Proceedings of 164<sup>th</sup> meeting of State Environment Impact Assessment Authority (SEIAA) held on 12.06.2020 at 10:30 AM in the Conference Hall No -3, Ist Floor, MGSIPA Complex, Sector-26, Chandigarh

The following were present:

- 1) Sh. Kuldip Singh, IFS (Retd.), Chairman, SEIAA
- 2) Sh. Charandeep Singh, PCS Member Secretary, SEIAA
- Dr. Sunil Mittal, Member, SEIAA

Item No. 164.01: Confirmation of the minutes of the 163<sup>rd</sup> meeting of the State Environment Impact Assessment Authority (SEIAA) held on 29.05.2020.

SEIAA was apprised that the proceedings of the 163<sup>rd</sup> meeting of SEIAA held on 29.05.2020 were circulated vide email dated 09.06.2020. No observation was received from any member of SEIAA. SEIAA noted the same and confirmed the said proceedings.

Item No. 164.02: Action taken on the proceedings of 160th, 161st, 162<sup>nd</sup>. 163<sup>rd</sup> meeting of SEIAA held on 30.01.2020, 27.02.2020, 19.03.2020, and 29.05.2020 respectively.

SEIAA noted that action on the proceedings of 160<sup>th</sup>, 161<sup>st</sup> and 162<sup>nd</sup> meeting of SEIAA held on 30.01.2020, 27.02.2020 & 19.03.2020, were taken. SEIAA decided to take the following action:-

- i) For table item No 3 of the 160<sup>th</sup> meeting of SEIAA, a reminder be sent to the Board every quarter for seeking monitoring reports of the conditions of environmental clearances granted to the various project.
- ii) For item No 162.09 of 162<sup>nd</sup> meeting of SEIAA in the matter of Judicial Court and Administrative Complex, Tarn Tarn, Punjab, a reminder be sent to the Board for seeking a report in the matter.

Further, it was directed that action on the proceedings of the 163<sup>rd</sup> meeting of SEIAA held on 29.05.2020 be completed at the earliest without any further delay, and action taken report be placed in the next meeting of SIEAA. Follow up item shall also be placed as a separate item in the next meeting of SEIAA.

Item No 164.03: Application for Environmental Clearance under EIA notification dated 14.09.2006 for the establishment of Commercial project "Orbit Signature Walk" located at VIP Road, Zirakpur, SAS Nagar (Punjab) by M/s Orbit Apartment Construction Pvt. Ltd (Proposal No. SIA/PB/MIS/128629/2019).

SIEAA observed as under: -

## 1.0 Background

The project proponent has filed an application for obtaining Environment Clearance under EIA notification, 2006 for the establishment of a commercial project "Orbit Signature Walk" located at VIP Road, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar.

# 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020. SEAC observed that the Environmental Engineer, PPCB, Regional Office, Mohali vide letter no 1157 dated 14.02.2020 intimated that no construction work has been started by the promoter company. Also, the site of the project was conforming to the siting guidelines laid down by the Govt. of Punjab, Department of Science Technology and Environment vide order dated 25/07/2008 as amended on 30/ 10/2009.

The environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under: -

S.No	.Item	Details					
1.	Online Proposal No.	SIA/PB/	SIA/PB/MIS/128629/2019				
2.	Name & Location of the	Commer	cial project "C	Orbit Signature Wa	alk"		
	project	located at VIP Road, Zirakpur, SAS Nagar (Punjab)					
3.	Latitude & Longitude	S.No.	Corner	Latitude	Longitude		
		1	Corner A	30°38'23.42"N	76°49'19.22"E		
		2	Corner B	30°38'22.74"N	76°49'19.29"E		
		3	Corner C	30°38'20.88"N	76°49'18.11"E		
		4	Corner D	30°38'21.06"N	76°49'17.52"E		
		5 Corner E 30°38'14.64"N 76°49'14.48"					
		6 Corner F 30°38'15.58"N 76°49'12.32"E					
		7	Corner G	30°38'20.50"N	76°49'14.87"E		

4.	Project/activity covered	8(a) `Bui	Iding & Construction Projec	t′
	under item of scheduled			
	to the EIA			
	Notification,14.09.2006			
5.	Whether the project is in	No		
	critical polluted area or			
	not.			
6.	Does the project involve	No		
	diversion of forest land? If			
	yes,			
	a. Extent of the forest			
	land.			
	b. Status of the forest			
	clearance.			
7.	Does the project cover	No		
	under PLPA, 1900			
8.	Does the project fall within	No		
	10 km of eco-sensitive			
	area/ National park/Wild			
	Life Sanctuary?			
9.	Classification/Land use	"Existing	built-up area"	
	pattern as per Master Plan			
10.	Cost of the project	Rs. 55.59	9 Crores	
11.	Environmental Clearance.	Rc 9477(	)/- Vide NEFT No S1755369	) dated 27 11 2019
	Fee details	103 54770	of vide NET 1 NO 317 33303	dated 27.11.2019
11.	Total Plot Area, Built-up	S.No.	Description	Area
	Area, and Green area	1.	Plot Area	15,381.27 sqm
			(Total scheme area)	(i.e. 3.801 acres)
		2.	Built-up area	47,380.76m <sup>2</sup>
		3.	Green area	714.49m <sup>2</sup>
13.	Population	7,230 Pe	rsons.	
	(when fully operational)			
14.	Water Requirements &	50 KLD	(Max) treated wastewate	er will be used for
	source in Construction	construc	tion purposes depending u	oon the requirement
	Phase	and the	same will be met from ne	earby STPs by using
		private v	vater tankers	
			demand for 50 workers d	•
			9 45 LPCD) shall be met fro	m the groundwater.
15.	Breakup of Water Requirem	nents & s	ource in Operation Phase	

# (Summer, Rainy, Winter):

S.No.	Season	Total water	Flushing water	Freshwater
		requirement	requirement	requirement
		(KLD)	(KLD)	(KLD)
	Basis	@45 Lpcd	@16 lpcd	@ 29 lpcd
1.	Summer	325 KLD	116	209
2.	Winter	325 KLD	116	209
3	Rainy	325 KLD	116	209

S.No.	Season	Basis	Green	Treated
			Area	wastewater
				requirement
	Unit	ltr/sqm/day	(sqm)	KLD
1.	Summer	5.5	116	4
2.	Winter	1.8 ltr/sqm/day	116	1.5
3	Rainy	0.5 ltr/sqm/day	116	0.5

S.No.	Description	Source of water
1.	Domestic	Borewell: 1 No.
		(To a query of SEAC, the project proponent submitted an undertaking dated 04.02.20 to the effect that he will construct only one borewell for groundwater abstraction after obtaining necessary approvals from CGWA. Further, the project proponent will use 10 HP power motor for the tubewell.)
2.	Flushing	Treated wastewater
	purposes	
3.	Green area	Treated wastewater

16. Treatment & Disposal arrangements of wastewater in Construction Phase

Disposal Wastewater generated (2.4 KLD) will be treated in the septic tank and treated wastewater will be used for plantation purposes.

Handling of waste material during the construction phase

Waste Material handling will be carried out as per waste Construction and Demolition (C&D) Waste the Management Rules, 2016. The site contractor will be responsible for the collection & storage of construction and demolition waste generated on the site.

17.	Disposal Arrangement of Wastewater in Operation Phase	Total wastewater generation will be 260 KLD (80% of 325 KLD) out of which black water will be 182 KLD (kitchen @ 66 KLD +Flushing @116 KLD) and greywater will be 78 KLD (Washing + Bathing). 182 KLD black water will be treated in STP of capacity 200 KLD based on MBBR technology and 78 KLD greywater will be treated in WWTP of capacity 100 KLD to be installed within the project premises. Reuse of treated wastewater and discharge of surplus treated wastewater is given as under:				
			Season	Flushing (KLD)	Green area (KLD)	Sewer (KLD)
			Summer	116	4.0	135
			Winter	116	1.5	137.5
			Monsoon	116	0.5	138.5
10	<b>b</b> · · · · ·	_				
18.	Rainwater recharging	218 m³/hr of rainwater will be collected in 5 no. of				
10	detail	Rainwater recharging pits with dual-bore.				
19.	Solid waste generation and					
20	Graan Rolt Dovolanment	d	degradable ) 650 Kg/day Converted ir of size 500 horticulture ) 766 Kg/day of handed over Waste Mana ) 30 Kg/day Discarded process tube lights thermometer gauge, etc. as per Solid	providing bit Components at of Bio-degral ato Manure us at 150 kg and proposes with of Non-biodeg at to authorized agement Rules about drums, expired mers, used basil be disposed Waste Management Rules and the control of the contro	ins) into received and non-biode and non-biode and able Solid National Mechanical the same within the project radable or dry d waste pickers, 2016.  In azardous was pesticide can be dicines, broadled off to author gement Rules,	eyclable, Bio- egradable. Waste will be al Composters ill be used for a site. waste will be as as per Solid aste such as s, CFL bulbs, oken mercury contaminated orized vendors 2016.
20.	Green Belt Development		otal 200 no of			
	_	1 .				
	to be planted & its species	s.area of 15,381.27 sqm) (In reply to the query of SEAC, the project proponent				
		1.				
			ubmitted a rev			uetails of the
		Cl	rees to be plar	ited inside the	e project).	

21.	Hazardous Waste &E-	Us	sed oil from DG	sets will	be sold to re	egistered	
	Waste	re	cyclers and E-v	waste will	be is dispose	ed of as per the	
		E-	waste (Manage	ement) An	nendment Ri	ules 2018.	
22.	Energy Requirements	a)	3,434KW from	n PSPCL.			
	& Saving	b)	6 number of D	OG set's of	f capacity 75	0 KVA each	
		(s	ilent DG set)				
			nergy Saving m				
			•	•	•	ne rooftop of the	
			_		-	ar panels will be	
			129.11 m² (whi			· ·	
		1	763.69 m²) wh	iich wiii ge	enerate 120	Kw of power	
		_	eneration. i) Rooftop a	roa – 51	276 27 ca. fi	t. (or 4,763.69	
			sq.mt.)	iea – 51,	270.37 Sq. 11	(01 4,703.09	
		i	ii) Space available for solar panel = 15,382.91 sq.				
			ft. (or 142	29.11 Sq.n	nt.) (@ 30%	)	
		ii	i) Area req.	for 1 KW	solar panel =	= 12 sq.mt.	
			,		ited = 120 K		
					),000 per KW		
		۷	i) Total cost	Approx.	= Rs. 96 Lak	hs.	
23.	Environment Management		Description	Capital	Recurring	Monitoring of	
	Plan along with Budgetary		·	cost	cost	Air, Noise,	
	breakup phase-wise and			(lakhs)	(lakhs)	water (per	
	responsibility to implement	t				annum) Rs.	
			Construction	215	11	1	
			phase which				
			includes the				
			cost of STP				
			and WWTP				
			Operation	-	18.5	1	
23	Other Permissions		,	•		o 3063 dated	
						main sewer is	
				-		sed project and	
						with the main	
		sewer of MC of then capacity for the discharge of treated wastewater (as per the standards					
				-	=	P installed in its	
project after depositing the r prescribed by the Govt. and							
			approved	-	Sovi. and g	jetting the map	
1	1	1	approved				

- ii) MC, Zirakpur vide letter no 3065 dated 25.11.2019 informed that it will make the necessary arrangements for the lifting of waste material and garbage. Expenditure in this regard shall be borne by the project proponent.
- iii) Competent Authority cum Dy. Director, Local Govt. Patiala vide letter no 20134 dated 30.07.2019 has granted CLU under subsection (1) of section 81 of the Punjab Regional and Town Planning and Development Act, 1995 for 18 Bigghe -5 Biswa for the Commercial Purpose to the promoter company.
- 24 CER activities along with budgetary break-up and responsibility to implement

Mr. Parshotam Singh Grewal (Director) of M/s. Orbit Apartment Construction Pvt. Ltd. will be responsible for the implementation of CER (Corporate Environmental Responsibility). As the project cost is Rs 55.59 Crores and Rs. 56 Lakhs have been reserved for CER activities as per Office Memorandum of CER dated 01.05.2018. It was proposed to spent Rs 56/- lacs for providing wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.

#### 3.0 Recommendations of SEAC

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations to grant Environmental Clearance for the establishment of a commercial project "Orbit Signature Walk" having a built-up area of 47380.76 sqm in a total land area of 15381.27 sqm located at VIP Road, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant, with proposed measures, conditions prescribed in **Annexure-I of the proceedings** subject to following additions, amendments and deletions given as under:

#### Conditions to be added in the Annexure-I as under: -

- The project proponent shall plant 200 no. of trees of native varieties within the projects as per the guidelines of the MoEF/SEIAA.
- ii) The project proponent shall utilize only one borewell having motor power as mentioned in the CGWA application to abstract the groundwater. Other borewell if any, will be sealed/buried and compliance of the same be submitted to the SEIAA along with six-monthly report.

#### Conditions to be amended in the Annexure-I as under: -

# Condition no. iv), v-a) & xv) of III. Water quality monitoring and preservation

- iv) The total domestic water requirement for the project will be 325 KLD, out of which 209 KLD shall be met through its tube well and remaining through the recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a)The total wastewater generation from the project will be 260 KLD out of which black water will be 182 KLD and greywater will be 78 KLD, which will be treated in proposed STP of capacity 200 KLD based on MBBR technology and WWTP of capacity 100 KLD respectively, to be installed within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater of 255 KLD available at the outlet of STP & WWTP after evaporation and other losses, shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)	(KLD)	(KLD)
1.	Summer	116	4.0	135
2.	Winter	116	1.5	137.5
3.	Rainy	116	0.5	138.5

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 5 nos of rainwater harvesting recharge pits (with dual-bore) shall be provided for groundwater recharging as per CGWA norms. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

# Condition no. i) & iv) of X of Corporate Environment Responsibility

- i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least a minimum amount of Rs. 56,00,000/- for providing wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved

by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate accounts and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 215.0 Lacs towards capital cost and Rs 12.0 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 19.5 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/resident's society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Parshottam Grewal, Director of the promoter company.
- ii) Sh. Sandeep Garg, EIA Coordinator, M/s Eco Laboratories & Consultants Pvt. Lab, Mohali

Environmental Consultant of the project proponent presented the salient features of the project which was taken on record. During the meeting, the following observations were made to which project proponent replied as under:

Sr. No	Observations	Reply
1	As per the report of PPCB, one building already exists on the site and is being used as an office. Clarify?	The building was already existing at the site at the time of purchase. The project proponent submitted the translated copies of the Girdawari showing that earlier there was a school on the site in 2010 and later on, the same has been entered as Gair Mumkin Building.
2.	What is the distance of the project site from the Sukhna Wildlife Sanctuary.	
3.	As per the condition imposed by SEAC, only one borewell has been allowed for the project. Whether it will suffice the requirement of the project.	Yes, there will be no more requirements for the tube well for the project.

During discussions, representative of the promoter company agreed to comply with fully all the conditions as mentioned by SEAC.

The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for the establishment of the commercial project namely "Orbit Signature Walk" having a built-up area of 47380.76 sqm in a total land area of 15381.27 sqm located at VIP Road, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant, with proposed measures and following conditions as recommended by SEAC & certain amendments therein & agreed by the Project proponent:

# I. Statutory compliance:

- i) The project proponent shall obtain all necessary clearances/ permissions from all relevant agencies including town planning authority before commencement of work. All the construction shall be done in accordance with the local building bye-laws.
- ii) The approval of the Competent Authority shall be obtained for the structural safety of buildings due to earthquakes, adequacy of firefighting equipment, etc. as per National Building Code including protection measures from lightning, etc.
- iii) The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.
- iv) The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.
- v) The project proponent shall obtain Consent to Establish / Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the Punjab Pollution Control Board.
- vi) The project proponent shall obtain the necessary permission for drawl of groundwater/ surface water required for the project from the competent authority.
- vii) A certificate of adequacy of available power from the agency supplying power to the project along with the load allowed for the project should be obtained.
- viii) All other statutory clearances such as the approvals for storage of diesel from Chief Controller of Explosives, Fire Department, Civil Aviation Department shall be obtained, as applicable, by project proponents from the respective competent authorities.

- ix) The provisions of the Solid Waste (Management) Rules, 2016, E-Waste (Management) Rules, 2016, Construction & Demolition Waste Rules, 2016, and the Plastics Waste (Management) Rules, 2016 shall be followed.
- x) The project proponent shall follow the ECBC/ECBC-R prescribed by the Bureau of Energy Efficiency, Ministry of Power strictly.
- xi) The project site shall conform to the suitability as prescribed under the provisions laid down under the master plan of respective city/ town. For that, the project proponent shall either submit the NOC/ land use conformity certificate from Deptt of Town and Country Planning or other concerned Authority under whose jurisdiction, the site falls.
- xii) Besides above, the project proponent shall also comply with siting criteria/guidelines, standard operating practices, code of practice, and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of projects.
- xiii) The project proponent shall get the layout plans approved from the Competent Authority for the activities/establishments to be set up at the project site in consonance with the project proposal for which this environment clearance is applied.

# II. Air quality monitoring and preservation

- i) Notification GSR 94(E) dated 25.01.2018 of MoEF&CC regarding Mandatory Implementation of Dust Mitigation Measures for Construction and Demolition Activities for projects requiring Environmental Clearance shall be complied with.
- ii) A management plan shall be drawn up and implemented to contain the current exceedance in the ambient air quality at the site.
- iii) The project proponent shall install a system to carry out Ambient Air Quality monitoring for common /criterion parameters relevant-to the main pollutants released (e.g. PM10 and PM2.5) covering upwind and downwind directions during the construction period.
- iv) Diesel power generating sets proposed as a source of backup power should be of enclosed type and conform to rules made under the Environment (Protection) Act, 1986. The height of the stack of DG sets should be equal to the height needed for the combined capacity of all proposed DG sets. The use of low sulphur diesel should be ensured. The location of the DG sets may be decided in consultation with Punjab Pollution Control Board.
- v) Construction site shall be adequately barricaded before the construction begins. Dust, smoke & other air pollution prevention measures shall be provided for the building as well as the site. These measures shall include screens for the building under construction, continuous dust/ wind-breaking walls all around the site (at least 3m height or 1/3rd of the building height and maximum upto 10m). Plastic/tarpaulin sheet covers shall be provided for vehicles bringing in sand, cement, murram, and other construction

- materials prone to causing dust pollution at the site as well as taking out debris from the site.
- vi) No Excavation of soil shall be carried out without adequate dust mitigation measures in place.
- vii) No loose soil or sand or construction & demolition waste or any other construction material that causes dust shall be left uncovered.
- viii) No uncovered vehicles carrying construction material and waste shall be permitted
- ix) All the topsoil excavated during construction activities should be stored for use in horticulture/landscape development within the project site.
- x) Grinding and Cutting of building material in an open area shall be prohibited. Wet jet shall be provided for grinding and stone cutting.
- xi) Unpaved surfaces and loose soil shall be adequately sprinkled with water to suppress dust.
- xii) All construction and demolition debris shall be stored at the site within the earmarked area and roadside storage of construction material and waste shall be prohibited. All demolition and construction waste shall be managed as per the provisions of the Construction and Demolition Waste Rules 2016.
- xiii) The diesel generator sets to be used during the construction phase shall be low sulphur diesel type and shall conform to the standards as enumerated in the Environmental (Protection) Rules, 1986 as prescribed for air and noise emission.
- xiv) The gaseous emissions from the DG set shall be dispersed through adequate stack height as per CPCB standards. Acoustic enclosure shall be provided to the DG sets to mitigate noise pollution. Low sulphur diesel shall be used. The location of the DG set and exhaust pipe height shall be as per the provisions of the Central Pollution Control Board (CPCB) norms.
- xv) For indoor air quality, the ventilation provisions as per the National Building Code of India shall be followed.
- xvi) Roads leading to or at the construction site must be paved and blacktopped (i.e. metallic road)
- xvii) Dust Mitigation measures shall be displayed prominently at the construction site for easy public viewing.
- xviii) Construction and Demolition Waste Processing and Disposal site shall be identified and required dust mitigation measures be notified at the site.

## III. Water quality monitoring and preservation

i) The natural drain system should be maintained for ensuring the unrestricted flow of water.

