sodium nitrite	Solid	Bags-Raw material storage area	2.00	2.00	2.00	Local supplier	Road transport
Oxalic acid	Solid	Bags-Raw material storage area	4.80	4.80	4.80	Local supplier	Road transport
Paraformal dehydride	Solid	Bags-Raw material storage area	0.70	0.70	0.70	Local supplier	Road transport
Phenyl alpha naphthylamine	Solid	Bags-Raw material storage area	2.20	2.20	2.20	Local supplier	Road transport
Acetic acid	Liquid	Drums-Raw material storage area	25.00	25.00	25.00	Local supplier	Road transport
Caustic soda	Solid	Bags-Raw material storage area	12.00	12.00	12.00	Local supplier	Road transport
Di sodium hydrose phosphate	Solid	Bags-Raw material storage area	0.65	0.65	0.65	Local supplier	Road transport
Sodium molybdate	Solid	Bags-Raw material storage area	3.20	3.20	3.20	Local supplier	Road transport
Catalyst	Solid	Bags-Raw material storage area	1.20	1.20	1.20	Local supplier	Road transport
Emulsifier	Liquid	Drums-Raw material storage area	0.50	0.50	0.50	Local supplier	Road transport
Sulphuric acid	Liquid	Drums-Raw material storage area	5.00	5.00	5.00	Local supplier	Road transport
Hydrochloric acid	Liquid	Drums-Raw material storage area	25.00	25.00	25.00	Local supplier	Road transport
B brown base	Solid	Bags-Raw material storage area	2.00	2.00	2.00	Local supplier	Road transport
Basic yellow	Solid	Bags-Raw material storage area	1.60	1.60	1.60	Local supplier	Road transport
Crysodine base	Solid	Bags-Raw material storage area	1.20	1.20	1.20	Local supplier	Road transport
Dyestuff powder	Solid	Bags-Raw material storage area	24.00	24.00	24.00	Local supplier	Road transport

Metanil yellow	Solid	Bags-Raw material storage area	2.10	2.10	2.10	Local supplier	Road transport
Methyl violet	Solid	Bags-Raw material storage area	7.50	7.50	7.50	Local supplier	Road transport
Rhodamine base	Solid	Bags-Raw material storage area	4.00	4.00	4.00	Local supplier	Road transport
Globber salt/ vaccum salt	Solid	Bags-Raw material storage area	6.00	6.00	6.00	Local supplier	Road transport

52.Any Other Information

No Information Available

53.Traffic Management

	Nos. of the junction to the main road & design of confluence:	Two Nos.
Parking details:	**Number and area of basement:**	NA
	Number and area of podia:	NA
	Total Parking area:	10 Sq.m
	Area per car:	10 Sq. m
	Area per car:	10 Sq. m
	Number of 2-Wheelers as approved by competent authority:	NA
	Number of 4-Wheelers as approved by competent authority:	1 No.
	Public Transport:	Auto Rickshaw from 200 m the plant boundary
	Width of all Internal roads (m):	6
	CRZ/ RRZ clearance obtain, if any:	NA
	Distance from Protected Areas / Critically Polluted areas / Eco-sensitive areas/ inter-State boundaries	NA
	Category as per schedule of EIA Notification sheet	'B
	Court cases pending if any	NA
	Other Relevant Informations	NA
	Have you previously submitted Application online on MOEF Website.	Yes

	Date of online submission	23-01-2016

SEAC DISCUSSION ON ENVIRONMENTAL ASPECTS

Environmental Impacts of the project	Not Applicable
Water Budget	Not Applicable
Waste Water Treatment	Not Applicable
Drainage pattern of the project	Not Applicable
Ground water parameters	Not Applicable
Solid Waste Management	Not Applicable
Air Quality & Noise Level issues	Not Applicable
Energy Management	Not Applicable
Traffic circulation system and risk assessment	Not Applicable
Landscape Plan	Not Applicable
Disaster management system and risk assessment	Not Applicable
Socioeconomic impact assessment	Not Applicable
Environmental Management Plan	Not Applicable
Any other issues related to environmental sustainability	Not Applicable

Brief information of the project by SEAC

PP has obtianed TOR in the 124th meeting of SEAC-1 held on 30th & 31st March 2016 and now PP submitted the EIA reprot durig 141at meeting. It was brought to the notice of PP that they have uploaded the EIA reprot on 14th August 2017 and the expert members couldnot study the same in such a short time. Hence SEAC-1 decided to defer the proosal in 141st meeting and decided to considered in ensuing meeting.

PP submitted letter for leave of absensee on 13.09.2017 due to unavoidable circumstances and requested to defer the proposal.

SEAC-1 on request of PP decided to defer the proposal till PP's readyness.

DECISION OF SEAC

During deliberations with the PP and his acrredited consultant it was observed that PP neither filled correct information in the consolidated statement nor submitted adequate compliance of the additional ToR points given by SEAC in their 124th and 136th meeting.

PP requested to postone the presentation as they were not having adequate detials and information with them to present before the SEAC.

In view of above request from PP SEAC decided to defer the proposal.

Specific Conditions by SEAC:

FINAL RECOMMENDATION

SEAC-I decided to defer the proposal till PP submits the additional information as per above conditions within 30 days

149th Meeting of State Expert Appraisal Committee (SEAC-1)

SEAC Meeting number: 149th Day-3 **Meeting Date** April 4, 2018

Subject: Environment Clearance for Proposed Change in Product Mix in existing Pure Terepthalic Acid (PTA) division of M/s Reliance Industries Limited, Kaire, Patalganga MIDC Industrial Area

Is a Violation Case: No

1.Name of Project	Proposed Change in Product Mix in existing Pure Terepthalic Acid (PTA) division of M/s Reliance Industries Limited, Kaire,
2.Type of institution	TOR
3.Name of Project Proponent	M/s Reliance Industries Limited
4.Name of Consultant	Aditya Environmental Services Pvt Ltd
5.Type of project	Not applicable
6.New project/expansion in existing project/modernization/diversification in existing project	new
7.If expansion/diversification, whether environmental clearance has been obtained for existing project	Purified Terephthalic Acid (PTA) division of Reliance Industries Limited (RIL) started its operation in 1985 before the Environment Impact Assessment notification came into existence. Hence, there is no Environment Clearance available for this project. However, Consents were duly obtained from Maharashtra Pollution Control Board (MPCB) and renewed from time to time.
8.Location of the project	B4, B5 MIDC INDUSTRIAL AREA PATALAGANGA
9.Taluka	Khalapur
10.Village	Kaire
Correspondence Name:	Udayabhaskar Gullapalli, Sr. VP & Head- Environment, Reliance Industries Limited
Room Number:	CA-18
Floor:	7B, 2nd Floor,
Building Name:	Reliance Corporate Park
Road/Street Name:	Thane-Belapur Road
Locality:	Ghansoli
City:	Navi Mumbai
11.Area of the project	MIDC Industrial Area
12.IOD/IOA/Concession/Plan Approval Number	MIDC Industrial Area Notification
	IOD/IOA/Concession/Plan Approval Number: Not Applicable
	Approved Built-up Area: 66000
13.Note on the initiated work (If applicable)	Not Applicable
14.LOI / NOC / IOD from MHADA/ Other approvals (If applicable)	Not Applicable
15.Total Plot Area (sq. m.)	24.7
16.Deductions	Not applicable
17.Net Plot area	24.7
18 (a).Proposed Built-up Area (FSI & Non-FSI)	**a) FSI area (sq. m.):** Not applicable
	b) Non FSI area (sq. m.): Not applicable
	c) Total BUA area (sq. m.): 2000
18 (b).Approved Built up area as per DCR	**Approved FSI area (sq. m.):**
	Approved Non FSI area (sq. m.):
	Date of Approval:
19.Total ground coverage (m2)	Not applicable
20.Ground-coverage Percentage (%) (Note: Percentage of plot not open to sky)	Not applicable
21.Estimated cost of the project	4750000000

22.Number of buildings & its configuration

Serial number	Building Name & number	Number of floors	Height of the building (Mtrs)
1	Not applicable	Not applicable	Not applicable

23.Number of tenants and shops	Not applicable
24.Number of expected residents / users	Not applicable
25.Tenant density per hectare	Not applicable
26.Height of the building(s)	
27.Right of way (Width of the road from the nearest fire station to the proposed building(s)	Not applicable
28.Turning radius for easy access of fire tender movement from all around the building excluding the width for the plantation	Not applicable
29.Existing structure (s) if any	Not applicable
30.Details of the demolition with disposal (If applicable)	Not applicable

31.Production Details

Serial Number	Product	Existing (MT/M)	Proposed (MT/M)	Total (MT/M)
1	Pure Terephtalic Acid	25000	0	25000
2	Pure Isophthalic Acid	0	25000	25000
3	Para Xylene	20840	0	20840
4	Meta Xylene	0	20840	20840
5	Reformate	0	20840	20840
6	Power (MW)	48	0	48
7	Steam (MT/Hr)	250	0	250
8	Iso Pentane , Normal Pentane	1042	0	1042
9	Raffinate & other by products (IG Benzene, Remax-1, Renine)	50509	0	50509
10	LPG (Sr. Grade)	2250	0	2250

32.Total Water Requirement

Dry season:	**Source of water**	MIDC
	Fresh water (CMD):	16960
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	16960
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Wet season:	**Source of water**	MIDC
	Fresh water (CMD):	16960
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	16960
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Details of Swimming pool (If any)	Not applicable	

33.Details of Total water consumed

Particulars	Consumption (CMD)			Loss (CMD)			Effluent (CMD)		
Water Requirement	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**
Domestic	121	0	121	20.1	0	20.1	100.90	0	100.90
Industrial Process	3916	0	3916	916	0	916	3000	0	3000
Cooling tower & thermopack	12923	0	12923	10845.6	0	10845.6	2077.40	0	2077.4

34.Rain Water Harvesting (RWH)	**Level of the Ground water table:**	Not Applicable
	Size and no of RWH tank(s) and Quantity:	Not Applicable
	Location of the RWH tank(s):	Not Applicable
	Quantity of recharge pits:	Not Applicable
	Size of recharge pits :	Not Applicable
	Budgetary allocation (Capital cost) :	Not Applicable
	Budgetary allocation (O & M cost) :	Not Applicable
	Details of UGT tanks if any :	Not Applicable
35.Storm water drainage	**Natural water drainage pattern:**	Not applicable
	Quantity of storm water:	Not applicable
	Size of SWD:	Not applicable
Sewage and Waste water	**Sewage generation in KLD:**	100.90
	STP technology:	Sewage treated along with trade effluent in ETP within PTA division
	Capacity of STP (CMD):	Not Application
	Location & area of the STP:	within PTA division
	Budgetary allocation (Capital cost):	Not Applicable
	Budgetary allocation (O & M cost):	Not Applicable

36.Solid waste Management

Waste generation in the Pre Construction and Construction phase:	**Waste generation:**	No major construction activity is envisaged except limited foundation activity. The waste generated will be disposed as per Construction & Demolition Waste Management Rules, 2016
	Disposal of the construction waste debris:	No major construction activity is envisaged except limited foundation activity. The waste generated will be disposed as per Construction & Demolition Waste Management Rules, 2016
Waste generation in the operation Phase:	**Dry waste:**	The dry waste comprising of plastic bottles, paper and plastic cups, wood waste etc,
	Wet waste:	The wet waste comprising of food and kitchen waste
	Hazardous waste:	Hazardous wastes generated from the facility range from spent catalyst/fullers earth/spent clay, Slop oil, oil containing sludge, used oil, oil soaked cotton rags/hand glove etc,
	Biomedical waste (If applicable):	The biomedical wastes which are generated from Occupational Health Centre (OHC)
	STP Sludge (Dry sludge):	Not Applicable
	Others if any:	The Biological sludge generated from the ETP is utilized as manure & Other solid wastes generated are mainly scrap items which are stored in a material scrap yard and is stacked item wise. These are then disposed though authorized vendors

Mode of Disposal of waste:	**Dry waste:**	Disposed through vendors for recycling
	Wet waste:	Wet waste are sent to piggery
	Hazardous waste:	The hazardous wastes are sold to authorized recyclers, only waste which is not saleable are disposed at a CPCB authorized common hazardous waste treatment and disposal facility at Taloja in Mumbai. This facility is operated by Mumbai Waste Management Ltd. (MWML) and RIL is a member with this facility
	Biomedical waste (If applicable):	The biomedical waste generated from OHC is segregated at source and disposed to facility at Taloja in Mumbai. This facility is operated by Mumbai Waste Management Ltd. (MWML) and RIL is a member with this facility
	STP Sludge (Dry sludge):	Not Applicable
	Others if any:	The Biological sludge generated from the ETP is utilized as manure & Other solid wastes generated are mainly scrap items which are stored in a material scrap yard and is stacked item wise. These are then disposed though authorized vendors
Area requirement:	**Location(s):**	This is only a change in product mix within the existing PTA division. The PTA division is a part of a notified industrial area of MIDC, no additional land is required
	Area for the storage of waste & other material:	Waste during operation will be handled as per present approved practice by MPCB. No additional Haz. waste will be generated in the product change
	Area for machinery:	This is only a change in product mix within the existing PTA division. The PTA division is a part of a notified industrial area of MIDC, no additional land is required
Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	Not Applicable
	O & M cost:	Not Applicable

37.Effluent Charecterestics

Serial Number	Parameters	Unit	Inlet Effluent Charecterestics	Outlet Effluent Charecterestics	Effluent discharge standards (MPCB)
1	pH	-	4-11	6-8	5.5-9.0
2	Oil & Grease	mg/l	5-7	ND	10
3	BOD (3 days 27 Deg C)	mg/l	2500-3000	<60	100
4	Total Dissolved Solids	mg/l	1000-1500	1000-1500	2100
5	Suspended Solids	mg/l	300-400	<80	100
6	COD	mg/l	8000-10000	<160	250
7	Chloride	mg/l	200-300	<200	600
8	Sulphate	mg/l	100-200	<200	1000

Amount of effluent generation (CMD):	5178
Capacity of the ETP:	5500
Amount of treated effluent recycled :	0
Amount of water send to the CETP:	5178
Membership of CETP (if require):	RIL has membership of PRIA CETP at Patalganga MIDC
Note on ETP technology to be used	Please refer prefeasibility report (PFR) for details. PFR attached
Disposal of the ETP sludge	The Biological sludge generated from the ETP is utilized as manure

38.Hazardous Waste Details

Serial Number	Description	Cat	UOM	Existing	Proposed	Total	Method of Disposal
1	Spent catalysts/Fullers earth/Spent clay	1.7	MT/A	300	0	300	Sell to offsite recylers/reprocessor having valid consent of SPCB or to be sent to CHWTSDF
2	Slop OIl	1.8	MT/A	200	0	200	Sell to offsite recyler/reprocessor approved by MoEF/CPCB having valid consent of SPCB
3	OIl containing sludge	3.1	MT/A	50	0	50	Sell to offsite recyler/reprocessor approved by MoEF/CPCB having valid consent of SPCB
4	Used OIl	5.1	MT/A	125	0	125	Sell to offsite recyler/reprocessor approved by MoEF/CPCB having valid consent of SPCB
5	Discarded Asbestos	15.2	MT/A	300	0	300	CHWTSDF
6	Oil soaked cotton rags/hand gloves	35.1	MT/A	100	0	100	CHWTSDF
7	Purge Steam	-	MT/A	12000	0	12000	Sell to offsite recyler/reprocessor having valid consent of SPCB
8	Electronic waste	e-waste	MT/A	1.5	0	1.5	Disposed to Electronic Recycler
9	NA	NA	NA	NA	NA	NA	NA