- ii) No construction shall be allowed to obstruct the natural drainage through the site, on wetland and water bodies. Check dams, bio-swales, landscape, and other sustainable urban drainage systems (SUDS) are allowed for maintaining the drainage pattern and to harvest rainwater.
- iii) Buildings shall be designed to follow the natural topography as much as possible. Minimum cutting and filling should be done.
- iv) The total domestic water requirement for the project will be 325 KLD, out of which 209 KLD shall be met through its tube well and remaining through the recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a)The total wastewater generation from the project will be 260 KLD out of which black water will be 182 KLD and greywater will be 78 KLD, which will be treated in proposed STP of capacity 200 KLD based on MBBR technology and WWTP of capacity 100 KLD respectively, to be installed within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater of 255 KLD available at the outlet of STP & WWTP after evaporation and other losses, shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)	(KLD)	(KLD)
1.	Summer	116	4.0	135
2.	Winter	116	1.5	137.5
3.	Rainy	116	0.5	138.5

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

- b) A storage tank of adequate capacity shall be provided for the storage of treated wastewater and all efforts shall be made to supply the same for construction purposes.
- c) During the construction phase, the project proponent shall ensure that the wastewater being generated from the labour quarters/toilets shall be treated and disposed of in an environment-friendly manner. The project proponent shall also exercise the option of modular bio-toilets or will provide proper and adequately designed septic tanks for the treatment of such wastewater and treated effluents shall be utilized for green area/plantation
- vi) The project proponent shall ensure a safe drinking water supply to the habitants. Adequate treatment facility for drinking water shall be provided if required.
- vii) The quantity of freshwater usage, water recycling, and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.

- viii) A certificate shall be obtained from the local body supplying water, specifying the total annual water availability with the local authority, the quantity of water already committed, the quantity of water allotted to the project under consideration, and the balance water available. This should be specified separately for groundwater and surface water sources, ensuring that there is no impact on other users.
- ix) At least 20% of the open spaces as required by the local building bye-Jaws shall be pervious. Use of Grass pavers, paver blocks with at least 50% opening, landscape, etc. would be considered as pervious surface.
- x) Installation of dual pipe plumbing for supplying fresh water for drinking, cooking and bathing, etc. and other for supply of recycled water for flushing, landscape irrigation, car washing, thermal cooling, conditioning, etc. shall be done.
- xi) The respective project proponent shall discourage the installation of R.O. plants in their projects in order to save the wastage in the form of RO reject. However, in case the requirement of installing RO plant is utmost necessary then the rejected stream from the RO shall be separated and shall be utilized by storing the same within the particular component i.e. (Tower/Mall) or in a common place in the project premises.
- xii) The project proponent shall also adopt the new/innovating technologies like less water discharging taps (faucet with aerators)/urinals with electronic sensor system /water less urinals / twin flush cisterns/ sensor based alarming system for overhead water storage tanks and make it a part of the environmental management plans / building plans so as to reduce the water consumption/groundwater abstraction in their Building Construction & Industrial projects.
- xiii) The project proponent will provide plumbing system for reuse of treated wastewater for flushing/ HVAC/ other purposes etc. and colour coding of different pipelines carrying water/wastewater from different sources / treated wastewater as follows:

Sr.	Nature of the Stream	Colour code
No		
a)	Fresh water	Blue
b)	Untreated wastewater from Toilets/ urinal & from Kitchen	Black
c)	Untreated wastewater from Bathing/shower area, hand washing (Washbasin / sinks) and from Cloth Washing	Grey
d)	Reject water streams from RO plants & AC condensate (this is to be implemented wherever centralized AC system and common RO has been proposed in the Project). Further, in case of individual houses/establishment this proposal may also be implemented wherever possible.	White

E	e)	Treated wastewater (for reuse only for plantation purposes) from the STP treating black water	Green
f	·)	Treated wastewater (for reuse for flushing purposes or any other activity except plantation) from the STP treating grey water	Green with strips
Ç	3)	Storm water	Orange

- xiv) Water demand during construction should be reduced by use of pre-mixed concrete, curing agents and other best practices referred.
- xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 05 nos of rainwater harvesting recharge pits (with dualbore) shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.
- xvi) All recharge should be limited to shallow aquifer.
- xvii) No groundwater shall be used during the construction phase of the project. Only treated sewage/wastewater shall be used. A proper record in this regard should be maintained and available at the site.
- xviii) Any groundwater dewatering should be properly managed and shall conform to the approvals and the guidelines of the CGWA in the matter. Formal approval shall be taken from the CGWA for any groundwater abstraction or dewatering.
- xix) The quantity of freshwater usage, water recycling, and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- sewage shall be treated in the STP with tertiary treatment. STP shall be installed in phased manner viz a viz in module system designed in such a way so as to efficiently treat the wastewater with increase in its quantity due to rise in occupancy. The treated effluent from STP shall be recycled/re-used for flushing, AC make up water, and gardening. No treated water shall be disposed of into municipal storm water drain.
- xxi) No sewage or untreated effluent water would be discharged through storm water drains. Onsite sewage treatment of capacity of treating 100% wastewater to be installed. The installation of the Sewage Treatment Plant (STP) shall be certified by an independent expert and a report in this regard shall be submitted to the Ministry before the project is commissioned for operation. Treated wastewater shall be reused on site for landscape, flushing, cooling tower, and other end-uses. Excess treated water shall be

- discharged as per statutory norms notified by Ministry of Environment, Forest and Climate Change. Natural treatment systems shall be promoted.
- xxii) Periodical monitoring of water quality of treated sewage shall be conducted. Necessary measures should be made to mitigate the odour problem from STP.
- Sludge from the onsite sewage treatment, including septic tanks, shall be collected, conveyed and disposed of as per the Ministry of Urban Development, Central Public Health and Environmental Engineering Organization (CPHEEO) Manual on Sewerage and Sewage Treatment Systems, 2013.

### IV. Noise monitoring and prevention

- i) Ambient noise levels shall conform to residential area/commercial area/industrial area/silence zone both during day and night as per Noise Pollution (Control and Regulation) Rules, 2000. Incremental pollution loads on the ambient air and noise quality shall be closely monitored during construction phase. Adequate measures shall be made to reduce ambient air and noise level during construction phase, so as to conform to the stipulated standards by CPCB/SPCB.
- ii) Noise level survey shall be carried out as per the prescribed guidelines and report in this regard shall be submitted to Regional Office of the Ministry as a part of six-monthly compliance report.
- iii) Acoustic enclosures for DG sets, noise barriers for ground-run bays, ear plugs for operating personnel shall be provided as mitigation measures for noise impact due to ground sources.

### V. Energy Conservation measures

- i) Compliance with the Punjab Energy Conservation Building Code (PECBC) of Energy Efficiency shall be ensured.
- ii) Outdoor and common area lighting shall be LED.
- iii) Concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc. shall be incorporated in the building design. Wall, window, and roof u-values shall be as per ECBC specifications.
- iv) Energy conservation measures like installation of LEDs for lighting the area outside the building should be integral part of the project design and should be in place before project commissioning.
- v) Solar, wind or any other Renewable Energy equipment shall be installed to meet electricity generation equivalent to at least 1% of the demand load or

- as per the state level/ local building bye-laws requirement, whichever is higher.
- vi) Solar power by utilizing at least 30% of the rooftop area shall be used for lighting in the apartment to reduce the power load on grid. Separate electric meter shall be installed for solar power.

## VI. Waste Management

- i) A certificate from the competent authority handling municipal solid wastes, indicating the existing civic capacities of handling and their adequacy to cater to the M.S.W. generated from project shall be obtained.
- ii) Disposal of muck during construction phase shall not create any adverse effect on the neighbouring communities and be disposed of taking the necessary precautions for general safety and health aspects of people, only in approved sites with the approval of competent authority.
- iii) Separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- iv) Organic waste compost/ Vermiculture pit/ Organic Waste Converter within the premises with a minimum capacity of 0.3 kg /person/day must be installed for treatment and disposal of the waste.
- v) All non-biodegradable waste shall be handed over to authorized recyclers for which a written tie up must be done with the authorized recyclers.
- vi) Any hazardous waste generated during construction phase, shall be disposed of as per applicable rules and norms with necessary approvals of the State Pollution Control Board.
- vii) Use of environment friendly materials in bricks, blocks and other construction materials, shall be required for at least 20% of the construction material quantity. These include Fly Ash bricks, hollow bricks, AACs, Fly Ash Lime Gypsum blocks, Compressed earth blocks, and other environment friendly materials.
- viii) Fly ash should be used as building material in the construction as per the provision of Fly Ash Notification of September, 1999 and amended as on 27th August, 2003 and 25th January, 2016. Ready mixed concrete must be used in building construction.
  - ix) Any wastes from construction and demolition activities related thereto shall be managed in such a way so as to strictly conform to the Construction and Demolition Rules, 2016.
  - x) Used CFLs and TFLs should be properly collected and disposed off/sent for recycling as per the prevailing guidelines/ rules of the regulatory authority to avoid mercury contamination.

#### VII. Green Cover

- i) No tree shall be felled/transplanted unless extreme exigencies demand. Where absolutely necessary, tree felling shall be with prior permission from the concerned regulatory authority. Old trees should be retained based on girth and age regulations as may be prescribed by the Forest Department. Plantations to be ensured species (cut) to species (planted).
- ii) At least single line plantation all around the boundary of the project as proposed shall be provided. The open spaces inside the plot should be suitably landscaped and covered with vegetation of indigenous species/variety. A minimum of one tree for every 80 sqm of total project land should be planted and maintained. The existing trees will be counted for this purpose. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping. The plantation should be provided as per SEIAA guidelines.
- Where the trees need to be cut with prior permission from the concerned local Authority, compensatory plantation in the ratio of 1: 10 (i.e. planting of 10 trees for every 1 tree that is cut) shall be done and maintained. Plantations to be ensured species (cut) to species (planted). Area for green belt development shall be provided as per the details provided in the project document.
- iv) Topsoil should be stripped to a depth of 20 cm from the areas proposed for buildings, roads, paved areas, and external services. It should be stockpiled appropriately in designated areas and reapplied during plantation of the proposed vegetation on site.
- v) The project proponent shall not use any chemical fertilizer /pesticides /insecticides and shall use only Herbal pesticides/insecticides and organic manure in the green area.
- vi) The green belt along the periphery of the plot shall achieve attenuation factor conforming to the day and night noise standards prescribed for residential land use.

## **VIII. Transport**

- i) A comprehensive mobility plan, as per MoUD best practices guidelines (URDPFI), shall be prepared to include motorized, non-motorized, public, and private networks. Road should be designed with due consideration for environment, and safety of users. The road system can be designed with these basic criteria.
  - a) Hierarchy of roads with proper segregation of vehicular and pedestrian traffic.
  - b) Traffic calming measures.
  - c) Proper design of entry and exit points.

- d) Parking norms as per local regulation.
- ii) Vehicles hired for bringing construction material to the site should be in good condition and should have a pollution check certificate and should conform to applicable air and noise emission standards and be operated only during non-peak hours.
- iii) A detailed traffic management and traffic decongestion plan shall be drawn up to ensure that the current level of service of the roads within a 05 kms radius of the project is maintained and improved upon after the implementation of the project. This plan should be based on cumulative impact of all development and increased habitation being carried out or proposed to be carried out by the project or other agencies in this 05 Kms radius of the site in different scenarios of space and time and the traffic management plan shall be duly validated and certified by the State Urban Development department and the P.W.D./ competent authority for road augmentation and shall also have their consent to the implementation of components of the plan which involve the participation of these departments.
- iv) Traffic congestion near the entry and exit points from the roads adjoining the proposed project site must be avoided. Parking should be fully internalized and no public space should be utilized.

#### IX. Human health issues

- i) All workers working at the construction site and involved in loading, unloading, carriage of construction material and construction debris or working in any area with dust pollution shall be provided with dust mask.
- ii) For indoor air quality the ventilation provisions as per National Building Code of India shall be strictly followed.
- iii) Emergency preparedness plan based on the Hazard identification and Risk Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.
- iv) Occupational health surveillance of the workers shall be done on a regular basis.
- v) A First Aid Room shall be provided in the project both during construction and operations of the project.

### X. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending

at least a minimum amount of Rs. 56,00,000/- for providing wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.

- ii) The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions to all shareholders / stake holders. The copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of six-monthly report.
- iii) A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- Action plan for implementing EMP and environmental conditions along with the iv) responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 215.0 Lacs towards the capital cost and Rs 12.0 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 19.5 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/resident's society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

### XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier.

#### XII. Miscellaneous

- i) The project proponent before allowing any occupancy shall obtain completion and occupancy certificate from the Competent Authority and submit a copy of the same to SEIAA, Punjab.
- ii) The project proponent shall comply with the conditions of CLU.
- iii) The project proponent shall prominently advertise it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days indicating that the project has been accorded

- environment clearance and the details of MoEF&CC /SEIAA website where it is displayed.
- iv) The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- v) The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.
- vi) The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the ministry of Environment, Forest and Climate Change at Environment Clearance portal.
- vii) The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii) The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities, commencing the land development work and start of production /operation by the project.
- ix) The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.
- x) The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- xi) No further expansion or modifications in the plant/project shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).
- xii) Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiii) The SEIAA/Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xiv) The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xv) The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities

- should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data/ information/monitoring reports.
- The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvii) Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

#### **Additional Conditions: -**

- i) The project proponent shall plant 200 no. of trees of native varieties within the projects as per the guidelines of the MoEF/SEIAA.
- ii) The project proponent shall utilize only one borewell having motor power as mentioned in the CGWA application to abstract the groundwater. Other borewell, if any, will be sealed/buried and compliance of the same be submitted to the SEIAA along with six-monthly report.

Item No. 164.04 Application for Environmental Clearance under EIA notification dated 14.09.2006 for Group Housing Project namely "Exotic Magnifiq" located at Village Kishanpura, Tehsil Derabassi, Distt. SAS Nagar (Mohali), Punjab by M/s Exotic Builders and Developers (Proposal No. SIA/PB/MIS/127251/2019).

SEIAA observed as under:

## 1.0 Background

The project proponent has filed an application for obtaining Environment Clearance under EIA notification, 2006 for the establishment of a Group Housing project "Exotic Magnifiq" located at Village Kishanpura, Tehsil Derabassi, Distt. SAS Nagar (Mohali).

# 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020. SEAC observed that the Environmental Engineer, PPCB, Nodal Office, Mohali vide letter no 1151 dated 14.02.2020 has intimated that no construction work has been started by the promoter company and boundary has been demarcated. The site of the project was conforming to the siting guidelines laid down by the Govt. of Punjab, Department of Science Technology and Environment vide order dated 25/07 /2008 as amended on 30/10/2009.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under: -

Sr.No.	Item	Details
1.	Online Proposal No.	SIA/PB/MIS/127251/2019
2.	Name and Location of the project	"Exotic Magnifiq"
		located at Village Kishanpura, Tehsil Derabassi,
		Distt. SAS Nagar (Mohali), Punjab
3.	Latitude & Longitude	The corner co-ordinates of project location are:
		A: 30°39'6.03"N and 76°51'12.15"E
		B: 30°39'5.41"N and 76°51'14.01"E
		C: 30°39'8.76"N and 76°51'15.37"E
		D: 30°39'9.55"N and 76°51'12.89"E
		E: 30°39'8.19"N and 76°51'12.35"E
		F: 30°39'7.93"N and 76°51'12.93"E
4.	Project/activity covered under	S.No. 8(a) - 'Building & Construction Project'
	item of scheduled to the EIA	
	Notification, 14.09.2006.	

5.	Whether the project is in critical	No				
	polluted area or not.					
6.	Does the project involve diversion of forest land? If yes, a. Extent of the forest land. b. Status of the forest clearance.	No.				
7.	Does the project cover under PLPA, 1900	No				
8.	Does the project fall within 10 km of eco-sensitive area/ National park/Wild Life Sanctuary? if yes, Status of NBWL clearance.	Yes, Khol Hi- Raitan Wildlife Sanctuary, Panchkula is located at a distance of 5.5 km from the project location. But, the eco-sensitive zone of the sanctuary is 925 m from the boundary of the sanctuary. Thus, there is no requirement of NBWL clearance.				
9.	Classification/Land use pattern as perMaster Plan.	The proposed project site falls in the Residential zone as per the Master Plan of Zirakpur.				
10.	Cost of the project	Rs. 48	3.49 Crores.			
11.	Total Plot Area, Built-up area, and	Sr.	Description	Total(sqm)		
	Green Area.	No.				
		1.	Land area	7,190.635sq.m.		
				(or 1.776 acres)		
		2.	Built-up area	22,163.25 sq.m		
		3.	Green Area	1,302.940sq.m		
12	EC fee details	Rs 4 04.11	14330/- NEFT .2019	No S4507787 d	ated	
13	Population (when fully operational)	539 p	ersons.			
14.	Water requirements & source in Construction Phase	20 KLD (max) Treated wastewater will be used for construction purposes as per the requirement and the same will be met from nearby STPs by using private water tankers  Domestic demand for 50 workers during peak period @ 3 KLD (@ 45 LPCD) shall be met from				
		the groundwater.				
15	Breakup of Water Requirements & source in Operation Phase (Summer, Rainy, Winter):  During the operational phase, water supply will be provided from 2 bore wells. The					
	total domestic water requirement		•			

requirement will be 46 KLD. 27.5 KLD of sewage (black water) will be generated from the project which will be treated in STP of 40 KLD capacity based on MBBR technology. While 27.5 KLD of greywater will be generated from the project which will be treated in WWTP of 45 KLD. Break-up of the same is given below:

S.	Seasons	Freshwater		Reuse water			Total
No.							
							(KLD <b>)</b>
		Domestic	Others	Flushing	Green	HVAC	
		(KLD)	(Pl define	purpose	area	If any	
			KLD)	(KLD)	(KLD)	(KLD)	
1.	Summer	46	-	23	7	-	76
2.	Winter	46	-	23	2	-	71
3.	Rainy	46	-	23	1	-	70

S.No.	Season	Basis	Green	Treated
			Area	wastewater
				requirement
	Unit	ltr/sqm/day	(sqm)	KLD
1.	Summer	5.5	1303	7
2.	Winter	1.8 ltr/sqm/day	1303	2
3	Rainy	5.5 ltr/sqm/day	1303	1

# Sources of water:

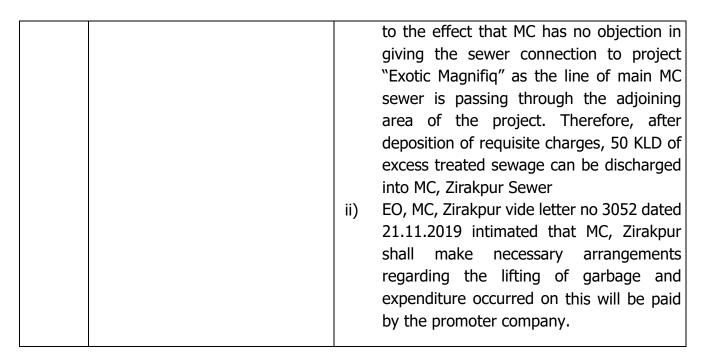
	S.No.	Purposes	Source	of water		
	1.	Domestic	Groundwater: 01 Borewell.			
			(In rep	ly to the observation of SEAC, the		
			1.	proponent submitted an undertaking		
				04.03.2020 to the effect that he will		
			construct only one borewell for			
				cion after obtaining necessary		
				als from CGWA. Further, the project		
			' '	ent will use 10 HP power motor for the		
			tubewel	1.)		
	2.	Flushing purposes	Treated	wastewater		
	3.	Green area	Treated	wastewater		
16.	Treatme	ent & disposal	eptic Tank			
	arrange	ments of wastewater	or plantatio	n on the green area.		
	in Const	truction Phase				
17.	Disposa	l arrangement of	A total quantity of 55 KLD of wastewater will be			
	wastew	ater in Operation	generated. Out of which, 27.5 KLD of sewage			
	Phase		olack water	r) generated from the project will be		

				ted in STP of 40 nology. While erated from the TP of capacity ect premises. For discharge of some as under: -	27.5 KL e project v 45 KLD to l Reuse of tr	D of grewill be trewing the beinstalled was	eywater ated in I within tewater
			•		(KLD)	(KLD)	if any (KLD)
			1.	Summer	23	7	24
			2.	Winter	23	2	29
			3.	Rainy	23	1	33
18.	Rainwater	Internally		ater recharging		een propos	
	recharging detail	generated and the g recharging	from reen pits h	the rooftop are area within the nave been proportions.	ea, paved/ro e project po osed within	oad area, c remises. 5 the project	pen area, rainwater premises.
19.	Solid waste generation and its disposal	During Operation Phase, about 206 kg/day (@ 0.40 kg/capita/day for residential and @ 0.2 kg/capita/day for floating) of solid waste will be generated. Garbage chute system will be provided. The solid waste shall be duly segregated into biodegradable and non-biodegradable components. A separate area will be earmarked for the segregation of solid waste. Biodegradable waste will be composted by the use of Mechanical Composter. Inert waste will be dumped to the authorized dumping site. The recyclable waste shall be sold to resellers.					
F20.	Green Belt Development Plan including no. of trees to be planted & its species.	submitted a revised layout plan providing details of the trees to					
21.	Hazardous Waste &E- Waste	will be disp Manageme	posed nt Ru	e in the form of l of to authoriz les, 2016 and E nagement Rules	ed vendors -waste will	as per So	olid Waste
22.	Energy requirements	a) 803 KV (PSPCL)		om Punjab Sta	te Power	Corporatio	n Limited

	9. caving	b) 2 DC cots of	capacity 2F	0 KV/A oach (cilo	nt DC cotc)			
	& saving	*	b) 2 DG sets of capacity 250 KVA each (silent DG sets).					
		Energy-saving	Energy-saving measures:					
		a) Solar panels have been proposed on the rooftop of the						
		towers. The	total area c	overed by solar	panels is 2,964 sq.			
		ft. (or 275 s	gm) which is	30% of the ter	race area i.e. 9,881			
		sq. ft. (or 9	18 sqm) wh	nich will generat	te 23 KW of power			
		generation.		_	·			
		b) LED lights w	ill be used.					
23	Environment	During the con	struction pha	ase, 164 lakhs w	ill be responsible for			
	Management	the implement	ation of E	MP, and duri	ng the operation			
	Plan along with	phase,13lakhs	will be alloca	ated as a recurri	ng cost for EMP.			
	Budgetary break-	Description	Capital	Recurring	Monitoring of Air,			
	up phase-wise		cost	cost per	Noise, water per			
	and responsibility		(in lakhs)	annum (in	annum			
	to			lakhs)	(in lakhs)			
	implement	Construction	164	9.5	1			
		Operation	-	13	1			
24.	CER activities alon	g with budgetar	y break-up a	nd responsibility	to implement.			