39.Stacks emission Details

Serial Number	Section & units	Fuel Used with Quantity	Stack No.	Height from ground level (m)	Internal diameter (m)	Temp. of Exhaust Gases
1	Boiler A	Natural Gas/LSHS / FO	Stack Attached to Boiler A	30	3	220 Deg C
2	Boiler B	Natural Gas/LSHS / FO	Stack attached to Boiler B	30	3	220 Deg C
3	Boiler C	Natural Gas/LSHS / FO	tack attached to Boiler C	30	3	220 Deg C
4	HRSG 1	Natural Gas/Naphtha/Kerosene	Stack attahed to HRSG -I	60	3.15	200 Deg C
5	HRSG 2	Natural Gas/Naphtha/Kerosene	Stack attahed to HRSG -II	60	3.15	200 Deg C
6	Flare	LPG (stand by)	Stack attahed to Flare	100	1.0	450 Deg C
7	Process Heater attahed to 1041 Heater	Natural Gas/Process off gas /FO	Stack attahed to Heater 1041	30	0.5	200 Deg C
8	Process Heater attached to 2001 Heater	Natural Gas/Process off gas /FO	Stack attahed to Heater 2001	30	0.5	200 Deg C

9	Process Heater attached to Heater 2002	Natural Gas/Process off gas /FO	Stack attahed to Heater 2002	30	0.5	200 Deg C
10	Process Heater attached to Heaters 3001, 3002,3003	Natural Gas/Process off gas /FO	Stack attahed to Heater 3001,3002,3003	30	0.5	200 Deg C
11	Process Heater attached to Heater 5001	Natural Gas/Process off gas /FO	Stack attahed to Heater 5001	30	0.5	200 Deg C
12	Process Heater aatched to Heater 7001,8001	Natural Gas/Process off gas /FO	tack attahed to Heater 7001 , 8001	30	0.5	200 Deg C
13	Process Heater attahed to 1042 Heater	Natural Gas/Process off gas /FO	tack attahed to Heater 1042	30	0.5	200 Deg C

40.Details of Fuel to be used

Serial Number	Type of Fuel	Existing	Proposed	Total
1	Natural Gas,	1.0924 MMSCMD	0	1.0924 MMSCMD
2	LSHS (Stand-by)	9.3 TPH	0	9.3 TPH
3	FO (Stand By)	0.075 TPH	0	0.075 TPH
4	Naphtha /Kerosene (Stand By)	58.4 TPH	0	58.4 TPH
5	HSD (Stand By)	0.425 TPH	0	0.425 TPH
41.Source of Fuel		GAIL, HPCL, BPCL Refinery, RIL-Jamnagar		
42.Mode of Transportation of fuel to site		Pipeline, Tanker		

43.Green Belt Development	**Total RG area :**	1.6 Ha
	No of trees to be cut :	No plants will be cut
	Number of trees to be planted :	Existing green belt will be strengthen by monitoring the survival rate of the planted trees and identifying the more tolerant species for replacement, if needed
	List of proposed native trees :	Not Applicable. Existing green belt will be strengthen
	Timeline for completion of plantation :	Not Applicable

44.Number and list of trees species to be planted in the ground

Serial Number	Name of the plant	Common Name	Quantity	Characteristics & ecological importance
1	Not Applicable	Not Applicable	Not Applicable	Not Applicable
45.Total quantity of plants on ground				

46.Number and list of shrubs and bushes species to be planted in the podium RG:

Serial Number	Name	C/C Distance	Area m2
1	Not Applicable	Not Applicable	Not Applicable

47.Energy

Power requirement:	**Source of power supply :**	Captive Power Plant
	During Construction Phase: (Demand Load)	No major construction activity is envisaged except limited foundation activity.
	DG set as Power back-up during construction phase	Not Applicable
	During Operation phase (Connected load):	NA
	During Operation phase (Demand load):	48 MW
	Transformer:	NA
	DG set as Power back-up during operation phase:	Not Applicable
	Fuel used:	Natural Gas is the major fuel, Naphtha/LSHS,/FO,/HSD/Kerosene to be used as stand by
	Details of high tension line passing through the plot if any:	Not Applicable

48.Energy saving by non-conventional method:

Not Applicable

49.Detail calculations & % of saving:

Serial Number	Energy Conservation Measures	Saving %
1	Not Applicable	Not Applicable

50.Details of pollution control Systems

Source	Existing pollution control system	Proposed to be installed
PTA Division	ETP	Not Applicable. existing ETP will be utilised

Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	Not Applicable
	O & M cost:	Not Applicable

51.Environmental Management plan Budgetary Allocation

a) Construction phase (with Break-up):

Serial Number	Attributes	Parameter	Total Cost per annum (Rs. In Lacs)
1	Details will be provided in EIA report	Details will be provided in EIA report	Details will be provided in EIA report

b) Operation Phase (with Break-up):

Serial Number	Component	Description	Capital cost Rs. In Lacs	Operational and Maintenance cost (Rs. in Lacs/yr)
1	Details will be provided in EIA report	Details will be provided in EIA report	Details will be provided in EIA report	Details will be provided in EIA report

51.Storage of chemicals (inflamable/explosive/hazardous/toxic substances)

Description	Status	Location	Storage Capacity in MT	Maximum Quantity of Storage at any point of time in MT	Consumption / Month in MT	Source of Supply	Means of transportation
Please refer prefeasibility report (PFR) for details. PFR attached	Please refer prefeasibility report (PFR) for details. PFR attached	Please refer prefeasibility report (PFR) for details. PFR attached	Please refer prefeasibility report (PFR) for details. PFR attached	Please refer prefeasibility report (PFR) for details. PFR attached	Please refer prefeasibility report (PFR) for details. PFR attached	Please refer prefeasibility report (PFR) for details. PFR attached	Please refer prefeasibility report (PFR) for details. PFR attached

52.Any Other Information

No Information Available

53.Traffic Management

	Nos. of the junction to the main road & design of confluence:	This project is only a change in product mix within the existing PTA division. Transportation will be by existing road
Parking details:	**Number and area of basement:**	Not Applicable. This project is only a change in product mix within the existing PTA division
	Number and area of podia:	Not Applicable. This project is only a change in product mix within the existing PTA division
	Total Parking area:	Not Applicable
	Area per car:	Not Applicable
	Area per car:	Not Applicable
	Number of 2-Wheelers as approved by competent authority:	Not Applicable
	Number of 4-Wheelers as approved by competent authority:	Not Applicable
	Public Transport:	Not Applicable
	Width of all Internal roads (m):	8 m
	CRZ/ RRZ clearance obtain, if any:	Not Applicable
	Distance from Protected Areas / Critically Polluted areas / Eco-sensitive areas/ inter-State boundaries	5.17 km aerial distance
	Category as per schedule of EIA Notification sheet	Category B, 5(e)
	Court cases pending if any	Nil

	Other Relevant Informations	NA
	Have you previously submitted Application online on MOEF Website.	Yes
	Date of online submission	01-01-1900

SEAC DISCUSSION ON ENVIRONMENTAL ASPECTS

Environmental Impacts of the project	Not Applicable
Water Budget	Not Applicable
Waste Water Treatment	Not Applicable
Drainage pattern of the project	Not Applicable
Ground water parameters	Not Applicable
Solid Waste Management	Not Applicable
Air Quality & Noise Level issues	Not Applicable
Energy Management	Not Applicable
Traffic circulation system and risk assessment	Not Applicable
Landscape Plan	Not Applicable
Disaster management system and risk assessment	Not Applicable
Socioeconomic impact assessment	Not Applicable
Environmental Management Plan	Not Applicable
Any other issues related to environmental sustainability	Not Applicable

Brief information of the project by SEAC

PP submitted their application for the grant of TOR under category 5(e)B1 as per EIA Notification, 2006. PP presented draft TOR based on standard TOR issued by MoEF & CC published in April, 2015.