Mr. Neeraj Garg & Mr. Ankur Juneja (Partners) of M/s Exotic Builders and Developers will be responsible for the implementation of CER (Corporate Environmental Responsibility) as well as Environment Management Plan (EMP) till the project is handed over. As per Office Memorandum dated 01.05.2018; project proponent will spend Rs. 15 lakhs on CER activities mentioned in the Table below:

S.	Activities	Annual	Timeline	Total
No.		expenditure		expenditure in
		(in Rs. Lakhs)		5 years
				(in Rs. Lakhs)
1.	<ul> <li>Infrastructure: Adoption of Village Kishanpura, Zirakpur for their better regulation and expansion of facilities as per their needs such as: <ul> <li>Construction/maintenance of village roads.</li> <li>Providing solar lights along the roads and common areas.</li> <li>Maintenance of Govt. Elementary school in Kishanpura Village.</li> </ul> </li> </ul>	5	3 years	15
25.	Other important facts (Applicable	i) EO, MC, Zir	akpur vide let	ter no 3051 dated
	to EC projects only)	21.11.2019	issued No ol	ojection certificate



#### 3.0 Recommendations

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations to grant Environmental Clearance for the establishment of the project namely "Exotic Magnifiq" having a built-up area of 22163.25 sqm in a total land area of 7190.635 sqm located at village Kishanpura, Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures, conditions prescribed in Annexure-I of the proceedings subject to following additions, amendments and deletions given as under:

#### Conditions to be added in the Annexure-I as under: -

- i) The project proponent shall plant 100 no. of trees within the projects of native varieties as per the guidelines of the MoEF/SEIAA.
- ii) The project proponent shall utilize only one borewell having motor power as mentioned in the CGWA application to abstract the groundwater. Other borewell, if any, will be sealed/buried and compliance of the same be submitted to the SEIAA along with a six-monthly report.

#### Conditions to be amended in the Annexure-I as under: -

### Condition no. iv), v-a) & xv) of III. Water quality monitoring and preservation

iv) The total domestic water requirement for the project will be 69 KLD, out of which 46 KLD shall be met through its own tube well and remaining through the recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.

v) a) The total wastewater generation from the project will be 55 KLD, out of which, 27.5 KLD of sewage (black water) generated from the project will be treated in STP of 40 KLD capacity based on MBBR technology. While 27.5 KLD of greywater generated from the project will be treated in WWTP of capacity 45 KLD to be installed within project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater of 54 KLD available at the outlet of STP & WWTP after considering evaporation & other losses shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)	(KLD)	(KLD)
1.	Summer	23	7	24
2.	Winter	23	2	29
3.	Rainy	23	1	33

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 5 nos of rainwater harvesting recharge pits shall be provided for groundwater recharging as per CGWA norms. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

# Condition no. i) & iv) of X of Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1<sup>st</sup> May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for spending Rs. 15 lakhs on CER activities mentioned as per details given below:

S. No.	Activities	Annual expenditure (in Rs. Lakhs)	Timeline	Total expenditure in 5 years (in Rs. Lakhs) *
1.	Infrastructure:	5	3 years	15
	Adoption of Village			
	Kishanpura, Zirakpur for their			
	better regulation and			

expansion of facilities as per	
their needs such as:	
Construction/maintenance	
of village roads.	
Providing solar lights along	
the roads and common	
areas.	
• Maintenance of Govt.	
Elementary school in	
Kishanpura Village.	

<sup>\*</sup>Note: - The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project.

iv) Action plan for implementing EMP and environmental conditions along with responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 164.00 Lacs towards the capital cost and Rs 10.5 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 14.0 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents' society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# 4.0 Deliberations during 164<sup>th</sup> meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Neeraj Garg, Partner of the company.
- ii) Sh. Sandeep Garg, EIA Coordinator, M/s Eco Laboratories & Consultants Pvt. Ltd., Mohali

Environmental Consultant of the project proponent presented the salient features of the project which was taken on record. During the meeting, the following observations were made to which project proponent replied as under:

Sr. No		Observations		Reply			
1.	How 1	far is the sewer from the site?	The sewer passes in front of the project site				
2.	SEAC	er the condition imposed by , only one borewell has been ed for the project. Whether, it e suffice the requirement for the ct.	Yes, there will be no more requirement of the tube well for the project.				
3.	the project	er the coordinates submitted by roject proponent the site falls at tance of approximately 10 km hus this is a border case and the ct proponent is required to it an application to the NBWL.	Sukhna Wildlife sanctuary is about 10.2 Km. The project proponent submitted the application on 03.03.2020 to the				
4.	subm replac	project proponent needs to it revised CER activities by cing the Solar Street lights with other activities.					
	S. No.	Activities	Annual expenditure (in Rs. Lakhs)	Timeline	Total expenditure in 3 years (in Rs. Lakhs)		
	1.	Infrastructure:  Adoption of Village Kishanpura, Zirakpur for their better regulation and expansion of facilities as per their needs such as:  • Construction/maintena nce of village roads.  • Provision of smart LED TV in school.  • Maintenance of Govt. Elementary school in Kishanpura Village.	5	3 years	15		

During discussions, representative of the promoter company agreed to comply with fully all the conditions as mentioned by SEAC.

The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for the establishment of the Group Housing Project namely "Exotic Magnifiq" having a built-up area of 22163.25 sqm in total land area of 7190.635 sqm located at village Kishanpura, Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures and with the following conditions as recommended by SEAC & certain amendments therein & agreed by the Project proponent:

## I. Statutory compliance:

- i) The project proponent shall obtain all necessary clearances/ permissions from all relevant agencies including town planning authority before commencement of work. All the construction shall be done in accordance with the local building byelaws.
- ii) The approval of the Competent Authority shall be obtained for the structural safety of buildings due to earthquakes, adequacy of fire fighting equipment etc as per National Building Code including protection measures from lightening etc.
- iii) The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.
- iv) The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.
- v) The project proponent shall obtain Consent to Establish / Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the Punjab Pollution Control Board.
- vi) The project proponent shall obtain the necessary permission for drawl of groundwater/ surface water required for the project from the competent authority.
- vii) A certificate of adequacy of available power from the agency supplying power to the project along with the load allowed for the project should be obtained.
- viii) All other statutory clearances such as the approvals for storage of diesel from Chief Controller of Explosives, Fire Department, Civil Aviation Department shall be obtained, as applicable, by project proponents from the respective competent authorities.

- ix) The provisions of the Solid Waste (Management) Rules, 2016, E-Waste (Management) Rules, 2016, Construction & Demolition Waste Rules, 2016 and the Plastics Waste (Management) Rules, 2016 shall be followed.
- x) The project proponent shall follow the ECBC/ECBC-R prescribed by the Bureau of Energy Efficiency, Ministry of Power strictly.
- xi) The project site shall conform to the suitability as prescribed under the provisions laid down under the master plan of respective city/ town. For that, the project proponent shall either submit the NOC/ land use conformity certificate from Deptt of Town and Country Planning or other concerned Authority under whose jurisdiction, the site falls.
- xii) Besides above, the project proponent shall also comply with siting criteria/guidelines, standard operating practices, code of practice and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of projects.
- xiii) The project proponent shall get the layout plans approved from the Competent Authority for the activities/establishments to be set up at the project site in consonance with the project proposal for which this environment clearance is applied.

## II. Air quality monitoring and preservation

- i) Notification GSR 94(E) dated 25.01.2018 of MoEF&CC regarding Mandatory Implementation of Dust Mitigation Measures for Construction and Demolition Activities for projects requiring Environmental Clearance shall be complied with.
- ii) A management plan shall be drawn up and implemented to contain the current exceedance in ambient air quality at the site.
- iii) The project proponent shall install a system to carryout Ambient Air Quality monitoring for common /criterion parameters relevant-to the main pollutants released (e.g. PM10 and PM2.5) covering upwind and downwind directions during the construction period.
- iv) Diesel power generating sets proposed as source of backup power should be of enclosed type and conform to rules made under the Environment (Protection) Act, 1986. The height of stack of DG sets should be equal to the height needed for the combined capacity of all proposed DG sets. Use of low sulphur diesel should be ensured. The location of the DG sets may be decided in consultation with Punjab Pollution Control Board.
- v) Construction site shall be adequately barricaded before the construction begins. Dust, smoke & other air pollution prevention measures shall be provided for the building as well as the site. These measures shall include screens for the building under construction, continuous dust/ wind breaking walls all around the site (at least 3m height or 1/3rd of the building height and maximum upto 10m).

Plastic/tarpaulin sheet covers shall be provided for vehicles bringing in sand, cement, murram, and other construction materials prone to causing dust pollution at the site as well as taking out debris from the site.

- vi) No Excavation of soil shall be carried out without adequate dust mitigation measures in place.
- vii) No loose soil or sand or construction & demolition waste or any other construction material that causes dust shall be left uncovered.
- viii) No uncovered vehicles carrying construction material and waste shall be permitted
- ix) All the topsoil excavated during construction activities should be stored for use in horticulture / landscape development within the project site.
- x) Grinding and Cutting of building material in open area shall be prohibited. Wet jet shall be provided for grinding and stone cutting.
- xi) Unpaved surfaces and loose soil shall be adequately sprinkled with water to suppress dust.
- xii) All construction and demolition debris shall be stored at the site within earmarked area and road side storage of construction material and waste shall be prohibited. All demolition and construction waste shall be managed as per the provisions of the Construction and Demolition Waste Rules 2016.
- xiii) The diesel generator sets to be used during construction phase shall be low sulphur diesel type and shall conform to the standards as enumerated in the Environmental (Protection) Rules, 1986 as prescribed for air and noise emission.
- xiv) The gaseous emissions from DG set shall be dispersed through adequate stack height as per CPCB standards. Acoustic enclosure shall be provided to the DG sets to mitigate the noise pollution. Low sulphur diesel shall be used. The location of the DG set and exhaust pipe height shall be as per the provisions of the Central Pollution Control Board (CPCB) norms.
- xv) For indoor air quality the ventilation provisions as per National Building Code of India shall be followed.
- xvi) Roads leading to or at construction site must be paved and blacktopped (i.e. metallic road)
- xvii) Dust Mitigation measures shall be displayed prominently at the construction site for easy public viewing.
- xviii) Construction and Demolition Waste Processing and Disposal site shall be identified and required dust mitigation measure be notified at the site.

### III. Water quality monitoring and preservation

i) The natural drain system should be maintained for ensuring unrestricted flow of water.

- ii) No construction shall be allowed to obstruct the natural drainage through the site, on wetland and water bodies. Check dams, bio-swales, landscape, and other sustainable urban drainage systems (SUDS) are allowed for maintaining the drainage pattern and to harvest rain water.
- iii) Buildings shall be designed to follow the natural topography as much as possible. Minimum cutting and filling should be done.
- iv) The total domestic water requirement for the project will be 69 KLD, out of which 46 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 55 KLD, out of which, 27.5 KLD of sewage (black water) generated from the project will be treated in STP of 40 KLD capacity based on MBBR Technology. While, 27.5 KLD of greywater generated from the project will be treated in WWTP of capacity 45 KLD to be installed within project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater of 54 KLD available at the outlet of STP & WWTP after considering evaporation & other losses shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)	(KLD)	(KLD)
1.	Summer	23	7	24
2.	Winter	23	2	29
3.	Rainy	23	1	33

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project

- b) Storage tank of adequate capacity shall be provided for the storage of treated wastewater and all efforts shall be made to supply the same for construction purposes.
- c) During construction phase, the project proponent shall ensure that the wastewater being generated from the labour quarters/toilets shall be treated and disposed in environment-friendly manner. The project proponent shall also exercise the option of modular bio-toilets or will provide proper and adequately designed septic tanks for the treatment of such wastewater and treated effluents shall be utilized for green area/plantation
- vi) The project proponent shall ensure safe drinking water supply to the habitants. Adequate treatment facility for drinking water shall be provided, if required.
- vii) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.

- viii) A certificate shall be obtained from the local body supplying water, specifying the total annual water availability with the local authority, the quantity of water already committed, the quantity of water allotted to the project under consideration and the balance water available. This should be specified separately for groundwater and surface water sources, ensuring that there is no impact on other users.
- ix) At least 20% of the open spaces as required by the local building bye-Jaws shall be pervious. Use of Grass pavers, paver blocks with at least 50% opening, landscape etc. would be considered as pervious surface.
- x) Installation of dual pipe plumbing for supplying freshwater for drinking, cooking and bathing etc and other for supply of recycled water for flushing, landscape irrigation, car washing, thermal cooling, conditioning etc. shall be done.
- xi) The respective project proponent shall discourage the installation of R.O. plants in their projects in order to save the wastage in form of RO reject. However, in case the requirement of installing RO plant is utmost necessary then the rejected stream from the RO shall be separated and shall be utilized by storing the same within the particular component i.e. (Tower/Mall) or in a common place in the project premises.
- xii) The project proponent shall also adopt the new/innovating technologies like less water discharging taps (faucet with aerators)/urinals with electronic sensor system /water less urinals / twin flush cisterns/ sensor based alarming system for overhead water storage tanks and make it a part of the environmental management plans / building plans SO as to reduce the consumption/groundwater abstraction in their Building Construction & Industrial projects.
- xiii) The project proponent will provide plumbing system for reuse of treated wastewater for flushing/ HVAC/ other purposes etc. and colour coding of different pipe lines carrying water/wastewater from different sources / treated wastewater as follows:

Sr.	Nature of the Stream	Colour code
No		
a)	Fresh water	Blue
b)	Untreated wastewater from Toilets/ urinal & from Kitchen	Black
c)	Untreated wastewater from Bathing/shower area, hand washing (Washbasin / sinks) and from Cloth Washing	Grey
d)	Reject water streams from RO plants & AC condensate (this is to be implemented wherever centralized AC system and common RO has been proposed in the Project). Further, in case of individual houses/establishment this proposal may also be implemented wherever possible.	White

e)	)	Treated wastewater (for reuse only for plantation purposes) from the STP treating black water	Green
f)		Treated wastewater (for reuse for flushing purposes or any other activity except plantation) from the STP treating grey water	Green with strips
g)	)	Storm water	Orange

- xiv) Water demand during construction should be reduced by use of pre-mixed concrete, curing agents and other best practices referred.
- xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 5 no's of rainwater harvesting recharge pits shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.
- xvi) All recharge should be limited to shallow aquifer.
- xvii) No groundwater shall be used during construction phase of the project. Only treated sewage/wastewater shall be used. A proper record in this regard should be maintained and available at site.
- xviii) Any groundwater dewatering should be properly managed and shall conform to the approvals and the guidelines of the CGWA in the matter. Formal approval shall be taken from the CGWA for any groundwater abstraction or dewatering.
- xix) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- xx) Sewage shall be treated in the STP with tertiary treatment. STP shall be installed in phased manner viz a viz in module system designed in such a way so as to efficiently treat the wastewater with increase in its quantity due to rise in occupancy. The treated effluent from STP shall be recycled/re-used for flushing, AC make up water and gardening. No treated water shall be disposed of into municipal storm water drain.
- xxi) No sewage or untreated effluent water would be discharged through storm water drains. Onsite sewage treatment of capacity of treating 100% wastewater to be installed. The installation of the Sewage Treatment Plant (STP) shall be certified by an independent expert and a report in this regard shall be submitted to the Ministry before the project is commissioned for operation. Treated wastewater shall be reused on site for landscape, flushing, cooling tower, and other end-uses. Excess treated water shall be discharged as per statutory norms notified by

- Ministry of Environment, Forest and Climate Change. Natural treatment systems shall be promoted.
- xxii) Periodical monitoring of water quality of treated sewage shall be conducted. Necessary measures should be made to mitigate the odour problem from STP.
- xxiii) Sludge from the onsite sewage treatment, including septic tanks, shall be collected, conveyed and disposed of as per the Ministry of Urban Development, Central Public Health and Environmental Engineering Organization (CPHEEO) Manual on Sewerage and Sewage Treatment Systems, 2013.

## IV. Noise monitoring and prevention

- i) Ambient noise levels shall conform to residential area/commercial area/industrial area/silence zone both during day and night as per Noise Pollution (Control and Regulation) Rules, 2000. Incremental pollution loads on the ambient air and noise quality shall be closely monitored during construction phase. Adequate measures shall be made to reduce ambient air and noise level during construction phase, so as to conform to the stipulated standards by CPCB/SPCB.
- ii) Noise level survey shall be carried out as per the prescribed guidelines and report in this regard shall be submitted to Regional Office of the Ministry as a part of sixmonthly compliance report.
- iii) Acoustic enclosures for DG sets, noise barriers for ground-run bays, ear plugs for operating personnel shall be provided as mitigation measures for noise impact due to ground sources.

## V. Energy Conservation measures

- i) Compliance with the Punjab Energy Conservation Building Code (PECBC) of Energy Efficiency shall be ensured.
- ii) Outdoor and common area lighting shall be LED.
- iii) Concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc. shall be incorporated in the building design. Wall, window, and roof uvalues shall be as per ECBC specifications.
- iv) Energy conservation measures like installation of LEDs for lighting the area outside the building should be integral part of the project design and should be in place before project commissioning.
- v) Solar, wind or any other Renewable Energy equipment shall be installed to meet electricity generation equivalent to at least 1% of the demand load or as per the state level/ local building bye-laws requirement, whichever is higher.

vi) Solar power by utilizing at least 30% of the rooftop area shall be used for lighting in the apartment to reduce the power load on grid. Separate electric meter shall be installed for solar power.

## VI. Waste Management

- i) A certificate from the competent authority handling municipal solid wastes, indicating the existing civic capacities of handling and their adequacy to cater to the M.S.W. generated from project shall be obtained.
- ii) Disposal of muck during construction phase shall not create any adverse effect on the neighbouring communities and be disposed of taking the necessary precautions for general safety and health aspects of people, only in approved sites with the approval of competent authority.
- iii) Chute system, separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- iv) Organic waste compost/ Vermiculture pit/ Organic Waste Converter within the premises with a minimum capacity of 0.3 kg /person/day must be installed for treatment and disposal of the waste.
- v) All non-biodegradable waste shall be handed over to authorized recyclers for which a written tie up must be done with the authorized recyclers.
- vi) Any hazardous waste generated during construction phase, shall be disposed of as per applicable rules and norms with necessary approvals of the State Pollution Control Board.
- vii) Use of environment friendly materials in bricks, blocks and other construction materials, shall be required for at least 20% of the construction material quantity. These include Fly Ash bricks, hollow bricks, AACs, Fly Ash Lime Gypsum blocks, Compressed earth blocks, and other environment friendly materials.
- viii) Fly ash should be used as building material in the construction as per the provision of Fly Ash Notification of September, 1999 and amended as on 27th August, 2003 and 25th January, 2016. Ready mixed concrete must be used in building construction.
- ix) Any wastes from construction and demolition activities related thereto shall be managed in such a way so as to strictly conform to the Construction and Demolition Rules, 2016.
- x) Used CFLs and TFLs should be properly collected and disposed off/sent for recycling as per the prevailing guidelines/ rules of the regulatory authority to avoid mercury contamination.