DECISION OF SEAC

PP to collect base line data after the grant of ToR.

As the industry is located in the notified industrial area/estate (MIDC), Public Hearing is exempted under the provisions as per para 7 III Stage (3) (b) of the EIA Notification, 2006

Based on the presentation made by PP; committee decided to approve the TOR for the preparation of EIA/EMP report as per standard TOR and additional TOR points mentioned below.

Specific Conditions by SEAC:

1) PP to submit certificate of incorporation of the company. list of directors and memorandum of articles and memorandum of association.
2) PP to submit lay out plan showing entry and exit gates ,internal roads with minimum width of six meters and turning radius of nine meters, location of pollution control equipment, parking areas, 33% green belt in the plant premises, solid and hazardous waste storage areas, rain water harvesting etc
3) PP to carry out life cycle analysis of the activities carried out on site with respect to the sustainability index, green house and ozone depletion potential etc.
4) PP to make corrections in the point No. 15 & 17 of the consolidated statement.
5) PP to make changes in the product list and keep only those items for which application is made. This application will not be for existing products and utilities on the site.
6) PP to include detailed material balance charts for each product showing consumption of raw material, sources of pollution and mitigation measures to control the pollution and justified use of resources along with quantities in the EIA report.
7) PP to carry out HAZOP and Risk Assessment study and submit a Disaster Management Plan.
8) PP to submit details of the waste material management plan in the EIA report.
9) PP to submit process engineering design details like reactors and other process equipment design along with proposed process controls to ensure the safety of people and quality of the products.
10) PP to submit CSR plan prepared in consultation with the District Authorities along with its implementation schedule.
11) PP to carry out life cycle analysis of the activities carried out on site with respect to the sustainability index, green house and ozone depletion potential etc.
12) PP to submit an undertaking for not having any eco sensitive area within the range of 5 KM from the proposed project site.
13) PP to submit chemical handling protocol for all the raw materials to be used on site.
14) PP to submit permission obtained from CETP to discharge 5175 CMD effluent.
15) PP to use solar energy for office building and street lights.
16) PP to provide lightening arrestors.

FINAL RECOMMENDATION

The Committee decided to Grant ToR subject to the above observations,PP requested to prepare and submit EIA report as per EIA Notification, 2006 and amendments thereof.

149th Meeting of State Expert Appraisal Committee (SEAC-1)

SEAC Meeting number: 149th Day-3 **Meeting Date** April 4, 2018

Subject: Environment Clearance for Proposed Production Capacity Enhancement of Sigma Solvents Pvt. Ltd.

Is a Violation Case: No

General Information: Venue: CSIR- National Chemical Laboratory (NCL)Guesthouse, Pashan Road, Pune- 411008,

1.Name of Project	Sigma Solvents Pvt. ltd.
2.Type of institution	Private
3.Name of Project Proponent	Salim Dawood Memon
4.Name of Consultant	Sadekar Enviro Engineers Pvt. Ltd.
5.Type of project	Not applicable
6.New project/expansion in existing project/modernization/diversification in existing project	Expansion in existing project
7.If expansion/diversification, whether environmental clearance has been obtained for existing project	No
8.Location of the project	Plot No. A-39/A-40
9.Taluka	Kalyan
10.Village	Dombivali
11.Area of the project	Phase-I MIDC Dombivali
12.IOD/IOA/Concession/Plan Approval Number	NA
	IOD/IOA/Concession/Plan Approval Number: NA
	Approved Built-up Area: 620
13.Note on the initiated work (If applicable)	NA
14.LOI / NOC / IOD from MHADA/ Other approvals (If applicable)	NA
15.Total Plot Area (sq. m.)	2000 sq.m
16.Deductions	Not applicable
17.Net Plot area	Not applicable
18 (a).Proposed Built-up Area (FSI & Non-FSI)	**a) FSI area (sq. m.):** Not applicable
	b) Non FSI area (sq. m.): Not applicable
	c) Total BUA area (sq. m.): 782
18 (b).Approved Built up area as per DCR	**Approved FSI area (sq. m.):**
	Approved Non FSI area (sq. m.):
	Date of Approval:
19.Total ground coverage (m2)	1244.93 sq.m
20.Ground-coverage Percentage (%) (Note: Percentage of plot not open to sky)	Not applicable
21.Estimated cost of the project	15000000

22.Number of buildings & its configuration

Serial number	Building Name & number	Number of floors	Height of the building (Mtrs)
1	Not applicable	Not applicable	Not applicable

23.Number of tenants and shops	Not applicable
24.Number of expected residents / users	Not applicable

25.Tenant density per hectare	Not applicable
26.Height of the building(s)	
27.Right of way (Width of the road from the nearest fire station to the proposed building(s)	Not applicable
28.Turning radius for easy access of fire tender movement from all around the building excluding the width for the plantation	4 mtrs
29.Existing structure (s) if any	Yes
30.Details of the demolition with disposal (If applicable)	Minor Demolition work is envisaged

31.Production Details

Serial Number	Product	Existing (MT/M)	Proposed (MT/M)	Total (MT/M)
1	3-Ethoxy Propyl Amine	12.5	7.5	20.0
2	3-Methoxy Propyl Amine	12.5	387.5	400
3	Methyl Amino Propyl Amine/N-Methyl Diamine Propane	12.5	7.5	20.0
4	Iso Propoxy Propyl Amine	4.16	15.84	20.0
5	Dimethyl Dipropylene Tri Amine	4.16	15.84	20.0
6	N - Pentyl Amine	--	20.0	20.0
7	Propyl Amine	--	200.0	200.0
8	Di-N-Propyl Amine	--	200.0	200.0
9	3-Butoxy Propyl Amine	--	20.0	20.0
10	Cyclohexyl Amino Propyl Amine	4.16	45.84	50.0
11	Dimethyl Amino Propyl Amine	4.16	45.84	50.0
12	Benzyl Amine	12.5	87.5	100.0
13	4 - Methoxy Benzyl Amine	--	50.0	50.0
14	Beta Phenyl Ethyl Amine	4.16	95.84	100.0
15	N Methyl Benzyl Amine	--	50.0	50.0
16	N, N-DiMethyl benzyl/butyl Amine	--	200	200

17	N methyl cyclohexyl amine	--	100.0	100.0
18	Cyclohexyl Amine	--	100.0	100.0
19	Dicyclohexyl Amine	--	100.0	100.0
20	3-Ethoxy Propionitrile	--	20.0	20.0
21	Propionitrile	12.5	287.5	300.0
22	Off grade amines (Bi-Product)	--	16.88	16.88
23	Ammonia (20%) (Bi-Product)	--	220.95	220.95
24	Off grade nitrile (Bi-Product)	--	7.89	7.89
25	HCl (30%) (Bi-Product)	--	197.0	197.0

32.Total Water Requirement

Dry season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Wet season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable

Details of Swimming pool (If any)	Not applicable

33.Details of Total water consumed

Particulars	Consumption (CMD)			Loss (CMD)			Effluent (CMD)		
Water Requirement	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**
Domestic	2.0	1.0	3.0	0.6	0.0	0.6	1.4	1.0	2.4
Industrial Process	2.5	15.7	18.2	0.0	10.5	10.5	2.5	5.2	7.7
Cooling tower & thermopack	14.0	142.8	156.8	12.0	141.8	153.8	2.0	13	15
Gardening	2.0	0.0	2.0	2.0	0.0	2.0	0.0	0.0	0.0
Fresh water requirement	20.5	159.5	180.0	--	--	--	--	--	--

34.Rain Water Harvesting (RWH)	**Level of the Ground water table:**	NA
	Size and no of RWH tank(s) and Quantity:	NA
	Location of the RWH tank(s):	NA
	Quantity of recharge pits:	NA
	Size of recharge pits :	NA
	Budgetary allocation (Capital cost) :	NA
	Budgetary allocation (O & M cost) :	NA
	Details of UGT tanks if any :	Fire Fighting tank of 100 KL capacity

35.Storm water drainage	**Natural water drainage pattern:**	Proposed
	Quantity of storm water:	450 Lit/hr
	Size of SWD:	As per requirement

Sewage and Waste water	**Sewage generation in KLD:**	2.4
	STP technology:	Sewage wastewater will be treated in the aeration tank of the effluent treatment plant.
	Capacity of STP (CMD):	NA
	Location & area of the STP:	NA
	Budgetary allocation (Capital cost):	NA
	Budgetary allocation (O & M cost):	NA

36.Solid waste Management

Waste generation in the Pre Construction and Construction phase:	**Waste generation:**	Demolition and construction wastes such as debris, scraps, excavated soil, used cement bags, iron / steel scrap and cardboards
	Disposal of the construction waste debris:	Through local Municipal waste disposal system
Waste generation in the operation Phase:	**Dry waste:**	Office waste such as papers/other waste from administrative buildings
	Wet waste:	NA
	Hazardous waste:	Spent catalyst - 10.2 T/A, Spent Carbon - 3 MT/A, SEE Residue - 0.004 T/day, ETP sludge - 7.62 MT/A, Packing Waste Material - 300 kg/month, Empty drums & Carboys 100 no./month
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	NA
	Others if any:	NA
Mode of Disposal of waste:	**Dry waste:**	Through local Municipal waste disposal system
	Wet waste:	NA
	Hazardous waste:	Mumbai Waste Management - CHWTSDF , Taloja
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	NA
	Others if any:	NA
Area requirement:	**Location(s):**	Dedicated Hazardous Waste Storage Area will be provided as per plot layout
	Area for the storage of waste & other material:	9.0 sq.m.
	Area for machinery:	--
Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	1,50,000.00
	O & M cost:	30,000.00

37.Effluent Charecterestics

Serial Number	Parameters	Unit	Inlet Effluent Charecterestics	Outlet Effluent Charecterestics	Effluent discharge standards (MPCB)
1	pH	--	3.0-4.0	7.0-8.0	6-8.5
2	TDS	mg/l	2000 - 2100	1600 - 1900	<2100

3	BOD	mg/l	2000 - 3000	80 - 90	< 100
4	COD	mg/l	5000 - 6000	200 - 240	< 250
5	O & G	mg/l	20 - 25	5 - 6	< 10

Amount of effluent generation (CMD):	25.1
Capacity of the ETP:	ETP capacity - 12 CMD, RO capacity - 20 CMD, SEE capacity - 6 CMD
Amount of treated effluent recycled :	18.16 CMD
Amount of water send to the CETP:	6.94 CMD
Membership of CETP (if require):	Company is having membership of Dombivli CETP
Note on ETP technology to be used	The 7.7 m3/day effluent form manufacturing process viz. reactor washing & process water & 2.4 m3/day domestic effluent will be treated in ETP of 12 CMD comprising of primary & secondary treatment scheme off which 6.9 m3/day will be disposed to CETP & thus 3.2 m3/day from ETP along with 15 m3/day boiler & cooling tower blow down a total of 18.2 m3/day effluent will be subjected to R.O of 20 m3/day capacity, thus 12.74 m3/day RO permeate will be recycled for cooling tower & 5. 46 m3/day R.O reject
Disposal of the ETP sludge	ETP sludge will be disposed off to Mumbai Waste Management - CHWTSDF at Taloja

38.Hazardous Waste Details

Serial Number	Description	Cat	UOM	Existing	Proposed	Total	Method of Disposal
1	Spent catalyst	28.2	T/A	1.2	9.0	10.2	Mumbai Waste Management - CHWTSDF, Taloja
2	Spent Carbon	28.3	MT/A	--	3.0	3.0	Mumbai Waste Management - CHWTSDF, Taloja
3	SEE Residue	37.3	T/D	--	0.004	0.004	Mumbai Waste Management - CHWTSDF, Taloja
4	ETP sludge	35.3	MT/A	0.12	7.5	7.62	umbai Waste Management - CHWTSDF, Taloja
5	Packaging Waste Material	33.1	kg/M	100.0	200.0	300.0	Sold to authorized recycler/ Mumbai Waste Management - CHWTSDF
6	Empty Drums, Carboys	33.1	No./M	--	100.0	100.	Sold to authorized recycler/ Mumbai Waste Management - CHWTSDF

39.Stacks emission Details

Serial Number	Section & units	Fuel Used with Quantity	Stack No.	Height from ground level (m)	Internal diameter (m)	Temp. of Exhaust Gases
1	2 TPH steam boiler & 20 lakh kilo calorie/hour thermic fluid heater	Furnace Oil - 9.080 T/D	1	40.33	0.6	200
2	500 kVA D.G Set	High Speed Diesel	2	3.16 (above roof level)	0.3 m x 0.6 m	350

3	HCl Scrubber	--	3	12.0	0.4	40
4	Ammonia Scrubber (Dicyclo hexylamie unit)	--	4	12.0	0.3	40
5	Ammonia Scrubber (Di-N-Propyl Amine unit)	--	5	12.0	0.4	40

40.Details of Fuel to be used

Serial Number	Type of Fuel	Existing	Proposed	Total
1	Furnace Oil	3.8 MT/D	5.28 T/D	9.080 T/D
2	High Speed Diesel	427.44 l/Day (Total consumption will depend on hours of power failure)	1200 Liter/8hrs	1200 Liter/8 hrs (Only 1.2 KL is needed as existing D.G set will be scraped out)
41.Source of Fuel		Furnace Oil: Local Vendor (Balaji Enterprises), High Speed Diesel: Local Vendor (Techno Auto Service)		
42.Mode of Transportation of fuel to site		By Road		

43.Green Belt Development	**Total RG area :**	145 sq.m.
	No of trees to be cut :	NA
	Number of trees to be planted :	47
	List of proposed native trees :	Oroxylum indicum, Butea monosperma, Cassia fistula, Macaranga peltata, Pterospermum acerifolium, Derris indica, Holoptelea integrifolia
	Timeline for completion of plantation :	1 year after grant of Environmental Clearance

44.Number and list of trees species to be planted in the ground

Serial Number	Name of the plant	Common Name	Quantity	Characteristics & ecological importance
1	Oroxylum indicum	Tetu	5	A native ornamental tree.
2	Butea monosperma	Palash	5	A native brilliantly flowering tree fed by local birds fairly common and abundant across the Thane District.
3	Cassia fistula	Bahava	5	Native ornamental tree having flowers attracting bees and butterflies
4	Macaranga peltata	Chandwar	5	A native tree found in abundance across the sahyadri range
5	Pterospermum acerifolium	Muchkund	5	A native evergreen tree used for ornamental plantations.
6	Derris indica	Karanja	7	A native tree blooming throughout the year
7	Holoptelea integrifolia	Vavala	5	A native tree abundantly found in Thane District
45.Total quantity of plants on ground				

46.Number and list of shrubs and bushes species to be planted in the podium RG:

Serial Number	Name	C/C Distance	Area m2
1	NA	NA	NA

47.Energy

Power requirement:	**Source of power supply :**	Maharashtra State Electricity Distribution Company Limited - MSEDCL
	During Construction Phase: (Demand Load)	NA
	DG set as Power back-up during construction phase	NA
	During Operation phase (Connected load):	500 kVA
	During Operation phase (Demand load):	500 kVA
	Transformer:	750 kVA
	DG set as Power back-up during operation phase:	500 kVA
	Fuel used:	High Speed Diesel
	Details of high tension line passing through the plot if any:	NA

48.Energy saving by non-conventional method:

NA

49.Detail calculations & % of saving:

Serial Number	Energy Conservation Measures	Saving %
1	NA	NA

50.Details of pollution control Systems

Source	Existing pollution control system	Proposed to be installed
2 TPH steam boiler & 20 lakh kilo calorie/hour thermic fluid heater	--	Stack of 40.33 m height
500 kVA D.G Set	--	Stack of 3.16 m height (above roof level)
Process	--	1 no. HCl Scrubber, 1 no. Ammonia Scrubber (Dicyclo hexylamie unit), 1 no. Ammonia Scrubber (Di-N-Propyl Amine unit)

Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	NA
	O & M cost:	NA

51.Environmental Management plan Budgetary Allocation

a) Construction phase (with Break-up):

Serial Number	Attributes	Parameter	Total Cost per annum (Rs. In Lacs)
1	NA	NA	NA

b) Operation Phase (with Break-up):

Serial Number	Component	Description	Capital cost Rs. In Lacs	Operational and Maintenance cost (Rs. in Lacs/yr)
1	Air	Installation of new common stack of 40.33 m height for 2 TPH steam boiler & 20 lakh kilo calorie/hour thermic fluid heater & installation of 1 no. HCl Scrubber, 1 no. Ammonia Scrubber (Dicyclo hexylamie unit), 1 no. Ammonia Scrubber (Di-N-Propyl Amine unit)	50,00,000.00	1,50,000.00
2	Water	Up gradation of existing ETP with installation of 20 CMD capacity R.O & 5 CMD capacity SEE	73,00,000.00	10,15,000.00
3	Noise	Development of acoustic enclosure & installation of shock absorbers and vibration absorbing pads	75,000.00	6,00,000.00
4	Occupational Heath	Purchase of PPE's, health check ups	5,65,000.00	4,75,000.00
5	Green Belt	Development of green belt	85,000.00	70,800.00
6	Solid Waste	Purchase of soild waste storage bags, containers	1,50,000.00	30,000.00

51.Storage of chemicals (inflamable/explosive/hazardous/toxic substances)

Description	Status	Location	Storage Capacity in MT	Maximum Quantity of Storage at any point of time in MT	Consumption / Month in MT	Source of Supply	Means of transportation
40% Dimethyl amine	Liquid	Tank Farm	73.26	10 + 25	171.06	Local	Tanker
40% Mono Methyl amine	Liquid	Tank Farm	154.5	15 + 50	154.5	Local	Tanker
Acrylonitrile	Liquid	Tank Farm	726.66	25 + 100	726.66	Import via. Kandla Port	Road (Tanker)
Ammonia	Gas	Tank Farm	35.82	0.05	35.82	Local	Road Tanker

Benzaldehyde	Liquid	Tank Farm	106.86	25	106.86	Local	Road Tanker
Benzyl chloride	Liquid	Tank Farm	205.6	50	406.6	Local/Import	Tanker/Container
Benzyl Cyanide	Liquid	Tank Farm	104.28	25	104.28	Local	Road
Cyclo Hexyl Amine	Liquid	Tank Farm	158.28	50	158.28	Import	Road ISO Container
Dimethyl Amine	Gas	Cylinder	24.51	0.05	24.51	Local	Truck
Hydrogen	Gas	Trolley	70.28	150 kg	65.81	Local	Truck
Mono Methyl Amine	Gas	Cylinder	7.8	0.05	7.8	Local	Truck
Nitrogen	Gas	Cylinder	12.59	1000m3	12.59	Local	Truck
Para Anisic Aldehyde	Liquid	Tank Farm	54.84	25	54.84	Local	Truck
Propionitrile	Liquid	Tank Farm	188.13	20 + 50	188.13	Import	Road ISO Container
Propyl Amine	Liquid	Tank Farm	236	15 + 50	236	--	--
Raney Nickel Catalyst	Solid	Enclosed shed	9.72	0.03	0.097	Domestic	Road
Valeronitrile	Liquid	Enclosed shed	21.15	0.18	21.15	Import	Road Truck
Methanol	Liquid	Tank Farm	175.65	10	175.65	Local	Tanker
Iso Propyl Alcohol	Liquid	Enclosed shed	13.65	0.16	13.65	Local	Tanker
Special Denatured Spirit	Liquid	Enclosed shed	20.16	0.16	20.16	Local	Tanker
Butanol	Liquid	Enclosed shed	12.51	0.17	12.51	Local	Tanker
Butyl Chloride	Liquid	Tank Farm	201	50	201	Local/Import	Tanker/Container
Cyclohexnone	Liquid	Tank Farm	203.98	25	203.98	Local	Truck
Dimethyl Amino propyl Amine	Liquid	Tank Farm	14.2	25	14.2	Local	Truck

52.Any Other Information

No Information Available

53.Traffic Management

	Nos. of the junction to the main road & design of confluence:	NA
Parking details:	**Number and area of basement:**	NA
	Number and area of podia:	NA
	Total Parking area:	12.06 sq.m
	Area per car:	NA
	Area per car:	NA
	Number of 2-Wheelers as approved by competent authority:	NA
	Number of 4-Wheelers as approved by competent authority:	NA
	Public Transport:	NA
	Width of all Internal roads (m):	4-5 mtr

	CRZ/ RRZ clearance obtain, if any:	NA
	Distance from Protected Areas / Critically Polluted areas / Eco-sensitive areas/ inter-State boundaries	1.Mangrove Reserve Forest at Ulhas Creek at an aerial distance of 4.4 km from the project site
	Category as per schedule of EIA Notification sheet	B1
	Court cases pending if any	NO
	Other Relevant Informations	Some of the raw materials & finished goods will be stored outside the plant premises. (A) Raw Materials - Acrylonitrile, Propionitrile, Propyl Amine, 40 % DMA Solution, 40 % MMA Solution. B) Products Di-Propyl Amine, 3- Methoxy Propyl amine, N- Methyl Cyclohexyl amine/Cyclohexyl amine/ Dicyclohexylamine)
	Have you previously submitted Application online on MOEF Website.	Yes
	Date of online submission	23-05-2017

SEAC DISCUSSION ON ENVIRONMENTAL ASPECTS

Environmental Impacts of the project	PP submitted EIA report to the committee. Various aspects of the Environment are discussed in the report. PP has conducted base line data collection for Air, Water, Soil & Noise parameters as per EIA Notification, 2006 amended from time to time. PP proposes Zero Liquid Discharge for proposed expansion activity, PP provided scrubber and stack height of 40.33 meters to control the air pollution. As per data submitted by the PP in the EIA report environmental parameters are found within the prescribed limits.
Water Budget	PP submitted water budget calculations in the EIA report and also indicated water requirement at Sr. No 33 of the Consolidated Statement.
Waste Water Treatment	PP proposes Effluent Treatment Plant and Zero Liquid Discharge.
Drainage pattern of the project	Not Applicable
Ground water parameters	As per data submitted by PP ground water parameters are within the prescribed limits at project site.
Solid Waste Management	PP committed to dispose the hazardous waste at Common Hazardous Waste Treatment, Storage, and Disposal Facility and sale to Authorized vendors. Details are given at Sr. No. 38 of the Consolidated Statement.
Air Quality & Noise Level issues	As per data submitted by PP Air Quality and Noise parameters are within the prescribed limits at project site.
Energy Management	The electrical demand for proposed project is 500 KVA, which will be supplied by MSEDCL. PP also proposes to have 500 KVA DG set with HSD as a fuel. PP committed to provide solar energy for street lights and office buildings.
Traffic circulation system and risk assessment	PP has indicated in the lay out plan that internal roads will be of six meter width along with nine meters of turning radius for smooth circulation of traffic. PP provided 12% parking area which seems to be sufficient for parking of the vehicles.
Landscape Plan	PP provided 33% green belt.
Disaster management system and risk assessment	PP carried out HAZOP and Risk Assessment and submitted DMP.