#### VII. Green Cover

 No tree shall be felled/transplanted unless extreme exigencies demand. Where absolutely necessary, tree felling shall be with prior permission from the concerned regulatory authority. Old trees should be retained based on girth and

- age regulations as may be prescribed by the Forest Department. Plantations to be ensured species (cut) to species (planted).
- ii) At least single line plantation all around the boundary of the project as proposed shall be provided. The open spaces inside the plot should be suitably landscaped and covered with vegetation of indigenous species/variety. A minimum of one tree for every 80 sqm of total project land should be planted and maintained. The existing trees will be counted for this purpose. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping. The plantation should be provided as per SEIAA guidelines.
- Where the trees need to be cut with prior permission from the concerned local Authority, compensatory plantation in the ratio of 1: 10 (i.e. planting of 10 trees for every 1 tree that is cut) shall be done and maintained. Plantations to be ensured species (cut) to species (planted). Area for green belt development shall be provided as per the details provided in the project document.
- iv) Topsoil should be stripped to a depth of 20 cm from the areas proposed for buildings, roads, paved areas, and external services. It should be stockpiled appropriately in designated areas and reapplied during plantation of the proposed vegetation on site.
- v) The project proponent shall not use any chemical fertilizer /pesticides /insecticides and shall use only Herbal pesticides/insecticides and organic manure in the green area.
- vi) The green belt along the periphery of the plot shall achieve attenuation factor conforming to the day and night noise standards prescribed for residential land use.

#### VIII. Transport

- i) A comprehensive mobility plan, as per MoUD best practices guidelines (URDPFI), shall be prepared to include motorized, non-motorized, public, and private networks. Road should be designed with due consideration for environment, and safety of users. The road system can be designed with these basic criteria.
  - a) Hierarchy of roads with proper segregation of vehicular and pedestrian traffic.
  - b) Traffic calming measures.
  - c) Proper design of entry and exit points.
  - d) Parking norms as per local regulation.
- ii) Vehicles hired for bringing construction material to the site should be in good condition and should have a pollution check certificate and should conform to applicable air and noise emission standards and be operated only during non-peak hours.

- iii) A detailed traffic management and traffic decongestion plan shall be drawn up to ensure that the current level of service of the roads within a 05 kms radius of the project is maintained and improved upon after the implementation of the project. This plan should be based on cumulative impact of all development and increased habitation being carried out or proposed to be carried out by the project or other agencies in this 05 Kms radius of the site in different scenarios of space and time and the traffic management plan shall be duly validated and certified by the State Urban Development department and the P.W.D./ competent authority for road augmentation and shall also have their consent to the implementation of components of the plan which involve the participation of these departments.
- iv) Traffic congestion near the entry and exit points from the roads adjoining the proposed project site must be avoided. Parking should be fully internalized and no public space should be utilized.

#### IX. Human health issues

- i) All workers working at the construction site and involved in loading, unloading, carriage of construction material and construction debris or working in any area with dust pollution shall be provided with dust mask.
- ii) For indoor air quality the ventilation provisions as per National Building Code of India shall be strictly followed.
- iii) Emergency preparedness plan based on the Hazard identification and Risk Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.
- iv) Occupational health surveillance of the workers shall be done on a regular basis.
- v) A First Aid Room shall be provided in the project both during construction and operations of the project.

### X. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1<sup>st</sup> May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for spending Rs. 15 lakhs on CER activities mentioned as per details given below:

S. No.	Activities	Annual expenditure (in Rs. Lakhs)	Timeline	Total expenditure in 5 years (in Rs. Lakhs) *
1.	Infrastructure:	5	3 years	15

Adoption of Village	
Kishanpura, Zirakpur for their	
better regulation and	
expansion of facilities as per	
their needs such as:	
Construction/maintenance	
of village roads.	
<ul> <li>Provision of smart LED TV</li> </ul>	
in school.	
<ul> <li>Maintenance of Govt.</li> </ul>	
Elementary school in	
Kishanpura Village.	

\*Note: - The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project.

- ii) The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest/wildlife norms/conditions. The company shall have a defined system of reporting infringements/deviation/violation of the environmental / forest/wildlife norms/conditions to all shareholders/stakeholders. A copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of the six-monthly report.
- iii) A separate Environmental Cell both at the project and company headquarters level, with qualified personnel, shall be set up under the control of senior executives, who will directly report to the head of the organization.
- Action plan for implementing EMP and environmental conditions along with the iv) responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate accounts and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 164.00 Lacs towards the capital cost and Rs 10.5 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 14.0 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents' society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

## XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier.

#### XII. Miscellaneous

- i) The project proponent before allowing any occupancy shall obtain completion and occupancy certificate from the Competent Authority and submit a copy of the same to SEIAA, Punjab.
- ii) The project proponent shall comply with the conditions of CLU.
- iii) The project proponent shall prominently advertise it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days indicating that the project has been accorded environment clearance and the details of MoEF&CC /SEIAA website where it is displayed.
- iv) The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- v) The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.
- vi) The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the Ministry of Environment, Forest and Climate Change at Environment Clearance portal.
- vii) The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii) The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure, and final approval of the project by the concerned authorities, commencing the land development work, and start of production /operation by the project.
- ix) The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.
- x) The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing, and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- xi) No further expansion or modifications in the plant/project shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).

- xii) Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiii) The SEIAA/Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xiv) The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xv) The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data/ information/monitoring reports.
- xvi) The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvii) Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

### **Additional Condition: -**

- i) The project proponent shall plant 100 no. of trees within the projects of native varieties as per the guidelines of the MoEF/SEIAA.
- ii) The project proponent shall utilize only one borewell having motor power as mentioned in the CGWA application to abstract the groundwater. Other borewell, if any, will be sealed/buried and compliance of the same be submitted to the SEIAA along with a six-monthly report.

Item No. 164.05: Application for Environmental Clearance under EIA notification dated 14.09.2006 for the establishment of a Commercial Project at Village-Bishangarh & Bishanpura Zirakpur, Tehsil Derabassi, S.A.S Nagar, Punjab by M/s V.R. Developers (Proposal No. SIA/PB/MIS/135168/2020).

SEIAA observed as under:

#### 1.0 Background

The project proponent has filed an application for obtaining Environment Clearance under EIA notification, 2006 for the establishment of a commercial project at Village-Bishangarh & Bishanpura Zirakpur, Tehsil Derabassi, Distt. S.A.S Nagar, Punjab.

# 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020. SEAC observed that the Environmental Engineer, PPCB, Nodal Office, Mohali vide letter no 1155 dated 14.02.2020 has intimated that no construction work has been started by the promoter company and boundary has been demarcated. The site of the project was conforming to the siting guidelines laid down by the Govt. of Punjab, Department of Science Technology and Environment vide order dated 25/07 /2008 as amended on 30/10/2009.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under: -

S.No.	Item	Details			
1.	Online Proposal No.	SIA	SIA/PB/MIS/135168/2020		
2.	Name and Location of the	Co	mmercial Pr	oject	
	project	at Village-Bishangarh & Bishanpura Zirakpur,			
		Tehsil Derabassi, S.A.S Nagar, Punjab			
3.	Latitude & Longitude	Corners coordinates:			
			Corner	Latitude	Longitude
			Corner-1	30°38'19.12" N	76°49'23.10" E
			Corner-2	30°38'16.27" N	76°49'30.38" E
			Corner-3	30°38'14.72" N	76°49'29.60" E
			Corner-4	30°38'16.95" N	76°49'23.50" E

4.	Project/activity covered under item of scheduled to the EIA Notification,14.09.2006				
5.	Whether the project is in critical polluted area or not.	No.			
6.	Does the project involve diversion of forest land? If yes, a. Extent of the forest land. b. Status of the forest clearance.	04.03.20, which was taken on the record by SEAC.			
7.	Does the project cover under PLPA, 1900				
8.	Does the project fall within 10 km of eco-sensitive area/National park/Wild Life Sanctuary?				
9.	Classification/Land use pattern as per Master Plan	n Existing Built-up area			
10.	Cost of the project	Rs. 65	crores		
11.	Total Plot Area, Built-up Area and Green area	S.No. 1. 2. 3.	Description Plot area (Total scheme area) Built-up area Green area	Area 10,682.61(or 2.63 acres) 27,862.282 m <sup>2</sup> 745.69 m <sup>2</sup>	
11 -a	EC fee details		730/- Vide NEFT No 02.01.2020	. N002201024521174	
12.	operational)	`	: 2859 nos+	Hall 131 nos)	
13.	Water Requirements &source in Construction Phase	F&B=2321 nos+ Multipurpose Hall 131 nos)  Treated wastewater will be used for construction purposes the water demand of 10 KLD (max) may be there depending upon phases of construction and the same will be met from nearby STPs by using private water tankers  Domestic demand for 50 workers during peak period @ 3 KLD (@ 45 LPCD) shall be met from the groundwater.			

Breakup of Water Requirements & source in Operation Phase (Summer, Rainy, Winter):

Sr.No.	Season	Fresh water	Reuse water	Total
		Domestic (KLD)	Flushing (KLD)	(KLD)
			@16lpcd	
1.	Summer	212	85	297
2.	Winter	212	85	297
3.	Rainy	212	85	297
		-		

Calculation of water requirement: -

Retail @ 45 lpcd, 2859 nos. =129 KLD

F&B @ 70 lpcd, 2321 nos. = 162 KLD

Multipurpose Hall @ 45 lpcd,131 nos = 6 KLD

Total Domestic water required = 297 KLD

· otal Bol	otal Domestic Water required 237 RED					
S.No.	Season	Basis	Green	Treated		
			Area	wastewater		
				requirement		
	Unit	ltr/sqm/day	(sqm)	KLD		
1.	Summer	5.5	746	4.0		
2.	Winter	1.8 ltr/sqm/day	746	1.5		
3	Rainy	0 ltr/sqm/day	746	0.5		

S.No.	Description	Source of water		
1.	Domestic	Borewell		
		(To a query of SEAC, the project proponent submitted an undertaking dated 04.03.2020 to the effect that he will construct only one borewell for groundwater abstraction after obtaining necessary approvals from CGWA. Further, the project proponent will use		
		10 HP power motor for the tubewell.)		
2	Flushing purposes	Treated wastewater		
3.	Green area	Treated wastewater		

15. Treatment & Disposal arrangements of wastewater in Construction Phase

Wastewater generated (2.4 KLD) will be treated in a septic tank and treated wastewater will be used for plantation purposes.

Handling of waste material during the construction phase

Waste Material handling will be carried out as per Construction and Demolition (C&D) Waste Management Rules, 2016.

16.	Disposal Arrangement of Wastewater in Operation Phase	Total wastewater generation will be 238 KLD (80% of 297 KLD) out of which black water will be 166 KLD (kitchen @ 81 KLD +Flushing @85 KLD) and greywater will be 72 KLD (Washing + Bathing). 166 KLD black water will be treated in STP of capacity 200 KLD based on MBBR technology and 72 KLD greywater will be treated in WWTP of capacity 100 KLD to be installed within the project premises. Reuse of treated wastewater and discharge of surplus treated wastewater is given as under: -  Season Flushing Green Sewer (KLD)			
			0.5	(KLD)	4.44
		Summer	85	4.0	144
		Winter	85	1.5	146.5
		Monsoon	85	0.5	152.5
17.	Rainwater recharging	165 m³/hr rai			in 3 no. of
18.	detail Solid waste generation and its	Rainwater recharging pits with dual-bore.			
19.	disposal  Green Belt Development Plan	<ul> <li>a) 1,062 kg/day</li> <li>b) The solid waste shall be duly segregated into biodegradable and non-biodegradable components. A separate area will be earmarked for the segregation of solid waste.</li> <li>c) 478 Kg/day of Bio-degradable will be Converted into Manure using 1 Mechanical Composter of size 500 kg.</li> <li>d) 563Kg/day of Non-biodegradable or dry waste will be handed over to authorized waste pickers</li> <li>e) 21 Kg/day Domestic hazardous waste will be Disposed of to authorized vendors as per Solid Waste Management Rules, 2016.</li> </ul>			
19.	including no. of trees to be planted & its species.		34 trees (i.e. 1 m) SEAC, the proje lan providing o	tree @ 80 sc	ım of land t submitted a
20.	Hazardous Waste &E- Waste	Used oil from DO and E-waste wi (Management)Ar	G sets will be so Il be disposed	of as per	-
21.		a)2272 KW from	PSPCL.		
	& Saving	b)3 DG sets (i.e.	2 Nos. of 1010	KVA and 1 o	f 750 KVA)

	E	Energy Saving m	neasures:				
		Solar panels ha	ve been <sub>l</sub>	proposed on	the rooftop of the		
	l l	building. The total area covered by solar panels is 1,230					
	r	m <sup>2</sup> (which is 30% of terrace area i.e. 4,100 m <sup>2</sup> ) which will					
		generate 103 KW of power generation.					
		i. Rooftop area = 4100 m <sup>2</sup>					
		ii. Space available for solar panel = $1,230 \text{ m}^2$					
		iii. Area Reg. per K.W = $12 \text{ m}^2$					
		iv. Solar Power Generated = 103 KW					
		v. Cost appr	ox. Rs. 65	5000 per KW			
				= Rs. 67 Lak			
22.	Environment Management						
	Plan along with Budgetary	Description	Capital	Recurring	Monitoring of Air,		
	breakup phase-wise and		cost	cost	Noise, water (per		
	responsibility to implement		(lakhs)	(lakhs)	annum) Rs.		
		Construction	215	11	1		
		Operation	-	18.5	1		
23.	CER activities along with budge	etary break-up a	nd respor	sibility to im	plement		

Mr. Raj Kumar (Partner) of M/s. V R Developers will be responsible for the implementation of CER (Corporate Environmental Responsibility) within 5 years. Rs. 20 Lakhs have been reserved for CER activities under the following activities:

S.No.	Activities	Annual	Timeline(2020	Total
		Expenditure	to 2025)	Expenditure
		(in Lakhs)		in 5 Years
1.	Adoption of Government Senior Secondary School, Village Lohgarh, Zirakpur, Mohali. Punjab.	20	One time	20
	<ul> <li>Provision of solar lights</li> <li>Up-gradation of the facilities in school by providing aid in order to purchase books and furniture.</li> </ul>			
	Total	20		20

### 3.0 Recommendations

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations to grant Environmental Clearance for the establishment of the commercial project having

a built-up area of 27862.282 sqm in total land area of 10682.61 sqm located at village Bishangarh & Bishanpura, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures, conditions prescribed in **Annexure-I of the proceedings** subject to following additions, amendments and deletions given as under:

#### Conditions to be added in the Annexure-I as under: -

- i) The project proponent shall plant 150 no. of trees within the projects of native varieties as per the guidelines of the MoEF/SEIAA.
- ii) The project proponent shall utilize only one borewell having motor power as mentioned in the CGWA application to abstract the groundwater. Other borewell, if any, will be sealed/buried and compliance of the same be submitted to the SEIAA along with a six-monthly report.

#### Conditions to be amended in the Annexure-I as under: -

## Condition no. iv), v-a) & xv) of III. Water quality monitoring and preservation

- iv) The total domestic water requirement for the project will be 297 KLD, out of which 212 KLD shall be met through own tube well and remaining through the recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a)The total wastewater generation from the project will be 238 KLD out of which black water will be 166 KLD and greywater will be 75 KLD and same will be treated in proposed STP of capacity 200 KLD based on MBBR technology and WWTP of capacity100 KLD, respectively, to be installed within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater of 233 KLD available at the outlet of STP& WWTP after considering the evaporation & other losses, shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)		(KLD)
1.	Summer	85	4.0	144
2.	Winter	85	1.5	146.5
3.	Rainy	85	0.5	152.5

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided.

Thus, 3 nos of rainwater harvesting recharge pits (with dual-bore) shall be provided for groundwater recharging as per CGWA norms. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

## Condition no. i) & iv) of X: Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1<sup>st</sup> May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for spending Rs. 20 Lakhs on CER activities mentioned as per details given below:

S.No.	Activities	Annual Expenditure (in Lakhs)	Timeline (2020 to 2025)	Total Expenditure in 5 Years
1.	Adoption of Government Senior Secondary School, Village Lohgarh, Zirakpur, Mohali. Punjab.  • Provision of solar lights • Up-gradation of the facilities in school by providing aid in order to purchase books and furniture.	20	One time	20
	Total	20		20

\*Note: - The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project.

iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate accounts and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 215.00 Lacs towards the capital cost and Rs 12.0 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management

plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents' society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Mr. Raj Kumar, Partner of the company
- ii) Sh. Sandeep Garg, EIA Coordinator, M/s Eco Laboratories & Consultants Pvt. Ltd., Mohali

Environmental Consultant of the project proponent presented the salient features of the project which was taken on record. During the meeting, the following observations were made to which project proponent replied as under:

Sr. No	Observations	Reply
1	Whether Forest permission has been obtained by the project proponent	Project Proponent submitted a copy of NOC issued by Forest Officer, SAS Nagar vide no 10274 dated 04.03.2020, which was taken on record by SEAC.
2.	How far is the sewer from the site?	The sewer passes in front of the site.
3.	Parking norms of which authority are taken into consideration for calculating the parking space.	Parking norms of the Municipal Council were considered. As per the MC Norms, 1.0 ECS is required against the 50 sqm of covered area. However, 1.31 ECS was proposed against the 50 sqm of covered area in the project.
4.	As per the condition imposed by SEAC, only one borewell has been allowed for the project proponent. Whether it will be adequate for the project proponent.	The project proponent requested to allow the second borewell as a stand by arrangement for meeting with the requirements in an emergency.
5.	The project proponent needs to submit revised CER activities by replacing the Solar Street lights with some other activities.	The project proponent submitted a revised CER activity having details given as under.

S.	.No.	Activities	Annual Expenditure (in Lakhs)	Timeline (2020 to 2025)	Total Expenditure in 5 Years
1.		Adoption of Government Senior Secondary School, Village Lohgarh, Zirakpur, Mohali. Punjab.  Maintenance of school building. Provision of 2 water coolers. Upgradation of the facilities in school by providing aid in order to purchase books and furniture.	20	One time	20
		Total	Rs. 20 Lakhs		Rs. 20 Lakhs

During discussions, representative of the promoter company agreed to comply with fully all the conditions as mentioned by SEAC except the following additional condition as proposed by the SEAC

"The project proponent shall utilize only one borewell having motor power as mentioned in the CGWA application to abstract the groundwater. Other borewell, if any, will be sealed/buried and compliance of the same be submitted to the SEIAA along with a sixmonthly report."

The project proponent requested not to impose the above-said condition due to reason that other borewell is required for the standby purposes in case the first borewell fails. SEIAA accepted the request of the project proponent subject to the condition that requisite permission will be obtained from CGWA/competent authority.

The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for the establishment of the commercial project having a built-up area of 27862.282 sgm in total land area of 10682.61 sgm located at village

Bishangarh & Bishanpura, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures and with the following conditions as recommended by SEAC & certain amendments therein & agreed by the Project Proponent:

## I. Statutory compliance:

- i) The project proponent shall obtain all necessary clearances/ permissions from all relevant agencies including town planning authority before commencement of work. All the construction shall be done in accordance with the local building byelaws.
- ii) The approval of the Competent Authority shall be obtained for the structural safety of buildings due to earthquakes, adequacy of firefighting equipment etc as per National Building Code including protection measures from lightening etc.
- iii) The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.
- iv) The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.
- v) The project proponent shall obtain Consent to Establish / Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the Punjab Pollution Control Board.
- vi) The project proponent shall obtain the necessary permission for drawl of groundwater/ surface water required for the project from the competent authority.
- vii) A certificate of adequacy of available power from the agency supplying power to the project along with the load allowed for the project should be obtained.
- viii) All other statutory clearances such as the approvals for storage of diesel from Chief Controller of Explosives, Fire Department, Civil Aviation Department shall be obtained, as applicable, by project proponents from the respective competent authorities.
- ix) The provisions of the Solid Waste (Management) Rules, 2016, E-Waste (Management) Rules, 2016, Construction & Demolition Waste Rules, 2016, and the Plastics Waste (Management) Rules, 2016 shall be followed.
- x) The project proponent shall follow the ECBC/ECBC-R prescribed by the Bureau of Energy Efficiency, Ministry of Power strictly.
- xi) The project site shall conform to the suitability as prescribed under the provisions laid down under the master plan of respective city/ town. For that, the project proponent shall either submit the NOC/ land use conformity certificate from Deptt of Town and Country Planning or other concerned Authority under whose jurisdiction, the site falls.

- xii) Besides above, the project proponent shall also comply with siting criteria / guidelines, standard operating practices, code of practice and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of projects.
- xiii) The project proponent shall get the layout plans approved from the Competent Authority for the activities/establishments to be set up at the project site in consonance with the project proposal for which this environment clearance is applied.

## II. Air quality monitoring and preservation

- i) Notification GSR 94(E) dated 25.01.2018 of MoEF&CC regarding Mandatory Implementation of Dust Mitigation Measures for Construction and Demolition Activities for projects requiring Environmental Clearance shall be complied with.
- ii) A management plan shall be drawn up and implemented to contain the current exceedance in the ambient air quality at the site.
- iii) The project proponent shall install a system to carryout Ambient Air Quality monitoring for common /criterion parameters relevant-to the main pollutants released (e.g. PM10 and PM2.5) covering upwind and downwind directions during the construction period.
- iv) Diesel power generating sets proposed as a source of backup power should be of enclosed type and conform to rules made under the Environment (Protection) Act, 1986. The height of the stack of DG sets should be equal to the height needed for the combined capacity of all proposed DG sets. Use of low sulphur diesel should be ensured. The location of the DG sets may be decided in consultation with Punjab Pollution Control Board.
- v) Construction site shall be adequately barricaded before the construction begins. Dust, smoke & other air pollution prevention measures shall be provided for the building as well as the site. These measures shall include screens for the building under construction, continuous dust/ wind breaking walls all around the site (at least 3m height or 1/3rd of the building height and maximum upto 10m). Plastic/tarpaulin sheet covers shall be provided for vehicles bringing in sand, cement, murram, and other construction materials prone to causing dust pollution at the site as well as taking out debris from the site.
- vi) No Excavation of soil shall be carried out without adequate dust mitigation measures in place.
- vii) No loose soil or sand or construction & demolition waste or any other construction material that causes dust shall be left uncovered.
- viii) No uncovered vehicles carrying construction material and waste shall be permitted
- ix) All the topsoil excavated during construction activities should be stored for use in horticulture / landscape development within the project site.
- x) Grinding and Cutting of building material in open area shall be prohibited. Wet jet shall be provided for grinding and stone cutting.

- xi) Unpaved surfaces and loose soil shall be adequately sprinkled with water to suppress dust.
- xii) All construction and demolition debris shall be stored at the site within earmarked area and road side storage of construction material and waste shall be prohibited. All demolition and construction waste shall be managed as per the provisions of the Construction and Demolition Waste Rules 2016.
- xiii) The diesel generator sets to be used during construction phase shall be low sulphur diesel type and shall conform to the standards as enumerated in the Environmental (Protection) Rules, 1986 as prescribed for air and noise emission.
- xiv) The gaseous emissions from DG set shall be dispersed through adequate stack height as per CPCB standards. Acoustic enclosure shall be provided to the DG sets to mitigate the noise pollution. Low sulphur diesel shall be used. The location of the DG set and exhaust pipe height shall be as per the provisions of the Central Pollution Control Board (CPCB) norms.
- xv) For indoor air quality the ventilation provisions as per National Building Code of India shall be followed.
- xvi) Roads leading to or at construction site must be paved and blacktopped (i.e. metallic road)
- xvii) Dust Mitigation measures shall be displayed prominently at the construction site for easy public viewing.
- xviii) Construction and Demolition Waste Processing and Disposal site shall be identified and required dust mitigation measure be notified at the site.

### III. Water quality monitoring and preservation

- The natural drain system should be maintained for ensuring unrestricted flow of water.
- ii) No construction shall be allowed to obstruct the natural drainage through the site, on wetland and water bodies. Check dams, bio-swales, landscape, and other sustainable urban drainage systems (SUDS) are allowed for maintaining the drainage pattern and to harvest rain water.
- iii) Buildings shall be designed to follow the natural topography as much as possible. Minimum cutting and filling should be done.
- iv) The total domestic water requirement for the project will be 297 KLD, out of which 212 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a)The total wastewater generation from the project will be 238 KLD out of which black water will be 166 KLD and greywater will be 75 KLD and same will be treated in proposed STP of capacity 200 KLD based on MBBR technology and WWTP of capacity100 KLD, respectively, to be installed within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated

wastewater of 233 KLD available at the outlet of STP & WWTP after considering the evaporation & other losses, shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)	(KLD)	(KLD)
1.	Summer	85	4.0	144
2.	Winter	85	1.5	146.5
3.	Rainy	85	0.5	152.5

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project

- b) Storage tank of adequate capacity shall be provided for the storage of treated wastewater and all efforts shall be made to supply the same for construction purposes.
- c) During construction phase, the project proponent shall ensure that the wastewater being generated from the labour quarters/toilets shall be treated and disposed in environment friendly manner. The project proponent shall also exercise the option of modular bio-toilets or will provide proper and adequately designed septic tanks for the treatment of such wastewater and treated effluents shall be utilized for green area/plantation
- vi) The project proponent shall ensure safe drinking water supply to the habitants. Adequate treatment facility for drinking water shall be provided, if required.
- vii) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- viii) A certificate shall be obtained from the local body supplying water, specifying the total annual water availability with the local authority, the quantity of water already committed, the quantity of water allotted to the project under consideration and the balance water available. This should be specified separately for groundwater and surface water sources, ensuring that there is no impact on other users.
- ix) At least 20% of the open spaces as required by the local building bye-Jaws shall be pervious. Use of Grass pavers, paver blocks with at least 50% opening, landscape etc. would be considered as pervious surface.
- x) Installation of dual pipe plumbing for supplying freshwater for drinking, cooking and bathing etc and other for supply of recycled water for flushing, landscape irrigation, car washing, thermal cooling, conditioning etc. shall be done.
- xi) The respective project proponent shall discourage the installation of R.O. plants in their projects in order to save the wastage in form of RO reject. However, in

case the requirement of installing RO plant is utmost necessary then the rejected stream from the RO shall be separated and shall be utilized by storing the same within the particular component i.e. (Tower/Mall) or in a common place in the project premises.

- xii) The project proponent shall also adopt the new/innovating technologies like less water discharging taps (faucet with aerators)/urinals with electronic sensor system /water less urinals / twin flush cisterns/ sensor based alarming system for overhead water storage tanks and make it a part of the environmental management plans / building plans so as to reduce the water consumption/groundwater abstraction in their Building Construction & Industrial projects.
- xiii) The project proponent will provide plumbing system for reuse of treated wastewater for flushing/ HVAC/ other purposes etc. and colour coding of different pipe lines carrying water/wastewater from different sources / treated wastewater as follows:

Sr. No	Nature of the Stream	Colour code
a)	Fresh water	Blue
b)	Untreated wastewater from Toilets/ urinal & from Kitchen	Black
c)	Untreated wastewater from Bathing/shower area, hand washing (Washbasin / sinks) and from Cloth Washing	Grey
d)	Reject water streams from RO plants & AC condensate (this is to be implemented wherever centralized AC system and common RO has been proposed in the Project). Further, in case of individual houses/establishment this proposal may also be implemented wherever possible.	White
e)	Treated wastewater (for reuse only for plantation purposes) from the STP treating black water	Green
f)	Treated wastewater (for reuse for flushing purposes or any other activity except plantation) from the STP treating grey water	Green with strips
g)	Storm water	Orange

- xiv) Water demand during construction should be reduced by the use of pre-mixed concrete, curing agents and other best practices referred.
- xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 3 nos of rainwater harvesting recharge pits (with dual-bore) shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The

- groundwater shall not be withdrawn without approval from the Competent Authority.
- xvi) All recharge should be limited to shallow aquifer.
- xvii) No groundwater shall be used during construction phase of the project. Only treated sewage/wastewater shall be used. A proper record in this regard should be maintained and available at site.
- xviii) Any groundwater dewatering should be properly managed and shall conform to the approvals and the guidelines of the CGWA in the matter. Formal approval shall be taken from the CGWA for any groundwater abstraction or dewatering.
- xix) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- xx) Sewage shall be treated in the STP with tertiary treatment. STP shall be installed in phased manner viz a viz in module system designed in such a way so as to efficiently treat the wastewater with increase in its quantity due to rise in occupancy. The treated effluent from STP shall be recycled/re-used for flushing, AC make up water and gardening. No treated water shall be disposed of into municipal storm water drain.
- xxi) No sewage or untreated effluent water would be discharged through storm water drains. Onsite sewage treatment of capacity of treating 100% wastewater to be installed. The installation of the Sewage Treatment Plant (STP) shall be certified by an independent expert and a report in this regard shall be submitted to the Ministry before the project is commissioned for operation. Treated wastewater shall be reused on site for landscape, flushing, cooling tower, and other end-uses. Excess treated water shall be discharged as per statutory norms notified by Ministry of Environment, Forest and Climate Change. Natural treatment systems shall be promoted.
- xxii) Periodical monitoring of water quality of treated sewage shall be conducted. Necessary measures should be made to mitigate the odour problem from STP.
- xxiii) Sludge from the onsite sewage treatment, including septic tanks, shall be collected, conveyed and disposed of as per the Ministry of Urban Development, Central Public Health and Environmental Engineering Organization (CPHEEO) Manual on Sewerage and Sewage Treatment Systems, 2013.

#### IV. Noise monitoring and prevention

i) Ambient noise levels shall conform to residential area/commercial area/industrial area/silence zone both during day and night as per Noise Pollution (Control and Regulation) Rules, 2000. Incremental pollution loads on the ambient air and noise quality shall be closely monitored during construction phase. Adequate measures shall be made to reduce ambient air and noise level during construction phase, so as to conform to the stipulated standards by CPCB/SPCB.

- ii) Noise level survey shall be carried out as per the prescribed guidelines and report in this regard shall be submitted to Regional Office of the Ministry as a part of sixmonthly compliance report.
- iii) Acoustic enclosures for DG sets, noise barriers for ground-run bays, ear plugs for operating personnel shall be provided as mitigation measures for noise impact due to ground sources.

## V. Energy Conservation measures

- i) Compliance with the Punjab Energy Conservation Building Code (PECBC) of Energy Efficiency shall be ensured.
- ii) Outdoor and common area lighting shall be LED.
- iii) Concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc. shall be incorporated in the building design. Wall, window, and roof uvalues shall be as per ECBC specifications.
- iv) Energy conservation measures like installation of LEDs for lighting the area outside the building should be integral part of the project design and should be in place before project commissioning.
- v) Solar, wind or any other Renewable Energy equipment shall be installed to meet electricity generation equivalent to at least 1% of the demand load or as per the state level/ local building bye-laws requirement, whichever is higher.
- vi) Solar power by utilizing at least 30% of the rooftop area shall be used for lighting in the apartment to reduce the power load on grid. Separate electric meter shall be installed for solar power.

### VI. Waste Management

- i) A certificate from the competent authority handling municipal solid wastes, indicating the existing civic capacities of handling and their adequacy to cater to the M.S.W. generated from project shall be obtained.
- ii) Disposal of muck during construction phase shall not create any adverse effect on the neighbouring communities and be disposed of taking the necessary precautions for general safety and health aspects of people, only in approved sites with the approval of competent authority.
- iii) Separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- iv) Organic waste compost/ Vermiculture pit/ Organic Waste Converter within the premises with a minimum capacity of 0.3 kg /person/day must be installed for treatment and disposal of the waste.

- v) All non-biodegradable waste shall be handed over to authorized recyclers for which a written tie up must be done with the authorized recyclers.
- vi) Any hazardous waste generated during construction phase, shall be disposed of as per applicable rules and norms with necessary approvals of the State Pollution Control Board.
- vii) Use of environment friendly materials in bricks, blocks and other construction materials, shall be required for at least 20% of the construction material quantity. These include Fly Ash bricks, hollow bricks, AACs, Fly Ash Lime Gypsum blocks, Compressed earth blocks, and other environment friendly materials.
- viii) Fly ash should be used as building material in the construction as per the provision of Fly Ash Notification of September, 1999 and amended as on 27th August, 2003 and 25th January, 2016. Ready mixed concrete must be used in building construction.
- ix) Any wastes from construction and demolition activities related thereto shall be managed in such a way so as to strictly conform to the Construction and Demolition Rules, 2016.
- x) Used CFLs and TFLs should be properly collected and disposed off/sent for recycling as per the prevailing guidelines/ rules of the regulatory authority to avoid mercury contamination.

#### **VII.** Green Cover

- i) No tree shall be felled/transplanted unless extreme exigencies demand. Where absolutely necessary, tree felling shall be with prior permission from the concerned regulatory authority. Old trees should be retained based on girth and age regulations as may be prescribed by the Forest Department. Plantations to be ensured species (cut) to species (planted).
- ii) At least single line plantation all around the boundary of the project as proposed shall be provided. The open spaces inside the plot should be suitably landscaped and covered with vegetation of indigenous species/variety. A minimum of one tree for every 80 sqm of total project land should be planted and maintained. The existing trees will be counted for this purpose. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping. The plantation should be provided as per SEIAA guidelines.
- Where the trees need to be cut with prior permission from the concerned local Authority, compensatory plantation in the ratio of 1: 10 (i.e. planting of 10 trees for every 1 tree that is cut) shall be done and maintained. Plantations to be ensured species (cut) to species (planted). Area for green belt development shall be provided as per the details provided in the project document.
- iv) Topsoil should be stripped to a depth of 20 cm from the areas proposed for buildings, roads, paved areas, and external services. It should be stockpiled

- appropriately in designated areas and reapplied during plantation of the proposed vegetation on site.
- v) The project proponent shall not use any chemical fertilizer /pesticides /insecticides and shall use only Herbal pesticides/insecticides and organic manure in the green area.
- vi) The green belt along the periphery of the plot shall achieve attenuation factor conforming to the day and night noise standards prescribed for residential land use.

## **VIII. Transport**

- i) A comprehensive mobility plan, as per MoUD best practices guidelines (URDPFI), shall be prepared to include motorized, non-motorized, public, and private networks. Road should be designed with due consideration for environment, and safety of users. The road system can be designed with these basic criteria.
  - a) Hierarchy of roads with proper segregation of vehicular and pedestrian traffic.
  - b) Traffic calming measures.
  - c) Proper design of entry and exit points.
  - d) Parking norms as per local regulation.
- ii) Vehicles hired for bringing construction material to the site should be in good condition and should have a pollution check certificate and should conform to applicable air and noise emission standards and be operated only during non-peak hours.
- iii) A detailed traffic management and traffic decongestion plan shall be drawn up to ensure that the current level of service of the roads within a 05 kms radius of the project is maintained and improved upon after the implementation of the project. This plan should be based on cumulative impact of all development and increased habitation being carried out or proposed to be carried out by the project or other agencies in this 05 Kms radius of the site in different scenarios of space and time and the traffic management plan shall be duly validated and certified by the State Urban Development department and the P.W.D./ competent authority for road augmentation and shall also have their consent to the implementation of components of the plan which involve the participation of these departments.
- iv) Traffic congestion near the entry and exit points from the roads adjoining the proposed project site must be avoided. Parking should be fully internalized and no public space should be utilized.

#### IX. Human health issues

i) All workers working at the construction site and involved in loading, unloading, carriage of construction material and construction debris or working in any area with dust pollution shall be provided with dust mask.

- ii) For indoor air quality the ventilation provisions as per National Building Code of India shall be strictly followed.
- iii) Emergency preparedness plan based on the Hazard identification and Risk Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.
- iv) Occupational health surveillance of the workers shall be done on a regular basis.
- v) A First Aid Room shall be provided in the project both during construction and operations of the project.

## X. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for spending Rs. 20 Lakhs on CER activities mentioned as per details given below:

S.No.	Activities	Annual Expenditure (in Lakhs)	Timeline (2020 to 2025)	Total Expenditure in 5 Years
1.	Adoption of Government Senior Secondary School, Village Lohgarh, Zirakpur, Mohali. Punjab.  Maintenance of school building. Provision of 2 water coolers. Upgradation of the facilities in school by providing aid in order to purchase books and furniture.	20	One time	20
	Total	20		20

\*Note: - The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project.

- ii) The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions to all shareholders / stake holders. The copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of six-monthly report.
- iii) A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- Action plan for implementing EMP and environmental conditions along with the iv) responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 215.00 Lacs towards the capital cost and Rs 12.0 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 19.5 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents' society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

#### XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier.

#### XII. Miscellaneous

- The project proponent before allowing any occupancy shall obtain completion and occupancy certificate from the Competent Authority and submit a copy of the same to SEIAA, Punjab.
- ii) The project proponent shall comply with the conditions of CLU.
- iii) The project proponent shall prominently advertise it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days indicating that the project has been accorded environment clearance and the details of MoEF&CC /SEIAA website where it is displayed.
- iv) The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in

- addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- v) The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.
- vi) The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the ministry of Environment, Forest and Climate Change at Environment Clearance portal.
- vii) The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii) The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities, commencing the land development work and start of production /operation by the project.
- ix) The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.
- x) The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- xi) No further expansion or modifications in the plant/project shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).
- xii) Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiii) The SEIAA/Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xiv) The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xv) The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data/ information/monitoring reports.
- xvi) The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and

- Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvii) Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

### **Additional Condition: -**

i) The project proponent shall plant minimum 150 no. of trees within the projects of native varieties as per the guidelines of the MoEF/SEIAA.

Item No: 164.06: Application for Environmental Clearance under EIA notification dated 14.09.2006 for expansion of Integrated Township namely "Quark City" located at Plot Nos. A-40A & A-45, Focal Point Industrial Area, Phase VIIIB, Mohali (Punjab) by M/s Quark City India Pvt. Ltd. (Proposal No. SIA/PB/MIS/31373/2017).

SEIAA observed as under:

# 1.0 Background

Earlier, M/s Quark City India Private Ltd was granted Environmental clearance under EIA notification dated 14.09.2006 by MoEF&CC vide no. J.12011/160/2005-IA (CIE) dated 11.04.2007 for the development of Information Technology and Knowledge-Based Industry Park/Special Economic Zone by constructing multi-storey buildings for housing, offices, commercial space and activities related to human living in an area of 51.3 acres having built-up area 4,15,531.21 sqm.

Thereafter, TORs were issued for expansion of the project by the MoEF&CC vide O.M F.No. 21-122/2017-IA-III dated 2nd June, 2017.

M/s Quark City India Pvt. Ltd has submitted EIA report vide proposal no SIA/PB/MIS/31373/2017 to SEIAA, Punjab for obtaining fresh Environmental Clearance under EIA notification dated 14.09.2006 for the expansion of Integrated Township namely "Quark City" located at Plot Nos. A-40A && A-45, Focal Point Industrial Area, Phase VIIIB, Mohali (Punjab)in a plot area of 51.30 acres, and overall built-up area of 7,47,088.902 sqm.

EIA report was scrutinized by the AEE & Essential Details were sought on 03/05/19 and 03/09/2019 to which he replied on 24.07.2019 and 19.09.2019, respectively.

# 2.0 Deliberations during the 188<sup>th</sup> meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020. SEAC was apprised that in compliance to the Ministry circular dated 07.09.2017 regarding environmental clearance to the expansion projects/activities under the EIA Notification,2006, Regional Office of the Ministry was requested vide letter no 943 dated 13.11.2019 to submit certified compliance report of the conditions of the environmental clearance granted to M/s Quark city India Private Ltd .

Accordingly, the Regional Office of the Ministry vide letter no 5-81/2007-RO(NZ)/ 132 dated 14.02.2020 has sent the certified compliance report of the conditions of environmental clearance, which was perused by the SEAC. SEAC observed that project proponent has complied with condition no (viii), (x) and (xvii) of construction phase and condition no (iv), (v), (vi) and (ix) of the operation phase. However, condition no (i), (iii) and (viii) of the operation phase has not fully complied with. To guery of SEAC regarding

the compliance of these conditions, the project proponent submitted an undertaking dated 04.03.2020 as under: -

- i) With reference to the non-compliance mentioned at point no (i) regarding submission of STP adequacy report certified by an independent expert, it was submitted that they had hired experts for preparing the STP adequacy report and the same will be submitted within a month time.
- ii) With reference to the non-compliance mentioned at point no (iii) regarding not having in-vessel bio-conversion technique for handling solid waste, it was submitted that solid waste generated from the project will be handled as per Solid Waste Management Rules, 2016. Bio-methanation will be done in order to process the bio-degradable solid waste generated from the project.
- iii) With reference to the non-compliance mentioned at point no (vii) regarding the application of solar energy in common areas, it was submitted that solar panels having 200 KW will be installed on the rooftop of building within 12months time.

SEAC was not satisfied with the reply of the project proponent.

However, on the request of SEAC allowed the environmental consultant of the project proponent to present salient features of the project. The details of the project as per the application form and as presented by the environmental consultant along with various details as submitted during the meeting are as under:

S.No.	Item	Details
1.	Online Proposal No.	SIA/PB/NCP/31373/2017
	Name and Location of the	Integrated Township namely "Quark City"
	project	located at Plot Nos. A-40A & A-45,
		Focal Point Industrial Area,
		Phase VIIIB, Mohali (Punjab)
3.	Latitude & Longitude	30°40′25″N Latitude
		7640'25"E Longitude.
4.	Project/activity covered under	Sr. No. 8(b)
	item of scheduled to the EIA	'Township and Area Development Projects'.
	Notification,14.09.2006	
	Whether the project is in critical	No
	polluted area or not.	
6.	If the project involves diversion of	No.
	forest land. If yes,	
	a. Extent of the forest land.	
	status of the forest clearance.	
7.	Does the project cover under	No
	PLPA, 190?	
	, ,	
8.	Does the project fall within 10 km	Yes
	of eco-sensitive area/ National	
	park/Wild Life Sanctuary? If yes,	, , ,
	a. Name of eco-sensitive area/	location.