Socioeconomic impact assessment	PP has carried out socio economic impact study and included in the EIA report.
Environmental Management Plan	PP prepared EMP cost of Rs.131.75 Lakh as capital cost and Rs,23.40 Lakh as O & M cost to maintain environmental parameters.
Any other issues related to environmental sustainability	Not Applicable

Brief information of the project by SEAC

PP submitted their application for the grant of TOR under category 5(f)B1 as per EIA Notification, 2006 for expansion of existing unit. PP presented draft TOR based on standard TOR issued by MoEF & CC published in April, 2015.

As the industry is located in the notified industrial area/estate (MIDC), Public Hearing is exempted under the provision as per para 7 III Stage (3) (b) of the EIA Notification, 2006.

During discussion PP informed that, they have started manufacturing activity since 1997 and have not changed any production mix, quantity etc. till date.

ToR was grnated in the 139th meeting of SEAC held on 29.06.2017 for the preparation of EIA/EMP report as per standard TOR and additional TOR points mentioned below.

1. PP to ensure the stability of existing manufacturing structures/buildings and submit copies of structural stability certificates.

2. PP to submit the copies of Consents obtained from competent authority, copies of sanctioned plan from MIDC, Water bills etc. to establish no change in the production facility.

3. During presentation it was observed that the proposed layout plan is very congested and have no scope for movement of emergency vehicles around the storage and manufacturing plants like Fire Tender etc. Also there is no scope for maintaining greenery inside the premises as per prevailing rules and regulation; PP advised to look in to the layout and submit revised layout in the EIA reprot.

4. PP to provide minimum road width of six meters and turning radius 9 meters for easy movements of vehicle.

5. PP to include details of gas emissions generation in the manufacturing process of each product and stage with their quantities, material balance etc.; PP to include same in the EIA report.

6. PP to submit an affidavit for achieving Zero Liquid Discharge along with design details of Effluent Treatment Plant.

7. PP to submit their plan to achieve 33% of green belt as per National Forest Policy.

DECISION OF SEAC

After deliberations with the PP and his accredited consultant SEAC decided to recommend the proposal for prior Environmental Clearance tot eh SEIAA.

Specific Conditions by SEAC:

1) PP to ensure strict compliance of the recommendations of HAZOP and Risk Assessment Studies.
2) PP to implement CSR plan in consultation with the District Authorities and maintain separate account for the same.

FINAL RECOMMENDATION

SEAC-I have decided to recommend the proposal to SEIAA for Prior Environmental clearance subject to above conditions

149th Meeting of State Expert Appraisal Committee (SEAC-1)

SEAC Meeting number: 149th Day-3 **Meeting Date** April 4, 2018

Subject: Environment Clearance for Proposed expansion of Sugar Plant from 2500 TCD to 6000 TCD at gut no. 148, 206, Dattatraynagar, A/P Pargaon Via Awasan Bk., Tal. Ambegaon, Dist. Pune

Is a Violation Case: No

1.Name of Project	BHIMA SHANKAR SAHAKARI SAKHAR KARKHANA LIMITED
2.Type of institution	Private
3.Name of Project Proponent	Mr.Chandrakant G. Dhage
4.Name of Consultant	MITCON Consultancy & Engineering Services Ltd.
5.Type of project	Industrial
6.New project/expansion in existing project/modernization/diversification in existing project	Expansion of existing project Sugar Unit-ENV(NOC)2000/7931/CR177/DI dt.19/12/2000 19Mw Cogen.-SEAC-2011/CR-755/TC2
7.If expansion/diversification, whether environmental clearance has been obtained for existing project	Existing project has a environmental clearance for Cogen Power plant
8.Location of the project	Plot No. 148,206,
9.Taluka	Ambegaon
10.Village	Dattatraya Nagar, P.O. Pargaon via Awasari
Correspondence Name:	Mr.Chandrakant G. Dhage
Room Number:	NA
Floor:	NA
Building Name:	NA
Road/Street Name:	NA
Locality:	NA
City:	NA
11.Area of the project	Village
12.IOD/IOA/Concession/Plan Approval Number	NA
	IOD/IOA/Concession/Plan Approval Number: NA
	Approved Built-up Area: 00000
13.Note on the initiated work (If applicable)	NA
14.LOI / NOC / IOD from MHADA/ Other approvals (If applicable)	NA
15.Total Plot Area (sq. m.)	Not applicable
16.Deductions	Not applicable
17.Net Plot area	Not applicable
18 (a).Proposed Built-up Area (FSI & Non-FSI)	**a) FSI area (sq. m.):** Not applicable
	b) Non FSI area (sq. m.): Not applicable
	c) Total BUA area (sq. m.): 00000
18 (b).Approved Built up area as per DCR	**Approved FSI area (sq. m.):**
	Approved Non FSI area (sq. m.):
	Date of Approval:
19.Total ground coverage (m2)	Not applicable
20.Ground-coverage Percentage (%) (Note: Percentage of plot not open to sky)	Not applicable
21.Estimated cost of the project	820000000

22.Number of buildings & its configuration

Serial number	Building Name & number	Number of floors	Height of the building (Mtrs)
1	Not applicable	Not applicable	Not applicable

23.Number of tenants and shops	Not applicable
24.Number of expected residents / users	Not applicable
25.Tenant density per hectare	Not applicable
26.Height of the building(s)	
27.Right of way (Width of the road from the nearest fire station to the proposed building(s)	NA
28.Turning radius for easy access of fire tender movement from all around the building excluding the width for the plantation	Not applicable
29.Existing structure (s) if any	Not applicable
30.Details of the demolition with disposal (If applicable)	Not applicable

31.Production Details

Serial Number	Product	Existing (MT/M)	Proposed (MT/M)	Total (MT/M)
1	SUGAR	2500	3500	6000

32.Total Water Requirement

Dry season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable

Wet season:	**Source of water**	Not applicable
	Fresh water (CMD):	Not applicable
	Recycled water - Flushing (CMD):	Not applicable
	Recycled water - Gardening (CMD):	Not applicable
	Swimming pool make up (Cum):	Not applicable
	Total Water Requirement (CMD) :	Not applicable
	Fire fighting - Underground water tank(CMD):	Not applicable
	Fire fighting - Overhead water tank(CMD):	Not applicable
	Excess treated water	Not applicable
Details of Swimming pool (If any)	Not applicable	

33.Details of Total water consumed

Particulars	Consumption (CMD)			Loss (CMD)			Effluent (CMD)		
Water Requirement	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**	**Existing**	**Proposed**	**Total**
Industrial Process	461	285	746	87.5	122.5	210	373.5	162.5	536

34.Rain Water Harvesting (RWH)	**Level of the Ground water table:**	NA
	Size and no of RWH tank(s) and Quantity:	NA
	Location of the RWH tank(s):	NA
	Quantity of recharge pits:	NA
	Size of recharge pits :	NA
	Budgetary allocation (Capital cost) :	NA
	Budgetary allocation (O & M cost) :	NA
	Details of UGT tanks if any :	NA

35.Storm water drainage	**Natural water drainage pattern:**	NA
	Quantity of storm water:	NA
	Size of SWD:	NA

Sewage and Waste water	**Sewage generation in KLD:**	NA
	STP technology:	NA
	Capacity of STP (CMD):	NA
	Location & area of the STP:	NA
	Budgetary allocation (Capital cost):	NA
	Budgetary allocation (O & M cost):	NA

36.Solid waste Management

Waste generation in the Pre Construction and Construction phase:	**Waste generation:**	NA
	Disposal of the construction waste debris:	NA
Waste generation in the operation Phase:	**Dry waste:**	NA
	Wet waste:	NA
	Hazardous waste:	NA
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	NA
	Others if any:	NA
Mode of Disposal of waste:	**Dry waste:**	NA
	Wet waste:	NA
	Hazardous waste:	NA
	Biomedical waste (If applicable):	NA
	STP Sludge (Dry sludge):	NA
	Others if any:	NA
Area requirement:	**Location(s):**	NA
	Area for the storage of waste & other material:	NA
	Area for machinery:	NA
Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	NA
	O & M cost:	NA