	Nation	al narl	k/Wild L	ife ii) -	The project	is located	l outside	the eco-
	Sanctua project b. Stat	ary and dis site. us of clear	tance from tance from to	he é s he :	sensitive zor Eco-Sensitive 125 meters Sanctuary.	ne of City e Zone of	Bird Sand Sanctuary	tuary as
	(NBWL		.oa _	iii) l	However, the For NBWL cle			
9.		cation/Land ster Plan	use pattern		try & wareh	ouse zone	•	
10.	Cost of	the project		Rs. 15	500 Crores			
10 a	Enviror Fee de	nmental Cle etail	arance.	Rs 7, 13.09	47,090/- vid .2019	de DD No	. 761128	/- dated
11.		Plot Area, een area	Built-up Are	ea The d	etails of the	project ar	e as unde	r:
				S.N o.	Descrip	tion	Area	1
				1.	Plot are			0 acres
				2.	Built-up	area	1	,088.902
				3.	Green a	area	sq.m 45,2	
12.	Populat (when	tion fully operat	ional)		Residential: 4990 Floating: 33862			
13.		Requireme uction Phase	nts &source e	consti the sa	reated was ruction purp me will be n ng STP.	oses and	requirem	ents of
				peak	stic demand period @ 9 om the grou	KLD (@ 4		_
14.		p of Water er, Rainy, V	Requirement Vinter):	s including	gexpansion	& source i	n Operation	on Phase
	S.N	Season	Fresh water	r	Reuse wat	er		Total
	0.		Domestic	Make up	Flushing	Green	HVAC	(KLD)
			(KLD)	water	(KLD)	area	(KLD)	includi
				for Swimmi		(KLD)		green area
				ng pool (KLD)				
	1.	Summer	1755	30	766	249	620	3420
	2.	Winter	1755	30	766	81	-	2632
	3.	Rainy	1755	30	766	23	620	3194

	]				T _				
	S.No.	Description		Source					
	1.	Domestic		Borewe					
	2	Flushing purposes			Treated wastewater				
	3.	Green area			Treated				
	4.	HVAC	1		Treated				
15.	Treatment & Disposal arrangements of wastewater in Construction Phase			Wastewater generated will be treated in existing STP and treated wastewater will be used for plantation purposes.					
	Waste Material handling will be carried of as per Construction and Demolition (C& Waste Management Rules, 2016. The struction will be responsible for the collection & storage of construction and demolition waste generated on the site.					on (C&D) The site for the ction and e site.			
16.	Disposal Arrangement of Wastewater in Operation Phase			Total wastewater generated will be 2170 KLD out of which 1404 KLD (grey water) will be treated in WWTP of existing 750, 150 & 32 KLD capacity and Proposed 500 KLD capacity and remaining wastewater 766 KLD (black water which includes 572 KLD existing wastewater generation) will be treated in existing STPs of 800, 100 in F7, 150 in F2 and 48 KLD in R7.  Reuse of treated wastewater available at outlet of STP of 2127 KLD after considering				be 2170 vater) will 50, 150 & 500 KLD r udes 572 n) will be 00 in F7, ailable at onsidering	
				evaporation losses @ 2% in 2170 KLD and discharge of surplus treated wastewater is given as under: _					
	Season	Flushing (KLD)	Green (KLD)	_	Make water HVAC cooling tower	up for	Sewer (KLD)	Total KLD	
	Summer	766	249		620		492	2127	
	Winter	766	81		0		1280	2127	
	Monsoo	n 766	23		620		718	2127	
17.	Rainwater recharging detail			in 6 rechar	existing ging pit	& 7 s. H	nwater will be proposed ence, a tota oe provided.	rainwater	
18.	Solid waste generation and its disposal			recharging pit shall be provided.  a) 8,769 kg/day b) Solid waste is being duly segregated (at source by providing bins) into Bio-					

		dogradable :	n biodos:	adable sare:	onorto		
		degradable, no and hazardous	_	auabie Comp	OHEHILS		
		A separate a		armarked f	or the		
		segregation of					
		Biodegradable			dings is		
		being composte		_	_		
		mechanical c	omposter	has also	been		
		proposed for th	ne future l	ouildings.			
		A shed area of		•	-		
		sufficient to ac					
		about 20'.4" x					
		3'.3", 20'.0" x 7		3" & 20'.4" x	6'.0" X		
		3'.3" has been	•	lm, wasta is	hoina		
		Non-biodegrad handed over to		•	_		
		Domestic hazar		•			
		of to authorize					
		Management R		•			
	Parking requirement	Required: 7146	•				
		Proposed: 802					
19.	Hazardous Waste & E-Waste	Used oil from					
		registered rec	-				
		disposed of			E-waste		
20.	Energy Requirements	(Management) a)30 MW from		ent Ruieszui	.٥.		
20.	Energy Requirements & Saving	b) Total 3 DG		1650 KVA e	ach are		
	Saving	already provid					
		buildings and 1		•	_		
		are proposed for future buildings for					
		emergency pur	poses.				
		Energy Saving					
		solar panels h					
		rooftop of the					
		area covered b m <sup>2</sup> which w		rate solar	power		
		generation.	ılı yene	i ate Solal	power		
21.	Environment Management Plan	30					
	along with Budgetary break-up	Description	Capital	Recurring	Monitori		
	phase-wise and responsibility to		cost	cost	Air,		
	implement		(lakhs)	(lakhs)	water		
			20.42		annum)		
		Construction	2043	-	2		
		Operation	-	28	2		
22.	CER activities along with budgetar						
Mr.	Mr. Rajesh Sharma will be responsible for the implementation of CER (Corporate						

Mr. Rajesh Sharma will be responsible for the implementation of CER (Corporate Environmental Responsibility) within 7 years. Rs 3.75 Crores (0.25% of Rs. 1,500 Crores) has been planned to be reserved for CER.

SEAC made certain observation to which proponent replied as under:

## 1) Observation 1:

Submit compliance of the following condition of the earlier granted environmental Clearance of the operation phase, which was reported "not complied" by MoEF & CC: -

- Condition no (i) of operation phase regarding submission of STP adequacy report certified by an independent expert. The report must comment upon the capacity of all the existing STP/WWTP installed by the promoter company.
- ii) Condition no (iii) of operation phase (iii) regarding not having in-vessel bioconversion technique for handling solid waste.
- iii) Condition no (vii) of operation phase (vii) regarding the application of solar energy in common areas.

# Reply 1

- i) Presently, one STP of 800 KLD capacity is operational in the project. The plant comprises primary, secondary and tertiary treatment consisting of a screen chamber, oil & grease trap, collection tank, aeration tank, pressure sand filter, activated carbon filter, hypo dosing, etc. The capacity of STP is 800 KLD which is sufficient to handle the existing sewage load of 572 KLD generated from the project. The certificate in this aspect from Eco Paryavaran Engineers & Consultant Pvt. Ltd. was submitted. Further, treated water from STP was being monitored regularly for its performance. Copy of recent test report from IDMA Laboratories Limited was submitted which indicates that the treated wastewater is meeting the prescribed standards for all the parameters.
- ii) Presently, the biodegradable solid waste being generated from the existing buildings is being composted through vermicomposting. A shed area of total 678.74 square feet, having four vermibeds with dimensions 20'.4" x 5'.10" x 3'.3", 24'.9" x 7'.6" x 3'.3", 20'.0" x 7'.6" x 3'.3" & 20'.4" x 6'.0" x 3'.3" have been provided. Layout of the vermiculture plant was also submitted

Further, as suggested, a Bio-methanation plant of 4,000 kg/day will also be looked into in order to process the bio-degradable solid waste generated from the project. Site layout plan showing location of Solid waste management area including segregation was also submitted. Revised EMP stating cost during construction & operation phase including all the environment-related measures was also submitted. The details of the same are given below: -

Table 1(a): EMP cost during Construction Phase

S. No.	Environmental Aspect	Cost (Rs. in Crores)				
1.	Rainwater harvesting & groundwater recharge	1.5				
2.	Wastewater and Sewage Treatment Plant & Sewage Pumping stations	3.75				
3.	Solid Waste Management	3.15				
4.	Noise pollution Control	0.5				
5.	Green Areas	2.33				
6.	Fire fighting	10.5				
7.	Solar Panels	12				
8.	Monitoring expenses	0.02				
9.	Miscellaneous	0.1				
	Total Cost on EMP					

# Table 1(b): EMP cost during Operation Phase

		Recurring Cost
S.No.	Environmental Aspect	per annum
		(Rs. in Lakhs)
1.	Rainwater harvesting & groundwater recharge	2
2.	Wastewater and Sewage Treatment Plant & Sewage Pumping stations	13
3.	Solid Waste Management	10
4.	Noise Pollution Control	0.5
5.	Green Areas	6.5
6.	Fire fighting	2
7.	Solar panels	5
8.	Monitoring expenses	2
	Total recurring Cost on EMP	Rs. 41 Lakhs

iii) The solar panel with power generation capacity of 200 KW will be installed on the rooftop of the building within 12 months. In addition to it, solar lights will be installed in common areas for external lightning within a month.

Undertaking in this regard was submitted. The cost for solar panel has already been included in EMP cost

# 2) Observation 2

Submit a concrete proposal of revised CER activities as per the OM dated 01.05.2018 indicating the timeline and the corresponding amount to be spent in the nearby villages along with the consent of their Sarpanch.

# Reply 2

Rajesh Sharma (Chief Operating Officer) of M/s Quark City India Pvt. Ltd.; developers of Project "Quark City" located at Plot Nos. A-40A & A-45, Focal Point Industrial Area, Phase VIIIB, Mohali, Punjab submitted that the overall cost of the project is Rs. 1500 Crores. Thus, 0.25% of Rs. 1500 Crores i.e. Rs. 375 Lakhs needs to be spent on CER as per Office Memorandum dated 01.05.2018. M/s Quark City India Pvt. Ltd. proposes to spend Rs. 375 lakhs in 7 years of times per the following activities: \_

S.				Tim	e pla	n			Total	
No.	Activities	1	2	3	4	5	6	7	expenditure (in 7 years)	
1.	Adoption of Village Badi Naggal									
	<ul> <li>Setting up of sewerage system.</li> </ul>	35	30	20	-	-	-	-	85	
	<ul> <li>Construction &amp; maintenance of Village road</li> </ul>	-	-	-	-	35	-	-	35	
	<ul> <li>Maintenance of school building.</li> </ul>	-	-	-	-	ı	ı	25	25	
	<ul> <li>Digging of borewell and providing drinking water supply to the villagers.</li> </ul>	-	-	-	-	1	1	10	10	
	<ul> <li>Installation of solar panel on the govt.</li> <li>buildings in the village</li> </ul>	-	-	-	-	1	25	-	25	
	<ul> <li>Wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.</li> </ul>	-	-	-	35	-	-	-	35	
2.	Adoption of Village Choti	Nagg	jal	•						

	<ul> <li>Setting up of sewerage system.</li> </ul>	-	35	10	-	-	-	-	45
	<ul> <li>Providing drinking water supply to the villagers.</li> </ul>	-	-	-	-	-	-	10	10
	<ul> <li>Wastewater treatment of village pond as per the design evolved by Punjab Pollution Control Board.</li> </ul>	-	1	35	-	-	-	-	35
3.	Wastewater treatment of village pond as per the design evolved by Punjab Pollution Control Board in Village Padol	-	-	-	-	35	-	-	35
4.	Wastewater treatment of village pond as per the design evolved by Punjab Pollution Control Board in Village Mullanpur	-	-	-	-	-	35	-	35
	Total amount to be spent on CER	35	65	65	35	70	60	45	375

# 3) Observation 3

Clarify as to whether proposed building such as M 1, M 2 & M 3: Site for Hotels, Multiplex & Shopping Mall, etc., C1: Site for common facilities, R 1, R 2, R 3, R 4 & R 5: Site for residential buildings, are permissible in the "Industry & warehouse zone" of the Master Plan.

#### Reply 3

As per the Master plan of SAS Nagar, "in Industry & warehouse zone"; green & orange category industries and logistics are permitted with a minimum site area requirement of 50 acres. Computer software development; Knowledge Park; Assembly and repair of computer hardware and electronic equipment; Printing, publishing and allied industries; Packing of dried foodstuff; Warehouse except for storage of chemicals, etc. are some of the examples of development permitted in the said zone.

The plot area of the project is 51.3 acres which is more than permissible area of 50 acres. Out of which, 10% is reserved for common facilities, 60% is reserved for industrial purposes (non-polluting knowledge-driven industries like information technology, business processes outsourcing), 30% for residential purposes and 10% for commercial purposes.

All these components have already been approved by GMADA during the time of layout/building plan approval vide Memo No. 8195 CTP(Pb)/SC-122 dated

17.12.2019. In addition to it, existing buildings have been granted Consent to Operate from PPCB. Also, earlier Environmental Clearance has been accorded for developing Information Technology and Knowledge-based Industry Park, Special Economic Zone for housing, offices, commercial space, etc.

Thus, buildings such as M 1, M 2 & M 3 (site for Hotels, Multiplex & Shopping Mall, etc.); C1 (site for common facilities); R1, R2, R3, R4 & R5 (site for residential buildings) are permissible in the project.

# 4) Observation 4

Specify what kind of low-rise Non-polluting industry allowed in the project site.

#### Reply 4

As project comprises of the components such as Information Technology, Business processes outsourcing, etc.), etc. which comes under orange and green category industries. Further, no project covered under Category A or B as per EIA Notification, 2006 and its amendments will be allowed except Schedule 8(a) & 8(b). In addition to it, no chemicals and hazardous storage is allowed in the project.

#### 5) Observation 5

Details of the green area proposed in the project.

#### Reply 5

- i) Green belt has been proposed all along the boundary of the project.
- ii) Green area of 45,200 sqm. (i.e. more than the permissible green area requirement) has been proposed along the roads as well as within the designated sites.
- iii) No. of trees required = 1 tree per 80 sqm. of plot area
- iv) No. of trees required = 2,07,602.123 / 80 = 2,595 trees.
- v) No. of trees proposed = 5,000 trees out of which, 3,018 trees have been planted within the project so far.

#### 6) Observation 6

Submit the proposal for the treatment of wastewater to make it fit for utilizing as make up water for HVAC cooling.

#### Reply 6

The wastewater treatment comprises steps such as pH adjustment, primary coagulation, sedimentation tank, pH adjustment, secondary coagulation, sedimentation tank and treated water will be obtained. The treated wastewater will be further passed through softener to make it suitable for use in HVAC. The soft water will be having TDS less than 10 mg/l and will be used as make up water for HVAC cooling. The cost for softener has already been included in EMP cost.

#### 7) Observation 7

Submit the details of the Requirement of water, wastewater generation and treatment for the existing, proposed expansion and after expansion, separately.

#### Reply 7

i) The existing population of the project is 13,400 persons. Details of the actually existing population in comparison to the overall estimated population is calculated as under:

Sr. No.	Description	Actual Population	Proposed	Overall, after expansion
1.	Residents	400	4,590	4,990
2.	Floating population	13,000	20,862	33,862
	Total Estimated Population	13,400	25,452	38,852

ii) Water requirement and wastewater generation is calculated as under: -

SI. No.	Description	Criteria	Existing (in KLD)	Proposed (in KLD)	Overall, after expansion
					(in KLD)
1.	Residential	@ 200 lpcd	80	918	998
2.	Floating population	@ 45 lpcd	585	938	1,523
	Total water req.		665 KLD	1,856 KLD	2,521 KLD
	Wastewater load		572 KLD	1,598 KLD	2,170 KLD
	Treatment		WWTP of 750, 150 & 32 KLD capacity have been installed and STP of 800, 100, 150 & 48 KLD capacity.  Out of which, STP of 800 KLD is operational.	KLD capacity	WWTP of 750, 150, 32 & 500 KLD capacity and STP of 800, 100, 150 & 48 KLD capacity.

iii) Presently, WWTP of 750, 150 & 32 KLD capacity have been installed and STP of 800, 100, 150 & 48 KLD capacity have been installed at the site.

Initially, small modular STP & WWTP were installed as per the quantity of sewage/wastewater generation. Hence, gradually with the increase in the quantity of sewage/wastewater generation, new plants of higher capacities were installed instead of upgrading the smaller units. However, presently one STP of 800 KLD capacity is operational which is sufficient to cater sewage load of 572 KLD and small modular types are currently nonfunctional. The plant comprises primary, secondary and tertiary treatment consisting of a screen chamber, oil & grease trap, collection tank, aeration tank, pressure sand filter, activated carbon filter, hypo dosing, etc. The cost has already been included in EMP. 500 KLD capacity of WWTP is proposed in addition to the existing STP/WWTPs.

#### 8) Observation 8

Submit the concrete proposal of bio-methanization to handle solid waste in an environmentally sound manner.

# Reply 8

The detailed write up for bio-methanation along with cost was submitted. Site layout plan indicating the location of the Solid waste management area including segregation was submitted. If in any case, the option for installation of bio-methanation plant is not found suitable, pyrolysis of the solid waste generated from the project will be done. Further, it is to assure you that no solid waste will be dumped outside the project premises and it will be treated within the project premises only.

SEAC was satisfied with the reply of the project proponent and took the reply on record.

#### 3.0 Recommendations

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations to grant Environmental Clearance for 2006 for the expansion of Integrated Township namely "Quark City" having built-up area of 7,47,088.902 sqm in total land of 51.30 acres located at Plot Nos. A-40A && A-45, Focal Point Industrial Area, Phase VIIIB, Mohali (Punjab)as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures, conditions prescribed in **Annexure-I of the proceedings** subject to following special conditions, additions, amendments and deletions given as under:

#### **Special conditions**

i) No industry covered under Category "A" and "B" falling in the Schedule appended to the EIA notification, 2006 (as amended from time to time) shall be allowed to established except category under 8 (a) and 8(b) in Integrated Township namely "Quark City" located at Plot Nos. A-40A & A-45, Focal Point Industrial Area, Phase VIIIB, Mohali. However, other industries (not covered in the EIA notification, 2006), although categorized as Orange, Green and White as per the PPCB

- classification are allowed to be established.
- ii) Orange, Green and White category of industries such as Information Technology, Business processes outsourcing, Computer software development; Knowledge Park; Assembly and repair of computer hardware and electronic equipment; Printing, publishing and allied industries; Packing of dried foodstuff; Warehouse except for storage of chemicals and hazardous storage, etc., are allowed to be set up as per the layout plan approved by the GMADA. Further, no red category of industry shall be allowed to be established.
- iii) Each individual industry or project will obtain mandatory permissions like Consent to Establish, Consent to Operate and Hazardous Waste authorization under the pollution control laws from the Punjab Pollution Control Board.
- iv) No water-intensive industries shall be allowed to establish and plots will be allotted to those Industries which will achieve Zero Liquid Discharge.
- v) High Air Polluting industry like cement grinding units, Induction (more than 500 kgs/ heat)/ Cupola furnaces/ Reheating Rolling Mills, Brick Kilns, Saila Plants, etc. shall not be allowed to established.
- vi) All DG sets shall be equipped with canopies.
- vii) The project proponent shall provide Piezometers at the project site as per the CGWA guidelines.
- viii) The individual industry/plot holder shall not install any groundwater abstraction structure without permission from the CGWA or competent authority.
- ix) In case of future requirements, no groundwater will be abstracted by "Quark City" without obtaining NOC from competent authority.

# Conditions to be added in section III of Water quality monitoring and preservation of Annexure-I as under: -

- i) Softener shall be installed for treated wastewater to make it fit (TDS  $\leq$  10 mg/l ) for HVAC cooling and the cost of the same will be included in the Environment Management Plan.
- ii) The wastewater generated from swimming pool(s) shall not be discharged and the same shall be reused within the premises for purposes such as horticulture, HVAC, etc

#### Conditions to be amended in the Annexure-I as under: -

# Condition no. iv), v-a) & xv) of III. Water quality monitoring and preservation

- iv) The total water requirement for the project including the demand for swimming pool and landscaping in the summer season will be 3420 KLD, out of which 2551 KLD shall be met through groundwater and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a)The total wastewater generation from the project will be 2170 KLD, which will be treated in WWTP of capacity 750, 150, 32 (existing) & 500 KLD (additional proposed) and STP of capacity 800, 100, 150 & 48 KLD (Existing), within the

project premises. However, 2127 KLD treated wastewater will be available at the outlet of STPs after considering evaporation losses. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr.	Season	Flushing	Green	Make up	Sewer	Total
No.		(KLD)	Area (KLD)	water for cooling Tower	(KLD)	(KLD)
				(KLD)		
1.	Summer	766	249	620	492	2127
2.	Winter	766	81	0	1280	2127
3.	Rainy	766	23	620	718	2127

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 13 nos of rainwater harvesting recharge pits (with dual-bore) shall be provided for groundwater recharging as per CGWA norms. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

#### Additional Condition no. vii of V. Energy Conservation Measures.

vii) As proposed, a solar plant of capacity 200 KW, shall be installed on the rooftop of the building, within 12 months. Also, solar lights in the common area will be installed for external lightening within a month time.

#### Condition no. iv of VI. Waste Management.

iv) Bio methanation Plant of minimum capacity of 4,000 kg/day to treat biodegradable waste must be installed. As proposed, an amount of Rs 1.4 Crores shall be kept in the Environment Management Plan for the same.

#### Condition no. ii of VII. Green Cover.

vi) Minimum 5000 trees will be planted and maintained in the project site. Also, the Green area of 45,200 sqm. (i.e. more than the permissible green area requirement) shall be maintained on the designated sites and along the roadsides. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping.

#### X. Condition no. i) & iv) of X Corporate Environment Responsibility

iv) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1<sup>st</sup> May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for spending Rs. 375 Lakhs on CER activities mentioned as per details given below:

S.		Time	e plan						Total
No.	Activities		2	3	4	5	6	7	expenditure (in 7 years)
1.	Adoption of Village Badi Naggal								( / / 555)
	<ul> <li>Setting up of sewerage system.</li> </ul>	35	30	20	-	-	-	-	85
	Construction & maintenance of Village road	-	-	-	-	35	-	-	35
	<ul> <li>Maintenance of school building.</li> </ul>	-	-	-	-	-	-	25	25
	<ul> <li>Digging of borewell and providing drinking water supply to the villagers.</li> </ul>	-	-	-	-	-	ı	10	10
	<ul> <li>Installation of solar panel on the govt. buildings in the village</li> </ul>	-	-	-	-	-	25	-	25
	Wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.	-	-	-	35	-	-	-	35
2.	Adoption of Village Choti Naggal	<u> </u>		<u> </u>			<u> </u>		
	<ul> <li>Setting up of sewerage system.</li> </ul>	-	35	10	-	-	-	-	45
	<ul> <li>Providing drinking water supply to the villagers.</li> </ul>	-	-	-	-	-	-	10	10
	<ul> <li>Wastewater treatment of village pond as per the design evolved by Punjab Pollution Control Board.</li> </ul>	-	-	35	-	-	-	-	35
3.	Wastewater treatment of village pond as per the design evolved by Punjab Pollution Control Board in Village Padol	-	-	-	-	35	-	-	35

4.	Wastewater treatment of village	-	-	-	-	-	35	-	35
	pond as per the design evolved								
	by Punjab Pollution Control								
	Board in Village Mullanpur								
	Total amount to be spent on	35	65	65	35	70	60	45	375
	CER								

<sup>\*</sup>Note: - The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project

iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate accounts and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 3385 Lacs towards the capital cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 41 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/resident's society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Rajesh Sharma, General Manager, on behalf of the promoter company.
- ii) Sh. Sandeep Garg, EIA Coordinator, M/s Eco Laboratories and Consultants Pvt. Ltd., E-207, Industrial Area, Phase VIIIB (Sector- 74), SAS Nagar (Mohali), Punjab.

Environmental Consultant of the project proponent presented the salient features of the project which was taken on record. During the meeting, the following observations were made to which project proponent replied as under:

Sr. No	Observations	Reply
1	What are the names of the villages which were initially acquired for the establishment of the project? Whether any of the villages are covered under the PLPA, 1900. If yes, then NOC from the	The project proponent sought some time to submit the detail.

	competent authority to the effect that no part of the project land is notified under PLPA Act, 1900 be submitted else submit the details of Khasra Nos of land notified under PLPA Act, 1900	
2.	What is the distance of the project site from National Highway-5?	The NH-5 passes adjacent to the site but, the project proponent could not submit the exact details in this regard.
3	Bio methanation Plant of minimum capacity of 4,000 kg/day to treat biodegradable waste has been proposed. For what purposes methane gas be utilized	Methane gas shall be utilised for cooking proposed within the project site.
4	What kind of industries to be allowed in the project?	No industry covered under Category "A"/ "B" falling in the Schedule appended to the EIA notification, 2006 (as amended from time to time) except category 8 (a) and 8(b), shall be allowed to establish.  Whereas other industries (not covered in the EIA notification, 2006), although categorized, Orange, Green and White as per the PPCB classification are allowed to be established. No red category shall be
		allowed to be established. An undertaking in this regard shall be submitted shortly.

After detailed deliberations, SEIAA decided to defer the case, ask the project proponent to submit the reply for the observation mentioned at Sr No. 1,2 & 4. The case be placed again before it after getting the reply from the project proponent.

Item No.164.07: Application for Environmental Clearance for expansion of steel manufacturing unit having existing capacity of 28,000 TPA to 1,00,800 TPA of Steel Ingots & Castings for Steel Ingots by replacement of induction furnace with new furnaces of capacity 2X12 TPH each & addition of concast machine in the revenue estate of village Tooran, Amloh Road, Mandi Gobindgarh, Distt. Fatehgarh Sahib, Punjab by M/s Samana Concast (Proposal no SIA/PB/IND/50002/2018).

SEIAA observed as under:

# 1.0 Background

The project proponent has applied for obtaining Environmental Clearance under EIA notification dated 14.09.2006 for increasing the production capacity from 28000 TPA to 1,00,800 TPA for manufacturing of Steel ingots & castings/billets by replacement of induction furnace with new Induction Furnaces of capacity 2X12 TPH each & addition of concast machine in the revenue estate of village Tooran, Amloh Road, Mandi Gobindgarh, Distt. Fatehgarh Sahib, Punjab. Project is covered under Activity 3(a) & Category 'B1' as per EIA Notification, 2006.

The case was considered by SEAC in the 167<sup>th</sup> meeting held on 26.05.2018 and was forwarded to SEIAA with recommendation to grant TORs. Accordingly, SEIAA in its 134<sup>th</sup> meeting held on 09.07.2018 decided to issue the TORs. In compliance with the said decision, TORs were issued to the project proponent vide letter no. SEIAA/2018/925 dated 16.07.2018. The public hearing was conducted by PPCB on 03.06.2019. The application for obtaining EC was submitted online on 01.03.2020 and accordingly, the requisite fee (Rs 80,000/- vide NEFT No 0037493435 dated 06.02.2020 & Rs 7200/- Vide UTR no.- SBIN220060456045) for obtaining EC was deposited by the project proponent.

Further, on the basis of scrutiny of the EIA report, EDS was made on 18.02.2020 and 28.02.2020 to which project proponent replied on 27.02.2020 & 01.03.2020 respectively.

# 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The project proponent informed that the project falls within the 5.0 Km radius of the boundary of MC Limit of Mandi Gobindgarh. But, as per the latest assessment of CPCB, the CEPI Score of Mandi Gobindgarh has been reduced from 75.08 to 53.91, which was reported by PPCB vide letter no.38244 dated 23.12.2019. Therefore, the said project has been considered by the SEAC.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient

# features of the project are as under: -

1.	Name and Location	n of the pro	oject	Vi M	/s Samana Concas llage- Tooran, Aml andi Gobindgarh, strict- Fatehgarh S	oh Road,		
2.	Nature of project Amendment/Othe	-	pansion	Fr	esh EC project			
3.	a) Category			a)	B-1			
	b) Activity			b)	3(a)			
	(As per schedule Notification, 2006 to time.)	• •			etallurgical Industr errous &Non-Ferro			
4.	Whether the pro- whole or partially the boundary of co- notified by MoEF8 in yes/No)	within 5.0 k ritical pollut	Cm from ed area	No, as the revised CEPI score of Mandi Gobindgarh is 53.91. Thus, it does not fall in the list of Critically Polluted Area.				
5.	Properly filled For signed declaration	_	with the	Submitted				
6.	Relevant proof of th	ne ownership	of land	Sı	ubmitted			
7.	Area Details							
	Details	Exis	ting		Additional Land	After Expansion		
	Plot Area	10323.2	23 Sqm.			10323.23 Sqm.		
8.	Co-ordinates of t site	he project	B: 30° C: 30°	A: 30°38'38.78"N and 76°16'14.10"E B: 30°38'40.38"N and 76°16'15.56"E C: 30°38'35.50"N and 76°16'15.51"E D: 30°38'35.44"N and 76°16'13.98"E				
9.	Revised Project ( expansion)	Cost (After	Propose Total Pr (The pr during	Existing Cost of project : Rs. 2.15 Cr.  Proposed Cost of project : Rs. 6.56 Cr  Total Project Cost of the project: Rs. 8.71 Cr  (The project cost revised by the project proponent during the presentation made before SEAC on 04.03.2020)				
10.	Raw Material re	equirement		•	@1,09,650 TPA &			
	(After expansion)		Ferro A	lloy	s @2,238 TPA			

11.	Produc	-	acity (After	Steel	Ingots &	Castings	@ 1,00,800 TPA		
12.	Details of major productive machinery/plant (After expansion)  Manpower (After expansion)			<ul> <li>(i) 2 Nos new induction furnaces (2 x 12 TPH)</li> <li>(ii) 01 Concast</li> <li>(iii) 01 Nos Scrap cutting Machine</li> <li>(iv) 1 Nos Scrap Bending machine</li> <li>(v) 2 Nos EOT Cranes</li> </ul>					
13.	Manpo	wer (After	expansion)	200 persons					
14.	Water Requirements &			Total	Water De	emand: 2	6.0 KLD		
	its source (After expansion)		Desc	cription	Existing (KLD)	g Proposed (KLD)	Total (KLD)		
				Don	nestic	3.0	6.0	9.0	
				Cool	ing Water	5.0	12.0	17.0	
				Tota	ıl	8.0	18.0	26.0	
45		C E.C.		Water demand shall be met thr tubewell after obtaining pern CGWA/DAC. Till the grant of NOC, the of STP Mandi Gobindgarh or nearby be used for industrial purposes.				n from ted water	
15.			nt (After expa						
	Detail	lS	Existing	After Remarks Expansion					
	Indus Efflue		water is/will	be generated from the cooling side and the same will be for treatment.					
	Domestic 2.4KLD Effluent		the project septic tank expansion, be installed wastewate			Wastewater generated from act is being treated in the k & used for plantation. After a, STP of capacity 10 KLD will led for the treatment of er. The treated water will be cooling purposes.			
16.	Details	of Emissi	ons (After ex	pansic	n)				
	l — — —	Source	Capacity	•	Chimne	y Height n)	Air Pollution Device	Control	
	1   1)	Induction Furnace	2X12 each	TPH	, ,		Side suction followed by arrestor & Pulse	hood spark Jet Bag	

								Filter Cleanir	with	Offline
	ii)	DG sets		5 KVA ) KVA		5 m 0 m			ed with Ca ed with Ca	. ,
17.	Detai	ı İs of Hazardou					After expa			97
	Sr.	Hazardous		Quantity		Dispo				
	No.	Waste Catego	orv	(After						
			,	expansion	)					
	i)	Cat.35.1	_	280 TPA	,	To M/s Madhav alloys for metal recovery.				
		Exhaust air	or			, , , , , , , , , , , , , , , , , , , ,				<i>,</i>
		Gas clean	ing							
		Residue								
	ii)	Cat.5.1 – Us	sed	0.02 KL	per	Autho	orized R	ecyclers	/Lubricant	within
		Oil		annum		the Industry				
18.	Solid	waste generat	and its disp	osal	(After	expansio	n)			
	Sr.	Solid Waste		Quantity		Disp	osal			
	No.									
	(i)	Slag		17.47 TP	D		•	ed for	manufact	uring of
						brick	_			
						-			resentatio	n made
						ļ.	re SEAC c			
19.	Greer		•				- '	•	within the	-
	•	ncluding no. o			In addition, 421 trees to be planted in 3474 sqm area (33% of total area).					
	be pia	anted & its spe	cies		-		-		ation ma	do boforo
				-			3.2020)	present	.auon mac	de before
20.	Fnero	y Requiremen	tc					(M/thra	ugh PSPCl	
20.	_	expansion)	ıs				•		& 200 kVA	
	(AltCi	схранзіон				ranger		J KVA (	X 200 KVA	as staria
21.	Revis	ed Environmer	nt Ma							
		onment Manag		•			e respons	ible for	the imple	mentation
		P which consis		•	•		•		•	
		ss-in-charge, i				-	• • •			_
	-	ıltant. The bud		_		-	-			
	-		-	, ,			•			
	Sr.			Title			Capital C	ost Rs.	Recurring	Cost Rs.
	No						Lak	h	Lak	ch
	i)	Pollution (	Contr	ol durina						
		construction		_			5.0			

	ii)	Air Pollution Co	ntrol (Ir	nstallation of	71.0	5.0
	iii)	Water Pollution up-gradation	Control ,	Septic tank	10.0	0.5
	iv)	Solid Waste Man	agement	:	5.0	0.5
	v)	Environment Management	Monito	ring and	5.0	0.5
	vi)	Occupational He Management	alth, Saf	ety and Risk	5.0	0.5
	vii)	Rainwater Harve	sting		5.0	0.5
	viii)	Miscellaneous			5.0	
		Total			116.0	10.0
	dated 0	e submitted in presentation				
22.		Rainwater ing proposal	Jalalpu nearby village CSIR-N and ov (Revise	r village pon Jalapur villa ponds will IEERI's Phyto erflow water	d. Further, ge which which we first tree tree tree tree tree tree tree t	will be recharged through all the wastewater of the will be directed towards the eated in trenches through water treatment technology charged into the pond.  If proposal submitted along (1)
23.	•	ment for Green		roject propo ment for Gre		nitted the Revised water sunder: -
	area w.r.t. summer, winter and rainy season		S.No.	Season	Green area water demand in KLD	Source of water
			1	Summer	19.1	Balance Green area water demand will be met from
			2	Winter	6.25	treated wastewater from
				Rainy	1.74	STP of MC- Mandi Gobindgarh and nearby industries.
			(Revise	ed water red	luirement	for Green area submitted
			-	presentation	-	

24.	the ind in 'No Undert	isory Committee as industry is located NOC and till the grant of NOC, will use treated water STP of MC Mandi Gobindgarh or STP of near industrial purposes. Furth groundwater from the existing borewell will not							
25.		with budgetary up and sibility to	CER activities will be implemented in Pujya Shri Gian Muni Jain Public School, Shanti Nagar, Mandi Gobindgarh as per the detail given as under: -						
	S.No.	Activity		Environment	Cost (Rs. Lac)	Time	eline		
				Aspect	Lac)	Chart	Ford		
						Start	End		
	1.	Science Lab		Infrastructure	2.0	June 2020	Dec. 2020		
	2.	Separate toilet for boys & girls		Water hygiene & sanitation	2.0	June 2021	July 2021		
	3.	Ramp for Access to Floor	o 1 <sup>st</sup>	Infrastructure	2.5	Dec. 2021	June 2022		
	4.	Green board for classes		Infrastructure	0.5	As per Need			
	5.	Air conditioner for Science lab and furniture		Infrastructure	1.0	As per Need			
		ТОТ	AL		8.0				
	The entire activities proposed under CER shall be treated as project and shall be monitored. The monitoring report shall be submitted to the regional office as a part of a half-yearly compliance report and to the District Collector.  (Submitted revised CER activities and NOC from adopted school along with								
	1 1	ntation made on 04			c iroin ac	ioptea school	aiong with		

#### 3.0 Recommendations

After detailed deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application to SEIAA with the recommendations to grant Environmental Clearance for expansion of its existing unit located in the revenue estate of village Tooran, Mandi Gobindgarh, Distt. Fatehgarh Sahib, Punjab as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant, proposed measures with aforesaid salient features, conditions prescribed in **Annexure-II of the proceedings** subject to additions, amendments, and deletions given as under: -

#### Conditions to be added in the Annexure-II as under

- The project proponent shall minimize the water consumption in the steel plant complex by segregation of used water, practicing cascade use and by recycling treated water.
- ii. The project proponent shall provide STP for treatment of wastewater & reutilization of the treated water for core/non-core activities so as to achieve the Zero Liquid Discharge Condition as per the III (iv) of OM dated 09/08/2018 issued by the MoEF&CC for such units.
- iii. The project proponent shall reuse of cooling tower blow down, simultaneously ensuring the standards prescribed for such purge waters. If required, necessary arrangements shall be made to keep this waste stream within the parameters required for reuse.
- iv. A management plan shall be drawn up and implemented to contain the current exceedance in the ambient air quality at the site. Sand, murram, loose soil, cement, stored on-site shall be covered adequately and Water sprinkling system be put in place so as to prevent dust pollution.
- v. The project proponent shall reserve land for loading or unloading of raw material, products, slag, hazardous waste as well as for storage of these materials and the area to be reserved for parking. The area to be reserved by considering the time required for loading and unloading of vehicles for respective activities and minimum/maximum period for which storage of the above material is required in the premises. The areas for the respective activities to be marked on the layout plan.
- vi. The project proponent shall comply with the standard operating procedures and upgradation of suction and treatment arrangement for the secondary emissions as prescribed by the State Pollution Control Board or by CPCB/MoEF&CC.
- vii. Whole of the vehicle movement area as well as the approach road to the gate /weighing bridge shall be paved with pucca/metalled / cement concrete road to control the dust emissions expected from the vehicle movement.

- viii. The vehicles to be used for loading/unloading purposes shall not be parked along the roadside so as to avoid the traffic congestion and dedicated parking place to be provided for the same.
- ix. The project proponent shall adopt green technologies to conserve the water and energy including shearing/cutting / bundling machines. Also, to provide abrasive resistant fire bricks in the crucibles to reduce the periodic maintenance & disposal of discarded fire bricks.
- x. The project proponent shall use natural gas (if available) as substitute fuel wherever possible in the existing industry/ for the expansion project.
- xi. The project proponent shall take necessary action w.r.t. the following:
  - a) Recovery of iron from slag before disposing of it.
  - b) Identify the areas for utilization of slag in a scientific manner and its usage in cement/construction industry/road laying etc.
  - c) Recovery of precious metals like Zinc, lead, and iron, etc. from the APCD dust (Hazardous waste) through authorized re-processor.
- xii. The project proponent shall install the pulse jet bag filter APCD with offline cleaning technology with the proposed induction furnace.
- xiii. The project proponent shall not abstract the groundwater from the existing borewell for proposed/expansion industrial use. Till the grant of NOC, the industry will use treated water of STP of MC Mandi Gobindgarh or STP of nearby industries for industrial purposes.

#### Conditions to be amended in the Annexure-II as under: -

# Condition no. viii) of III. Water quality monitoring and preservation

viii. The project proponent shall adopt a pond located in the Village Jalalpur for practicing rainwater harvesting after desilting @ 36817 m3/annum. As an additional safety measure, the stream carrying wastewater of the village shall be diverted in one corner of Phytorid plants trench (designed based on the technology developed by CSIR-NEERI's) divided in different parts, the overflow of each chamber shall be allowed to enter into another chamber which will ultimately lead to the purification of water and collected into a pond to avoid any contamination of groundwater aquifer. Pond water will percolate through natural strata (without injection) to augment the groundwater and remaining water shall be used for irrigation purposes by pumping method in the nearby fields.

# Condition no. i) & iv) of X Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least a minimum amount of Rs. 8,00,000/- towards following CER activities in Pujya Shri Gian Muni Jain Public School, Shanti Nagar, Mandi Gobindgarh: -

S.	Activity	Environment	Cost	Time	eline
No.		Aspect	(Rs. Lac)	Start	End
1.	Science Lab	Infrastructure	2.0	June 2020	Dec. 2020
2.	Separate toilet for boys & girls	Water hygiene & sanitation	2.0	June 2021	July 2021
3.	Ramp for Access to 1 <sup>st</sup> Floor	Infrastructure	2.5	Dec. 2021	June 2022
4.	Green board for classes	Infrastructure	0.5	As per Need	
5.	Air conditioner for Science lab and furniture	Infrastructure	1.0	As per Need	

However, CER activities shall strictly be in accordance with the activities listed out in the OM dated 01.05.2018 and as per the proposal submitted by the project proponent. The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project.

iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate accounts and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of as proposed i.e. Rs 116.0 Lacs towards the capital cost and Rs 10.0 Lacs/annum towards recurring cost including the environmental monitoring cost for the implementation of EMP. The entire cost of the environmental management plan will continue to be borne by the project proponent. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Sushil Kumar Mittal, Partner of the company.
- ii) Sh. Sital Singh, EIA coordinator from M/s CPTL

Environmental Consultant of the project proponent presented the salient features of the project which was taken on record. During the meeting, the following observations were made to which project proponent replied as under:

Sr. No	Observations	Reply
1.	What is the distance of the project site from the Wildlife Sanctuary?	The distance of the project site is more than 15 km from the Wildlife Sanctuary.
2.	Whether Forest Clearance has been obtained.	Yes, the project land is industrial & no forest land is involved. However, the necessary fee has been deposited with the forest department for diversion of 0.006704 ha of forest land for approach road and "In principle" approval obtained from State Govt. vide letter No. FCA/1980/PBIP/57/2019/PB-02/2457-62 dated 14.10.2019 under Para 4.7 of FCA Guidelines dated 28.03.2019.
3.	Whether 33% Green area as per the MoEF norms has been provided.	
4.	What are the activities proposed in the CER plan?	The activities have been proposed under CER plan such as Science Lab, Separate toilet for boys & girls, Ramp for access to 1 <sup>st</sup> Floor, Green board for classes, Air conditioner for science lab, and furniture. An amount of Rs. 8,00,000 will be spent on aforesaid activities.