37.Effluent Charecterestics

Serial Number	Parameters	Unit	Inlet Effluent Charecterestics	Outlet Effluent Charecterestics	Effluent discharge standards (MPCB)
1	NA	NA	NA	NA	NA
Amount of effluent generation (CMD):		536			
Capacity of the ETP:		Existing ETP with Capacity of 750m3/day & after expansion ETP capacity will be 1350 M3/day			

Amount of treated effluent recycled :	NA
Amount of water send to the CETP:	NA
Membership of CETP (if require):	NA
Note on ETP technology to be used	NA
Disposal of the ETP sludge	Used as Manure

38.Hazardous Waste Details

Serial Number	Description	Cat	UOM	Existing	Proposed	Total	Method of Disposal
1	Used Spent Oil	5.1	Kg/D	2.0	00	2.0	Reuse in Boiler

39.Stacks emission Details

Serial Number	Section & units	Fuel Used with Quantity	Stack No.	Height from ground level (m)	Internal diameter (m)	Temp. of Exhaust Gases
1	Stack	Bagasse	1	72	NA	NA

40.Details of Fuel to be used

Serial Number	Type of Fuel	Existing	Proposed	Total
1	Bagasse	1560 MT/Day	00	1560 MT/Day
41.Source of Fuel		Bagasse From Own Plant		
42.Mode of Transportation of fuel to site		NA		

43.Green Belt Development	**Total RG area :**	2000 Square meter
	No of trees to be cut :	NA
	Number of trees to be planted :	10000
	List of proposed native trees :	Will be provided
	Timeline for completion of plantation :	3 yrs

44.Number and list of trees species to be planted in the ground

Serial Number	Name of the plant	Common Name	Quantity	Characteristics & ecological importance
1	NA	NA	NA	NA
45.Total quantity of plants on ground				

46.Number and list of shrubs and bushes species to be planted in the podium RG:

Serial Number	Name	C/C Distance	Area m2
1	NA	NA	NA

47.Energy

Power requirement:	**Source of power supply :**	Own Cogeneration plant
	During Construction Phase: (Demand Load)	NA
	DG set as Power back-up during construction phase	NA
	During Operation phase (Connected load):	NA
	During Operation phase (Demand load):	NA
	Transformer:	NA
	DG set as Power back-up during operation phase:	NA
	Fuel used:	NA
	Details of high tension line passing through the plot if any:	NA

48.Energy saving by non-conventional method:

NA

49.Detail calculations & % of saving:

Serial Number	Energy Conservation Measures	Saving %
1	NA	NA

50.Details of pollution control Systems

Source	Existing pollution control system	Proposed to be installed
Stack	Wet Scrubber	ESP

Budgetary allocation (Capital cost and O&M cost):	**Capital cost:**	NA
	O & M cost:	NA

51.Environmental Management plan Budgetary Allocation

a) Construction phase (with Break-up):

Serial Number	Attributes	Parameter	Total Cost per annum (Rs. In Lacs)
1	NA	NA	NA

b) Operation Phase (with Break-up):

Serial Number	Component	Description	Capital cost Rs. In Lacs	Operational and Maintenance cost (Rs. in Lacs/yr)
1	Noise Control System	NA	15	2
2	Green Belt Development	NA	10	2
3	Environment Monitoring and Management	NA	20	15

4	Water Pollution Control System - ETP	NA	50	10
5	Occupational Health & Safety	NA	10	3

51.Storage of chemicals (inflamable/explosive/hazardous/toxic substances)

Description	Status	Location	Storage Capacity in MT	Maximum Quantity of Storage at any point of time in MT	Consumption / Month in MT	Source of Supply	Means of transportation
NA	NA	NA	NA	NA	NA	NA	NA

52.Any Other Information

No Information Available

53.Traffic Management

	Nos. of the junction to the main road & design of confluence:	NA
Parking details:	**Number and area of basement:**	NA
	Number and area of podia:	NA
	Total Parking area:	NA
	Area per car:	NA
	Area per car:	NA
	Number of 2-Wheelers as approved by competent authority:	NA
	Number of 4-Wheelers as approved by competent authority:	NA
	Public Transport:	NA
	Width of all Internal roads (m):	NA
	CRZ/ RRZ clearance obtain, if any:	NA
	Distance from Protected Areas / Critically Polluted areas / Eco-sensitive areas/ inter-State boundaries	NA
	Category as per schedule of EIA Notification sheet	5j

	Court cases pending if any	NA
	Other Relevant Informations	NA
	Have you previously submitted Application online on MOEF Website.	No
	Date of online submission	-

SEAC DISCUSSION ON ENVIRONMENTAL ASPECTS

Environmental Impacts of the project	PP submitted EIA report to the committee. Various aspects of the Environment are discussed in the report. PP has conducted base line data collection for Air, Water, Soil & Noise parameters as per EIA Notification, 2006 amended from time to time. PP proposes to use treated ETP water for irrigation of the sugar cane fields and development of green belt within the premises, PP provided boiler stack height of 72 meters to control the air pollution. As per data submitted by the PP in the EIA report environmental parameters are found within the prescribed limits at site.
Water Budget	PP submitted water budget calculations in the EIA report and also indicated water requirement at Sr. No 33 of the Consolidated Statement.
Waste Water Treatment	PP provided Effluent Treatment Plant. PP proposes to use treated ETP water for irrigation purpose and for the development of green belt.
Drainage pattern of the project	Not Applicable
Ground water parameters	As per data submitted by PP ground water parameters are within the prescribed limits at project site.
Solid Waste Management	Baggase and waste oil is proposed to be reused in the Boiler.
Air Quality & Noise Level issues	As per data submitted by PP Air Quality are within the prescribed limits at project site. PP to identify the sources of noise pollution and take measures to reduce noise level on site like provision of acoustic enclosures, isolation of noise making equipments, etc.
Energy Management	The energy demand required for proposed project will be met by existing cogeneration plant.
Traffic circulation system and risk assessment	There is adequate space for parking purpose.
Landscape Plan	PP has already developed adequate green belt in the proposed project site.
Disaster management system and risk assessment	PP carried out HAZOP and Risk Assessment and submitted DMP.
Socioeconomic impact assessment	PP has carried out socio economic impact study and included in the EIA report.
Environmental Management Plan	PP prepared EMP cost of Rs.105 Lakh as capital cost and Rs,32 Lakh as O & M cost to maintain environmental parameters.
Any other issues related to environmental sustainability	PP to undertake awareness program among the sugar cane cultivators and implement appropriate measures to reduce salinity hazards and maintain proper soil health for sustainable productivity of sugar cane.

Brief information of the project by SEAC

PP submitted their application for the grant of TOR under category 5(j)B1 as per EIA Notification, 2006 for expansion of existing unit. PP presented draft TOR based on standard TOR issued by MoEF & CC published in April, 2015 in the 136th meeting of SEAC - I held on 5th to 7th October,2016 wherein ToR was grnated to the project.

Now PP submitted EIA/EMP report and Public Hearing Report for the appraisal.

DECISION OF SEAC

After detailed deliberations with the PP and his accridited consultant SEAC decided to recommend the proposal for prior Environmental Clearance to the SEIAA.

Specific Conditions by SEAC:

1) PP to plan and execute 100% drip irrigation in phase wise manner so as to ensure efficient use of water.
2) PP to submit an undertaking to achieve less than 100 mg/Nm3 of TPM at the out let of ESP.
3) PP to undertake appropriate mitigation measures to maintain noise level within prescribed limits.
4) PP to undertake awareness program among the sugar cane cultivators and implement appropriate measures to reduce salinity hazards and maintain proper soil health for sustainable productivity.
5) PP to implement CSR plan in consultation with the District Authorities and maintain separate account for the same.

FINAL RECOMMENDATION

SEAC-I have decided to recommend the proposal to SEIAA for Prior Environmental clearance subject to above conditions