During discussions, Environmental consultant of the promoter company agreed to comply with the conditions proposed by SEAC except the environmental conditions imposed at Sr. No. (i), (iii), (vi), of III. of Water Quality Monitoring and Preservation, (i), (iii) of V of Energy Conservation Measures, as these do not apply to the project due to the fact that no industrial effluent will be generated. He requested to delete the said conditions, which are given below: -

#### Conditions to be deleted as under:

# Condition no. i), iii) and vi) of III. Water Quality monitoring and preservation

i) The project proponent shall install 24x7 continuous effluent monitoring system with respect to standards prescribed in Environment (Protection) Rules 1986 vide G.S.R 277 (E) dated 3151 March 2012 (applicable to IF/EAF) as amended from time to time; S.O. 3305 (E) dated 7<sup>th</sup> December 2015 (Thermal Power Plants) as amended from time to time) and connected to SPCB and CPCB online servers and calibrate these

system from time to time according to equipment supplier specification through labs recognized under Environment (Protection) Act, 1986 or NABL accredited laboratories. (case to case basis small plants: Manual; Large plants: Continuous)

- iii) The project proponent shall submit a monthly summary report of continuous effluent monitoring and results of manual effluent testing and manual monitoring of groundwater quality to the Regional Office of MoEF&CC, Zonal office of CPCB, and Regional Office of SPCB along with six-monthly monitoring report.
- vi) The project proponent shall provide the ETP for effluents of rolling mills to meet the standards prescribed in G.S.R 277 (E) 31<sup>st</sup> March 2012 (applicable to IF/EAF) as amended from time to time.

# Condition no. i) and iii) of Energy Conservation measures

- i) The project proponent shall provide a waste heat recovery system (pre-heating of combustion air) at the flue gases of reheating furnaces.
- ii) The project proponent shall ensure the installation of regenerative type burners on all reheating furnaces.

SEIAA perused the said conditions and accepted the request of the project proponent. The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for expansion of its existing unit located in the revenue estate of village Tooran, Amloh Road Mandi Gobindgarh, Distt. Fatehgarh Sahib, Punjab as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant, proposed measures and with the following conditions as recommended by SEAC & certain amendments therein & agreed by the Project proponent:

# I. Statutory compliance:

- i. The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.
- ii. The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.
- iii. The project proponent shall prepare a Site-Specific Conservation Plan & Wildlife Management Plan and approved by the Chief Wildlife Warden. The recommendations of the approved Site-Specific Conservation Plan / Wildlife Management Plan shall be

- implemented in consultation with the State Forest Department. The implementation report shall be furnished along with the six-monthly compliance report. (in case of the presence of schedule-I species in the study area)
- iv. The project proponent shall obtain Consent to Establish/ Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the concerned Punjab Pollution Control Board.
- v. The project proponent shall obtain the necessary permission from the Central Groundwater Authority/ competent authority concerned, in case of drawl of groundwater and also in case of drawl of surface water required for the project. In case of non- grant of permission by CGWA for groundwater abstraction, the industry shall make alternative arrangements by using surface water or treated city sewage effluent after obtaining permission from competent authority.
- vi. The project proponent shall obtain authorization under the Hazardous and other Waste Management Rules, 2016 as amended from time to time.
- vii. The project proponent shall comply with the siting criteria, standard operating practices, code of practice and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of units.
- viii. The project proponent shall comply with the CLU conditions imposed by competent authority, if any

# II. Air quality monitoring and preservation

- i. The project proponent shall install 24x7 continuous emission monitoring system at process stacks to monitor stack emission with respect to standards prescribed in Environment (Protection) Rules 1986 vide G.S.R 277 (E) dated 31st March 2012 (applicable to IF/EAF) as amended from time to time; S.O. 3305 (E) dated 7th December 2015 (Thermal Power Plants) as amended from time to time) and connected to SPCB and CPCB online servers and calibrate these systems from time to time according to equipment supplier specification through labs recognized under Environment (Protection) Act, 1986 or NABL accredited laboratories.
- ii. The project proponent shall monitor fugitive emissions in the plant premises at least once in every quarter through laboratories recognized under Environment (Protection) Act, 1986 or NABL accredited laboratories.
- iii. The project proponent shall install a Manual system to carryout Continuous Ambient Air Quality monitoring for common/criterion parameters relevant to the main pollutants released (e.g.  $PM_{10}$  and  $PM_{2.5}$ in reference to PM emission, and  $SO_2$  and NOx in reference to SOx and NOx emissions) within and outside the plant area (at least at four locations one within and three outside the plant area at an angle of  $120^{\circ}$  each), covering upwind and downwind directions.
- iv. The project proponent shall submit a monthly summary report of continuous stack emission and air quality monitoring and results of manual stack monitoring and

manual monitoring of air quality/ fugitive emissions to the Regional Office of MoEF&CC, Zonal office of CPCB and Regional Office of SPCB along with six-monthly monitoring report.

- v. Appropriate Air Pollution Control (APC) system shall be provided for all the dustgenerating points including fugitive dust from all vulnerable sources.
- vi. The project proponent shall provide leakage detection and mechanized bag cleaning facilities for better maintenance of bags.
- vii. Sufficient number of mobile or stationary vacuum cleaners shall be provided to clean plant roads, shop floors, roofs, etc. regularly.
- viii. Recycle and reuse of iron ore fines, coal and coke fines, lime fines and such other fines collected in the pollution control devices and vacuum cleaning devices in the process after briquetting/ agglomeration should be ensured.
- ix. The project proponent shall use leak-proof trucks/dumpers carrying coal and other raw materials and cover them with tarpaulin.
- x. The project proponent shall provide covered sheds for raw materials like scrap and sponge iron, lump ore, coke, coal, etc.
- xi. The project proponent shall provide primary and secondary fume extraction system at all melting furnaces.
- xii. Design and implementation of the ventilation system for adequate air changes as per ACGIH document for all tunnels, motor houses, Oil Cellars should be ensured.

# III. Water quality monitoring and preservation

- i. The project proponent shall monitor regularly groundwater quality at least twice a year (pre and post-monsoon) at sufficient numbers of piezometers/sampling wells in the plant and adjacent areas through labs recognized under Environment (Protection) Act, 1986 and NABL accredited laboratories.
- ii. The project proponent shall adhere to 'Zero Liquid Discharge'.
- iii. Sewage Treatment Plant shall be provided for the treatment of domestic wastewater to meet the prescribed standards.
- iv. Garland drains and collection pits shall be provided for each stock pile to arrest the run-off in the event of heavy rains and to check the water pollution due to surface run off
- v. The project proponent shall adopt a pond located in the Village Jalalpur for practicing rainwater harvesting after desilting @ 36817 m3/annum. As an additional safety measure, the stream carrying wastewater of the village shall be diverted in one corner of Phytorid plants trench (designed based on the technology developed by CSIR-NEERI's) divided in different parts, the overflow of each chamber shall be allowed to enter into another chamber which will ultimately lead to the purification of water and

collected into a pond to avoid any contamination of groundwater aquifer. Pond water will percolate through natural strata (without injection) to augment the groundwater and remaining water shall be used for irrigation purposes by pumping method in the nearby fields.

vi. The project proponent shall make efforts to minimize water consumption in the steel plant complex by segregation of used water, practicing cascade use, and by recycling treated water.

# IV. Noise monitoring and prevention

- Noise level survey shall be carried as per the prescribed guidelines and the report in this regard shall be submitted to the Regional Officer of the Ministry as a part of a sixmonthly compliance report.
- ii. The ambient noise levels should conform to the standards prescribed under E(P)A Rules, 1986 viz. 75 dB(A) during day time and 70 dB(A) during night time.

#### V. Energy Conservation measures

- i. The project proponent shall practice hot charging of slabs and billets/blooms as far as possible.
- ii. The project proponent shall provide solar power generation on rooftops of buildings, solar light systems for all common areas, street lights, parking around the project area and maintain the same regularly.
- iii. The project proponent shall provide the for LED lights in their offices and residential areas.

#### VI. Waste management

- i. Used refractories shall be recycled as far as possible.
- ii. 100% utilization of fly ash shall be ensured. All the fly ash shall be provided to cement and brick manufacturers for further utilization and Memorandum of Understanding in this regard shall be submitted to the Ministry's Regional Office.
- iii. The waste oil, grease, and other hazardous waste shall be disposed of as per the Hazardous & Other waste (Management & Transboundary Movement) Rules, 2016.
- iv. Kitchen waste shall be composted or converted to biogas for further use. (to be decided on a case to case basis depending on type and size of plant)

#### VII. Green Belt

i) Green belt shall be developed in an area equal to at least 33% of the plant area with native tree species in accordance with CPCB guidelines. The greenbelt shall inter alia cover the entire periphery of the plant. The industry shall ensure that most of the

periphery shall be provided with green belt by removing the unwanted/non-productive structures already provided in the existing project near the boundary wall.

# VIII. Public hearing and Human health issues

- i. Emergency preparedness plan based on the Hazard identification and Risk Assessment (HIRA) and Disaster Management Plan shall be implemented.
- ii. The project proponent shall carry out heat stress analysis for the workmen who work in high-temperature work zone and provide Personal Protection Equipment (PPE) as per the norms of Factory Act.
- iii. Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.
- iv. Occupational health surveillance of the workers shall be done on a regular basis and records maintained as per the Factories Act.
- v. The project proponent shall carry out the activities apart from CER activities and spent an amount as committed during the Public Hearing as Public Hearing Action Plan as under:
  - a) Local person as per the qualification to be employed in the expansion project.
  - b) Construction of boundary wall of the temple located in Village Alipur @ Rs.50,000/-.
  - c) Providing medicines in dispensary free of cost to their village @ Rs.50,000/-

# IX. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least minimum amount of Rs. 8,00,000/- towards following CER activities in Pujya Shri Gian Muni Jain Public School, Shanti Nagar, Mandi Gobindgarh: -

S.	Activity Environment		Cost	Timeline		
No.		Aspect	(Rs. Lac)	Start	End	
1.	Science Lab	Infrastructure	2.0	June 2020	Dec. 2020	

2.	Separate toilet for boys & girls	Water hygiene & sanitation	2.0	June 2021	July 2021
3.	Ramp for Access to 1st Floor	Infrastructure	2.5	Dec. 2021	June 2022
4.	Green board for classes	Infrastructure	0.5	As per Need	Dec. 2020
5.	Air conditioner for Science lab and furniture	Infrastructure	1.0	As per Need	Dec. 2020

However, CER activities shall strictly be in accordance with the activities listed out in the OM dated 01.05.2018 and as per the proposal submitted by the project proponent. The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project.

- ii. The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions to all / or shareholders / stake holders. A copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of the six-monthly report.
- iii. A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- iv. Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate accounts and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of as proposed i.e. Rs 116.0 Lacs towards the capital cost and Rs 10.0 Lacs/annum towards recurring cost including the environmental monitoring cost for the implementation of EMP. The entire cost of the environmental management plan will continue to be borne by the project proponent. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

- v. Self-environmental audit shall be conducted annually. Every three years third party environmental audit shall be carried out.
- vi. All the recommendations made in the Charter on Corporate Responsibility for Environment Protection (CREP) for the plants shall be implemented.

# XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier

#### XII. Miscellaneous

- i. The project proponent shall make public the environmental clearance granted for their project along with the environmental conditions and safeguards at their cost by prominently advertising it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days and in addition, this shall also be displayed in the project proponent's website permanently.
- ii. The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- iii. The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including the results of monitored data on their website and update the same on a half-yearly basis.
- iv. The project proponent shall monitor the criteria pollutants level namely; PM10, S02, NOx (ambient levels as well as stack emissions) or critical sectoral parameters, indicated for the projects and display the same at a convenient location for disclosure to the public and put on the website of the company.
- v. The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the Ministry of Environment, Forest and Climate Change at environment clearance portal.
- vi. The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- vii. The project proponent shall inform the Regional Office of the Ministry and PPCB, the date of financial closure and final approval of the project by the concerned authorities, commencing the land development work and start of production operation by the project.

- viii. The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.
- ix. The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- x. No further expansion or modifications in the plant shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).
- xi. Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xii. The SEIAA/Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xiii. The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xiv. The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data / information/monitoring reports.
- xv. The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvi. Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

#### **Additional Condition: -**

i) The project proponent shall install Side Suction Hood followed by Pulse jet Bag filter with offline cleaning technology as APCD as per the amount indicated in the revised Environment Management Plan.

- ii) The project proponent shall install 24x7 continuous online SPM monitoring system at the inlet & outlet of APCD to monitor and achieve the suspended particulate matter (SPM) emission standards as prescribed by CPCB/SPCBThe project proponent shall minimize the water consumption in the steel plant complex by segregation of used water, practicing cascade use and by recycling treated water.
- iii) The project proponent shall provide STP for treatment of wastewater & reutilization of the treated water for core/non-core activities so as to achieve the Zero Liquid Discharge Condition as per the III (iv) of OM dated 09/08/2018 issued by the MoEF&CC for such units.
- iv) The project proponent shall reuse of cooling tower blow down, simultaneously ensuring the standards prescribed for such purge waters. If required, necessary arrangements shall be made to keep this waste stream within the parameters required for reuse.
- v) A management plan shall be drawn up and implemented to contain the current exceedance in ambient air quality at the site. Sand, murram, loose soil, cement, stored on site shall be covered adequately and Water sprinkling system be put in place so as to prevent dust pollution.
- vi) The project proponent shall reserve land for loading or unloading of raw material, products, slag, hazardous waste as well as for storage of these materials and the area to be reserved for parking. The area to be reserved by considering the time required for loading and unloading of vehicles for respective activities and minimum/maximum period for which storage of the above material is required in the premises. The areas for the respective activities to be marked on the layout plan.
- vii) The project proponent shall comply with the standard operating procedures and upgradation of suction and treatment arrangement for the secondary emissions as prescribed by the State Pollution Control Board or by CPCB/MoEF&CC.
- viii) Whole of the vehicle movement area as well as approach road to the gate /weighing bridge shall be paved with pucca / metalled / cement concrete road to control the dust emissions expected from the vehicle movement.
- ix) The vehicles to be used for loading / unloading purpose shall not be parked along roadside so as to avoid the traffic congestion and dedicated parking place to be provided for the same.
- x) The project proponent shall adopt green technologies to conserve the water and energy including shearing / cutting / bundling machines. Also, to provide abrasive resistant fire bricks in the crucibles to reduce the periodic maintenance & disposal of discarded fire bricks.
- xi) The project proponent shall use natural gas (if available) as substitute fuel wherever possible in the existing industry/ for expansion project.
- xii) The project proponent shall take necessary action w.r.t. the following:
  - a) Recovery of iron from slag before disposing it off.

- b) Identify the areas for utilization of slag in scientific manner and its usage in cement / construction industry / road laying etc.
- c) Recovery of precious metals like Zinc, lead and iron etc. from the APCD dust (Hazardous waste) through authorized re-processor.
- xiii) The project proponent shall not abstract the groundwater from the existing borewell for proposed/expansion industrial use. Till the grant of NOC, the industry will use treated water of STP of MC Mandi Gobindgarh or STP of nearby industries for industrial purposes.

Item No. 164.08 Application for Environmental Clearance under EIA notification dated 14.09.2006 for the establishment of Group Housing Project Aura Gazania located at Village Nabha, Zirakpur by M/s Aura Buildtech Pvt. Ltd. (SIA/PB/MIS/1 27933/2019).

SEIAA observed as under:

# 1.0 Background

The project proponent has filed an application for obtaining Environment Clearance under EIA notification, 2006 for the establishment of Group Housing Project Aura Gazania located at Village Nabha, Zirakpur.

# 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020. SEAC observed that the Environmental Engineer, PPCB, Nodal Office, Mohali vide letter no 977 dated 07.02.2020 had intimated that no construction work has been started by the promoter company. Also, the site of the project was conforming to the siting guidelines laid down by the Govt. of Punjab, Department of Science Technology and Environment vide order dated 25/07/2008 as amended on 30/ 10/2009.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under: -

S.No.	Item	Details					
1.	Online Proposal No.	SIA	/PB/MIS/12	7933/2019			
2.	Name and Location of the	Α	ura Gazania	located at Village	Nabha, Zirakpur by		
	project	M	l/s Aura Bui	ldtech Pvt Ltd.			
3.	Latitude & Longitude	Cor	ners coordi	nates:			
			Corner	Latitude	Longitude		
			Corner-A	30°38'35.60"N	76°48'03.53"E		
			Corner-B	30°38'37.58"N	76°48'10.07"E		
			Corner-C	30°38'35.23"N	76°48'09.88"E		
			Corner-D	30°38'37.38"N	76°48'03.60"E		
4.	Project/activity covered under item of scheduled to the EIA Notification, 14.09.2006	Sı	r No. 8(a) `E	Building & Constru	ction Project'		
5.	Whether the project is in critical polluted area or not.	١	No				
6.	Does the project involve diversion of forest land? If yes,	١	lo				

	a. Exter	nt of the forest	land.					
	b. Statu	s of the forest						
	clearan	ce.						
7.	Does th	e project cove 900	r under	No				
8.	Does th	ne project fall	within 10	No				
	km of	eco-sensitiv	/e area/	1				
	Nationa	l park/Wil	d Life					
	Sanctua	ry?						
9.	Classific	cation/Land use	e pattern	Residen	tial			
	as per N	Master Plan						
10.		the project		Rs. 35 (	Crores			
11.		ot area, Built-	up Area	S.No.	Descr	iption	Ar	ea
	and Gre	ind Green		1.	Plot a		88	74 sqm
	area				`	scheme area)		
			2.		ıp area		542 m <sup>2</sup>	
				3.	Green			08 m <sup>2</sup>
12	Detail o	f EC fee				DD No 030167		
				<u> </u>		DD No. 030180	date	ed 27.11.19
13.	Populat			700 Perso	ons.			
		ully operation						
14.		•						ater requirement
	in Const	truction Phase		-	rovided	by treated wa	iter	from STP of MC
1 -		<u> </u>		Zirakpur.				
15.		·	<u> </u>	ts & sourc	e in Op	peration Phase		
	<u> </u>	er, Rainy, Wint			T			
	S.	Season		water		Reuse water		Total
	No.			estic		Flushing		(KLD)
		<u>-</u>	•	LD)		(KLD)		
				lpcd		@45 lpcd		@135 lpcd
	1.	Summer		53		32		95
	2.	Winter		53		32		95
	3.	Rainy		53		32		95
	Green Ar	rea requiremer	it					
	S.No.	Season	Basis	}		Green Area	Tre	eated
							wa	stewater
							rec	quirement
			ltr/sq	ım/day		(sqm)	KL	D
	1.	Summer	5.5	,		( )		.4 ≈10
			3.3					

	2.	Winter	1.8	ltr/sqm/da	у	1908	3	.4≈ 3.	0		
	3	Rainy	0 It	r/sqm/day		1908	0				
		<u> </u>				<u>l</u>	<b>I</b>				
	S.No.	Description			Sourc	ce of wate	er				
	1.	Domestic			Bore	well					
	2.	Flushing purpo	ses			ted waster					
	3	Green Area		1	Treated wastewater						
16.		nt & Disposal		Wastewate	_	-	-				
		nents of wastewa ruction Phase	iter	septic tank			stewater	WIII D	e used for		
	in Consu	uction Phase		plantation	purpose	25.					
	Handling	of waste materia	al	Earth soil	shall be	e stacked	and re u	ised fo	or filling low-		
		onstruction phase		lying area	s. Brick	& other	solid was	ste ger	nerated		
				_	during construction period shall be further reused in						
				pavement	: & road	ds.					
17.	Disposal	Arrangement of		Total was	towato	r gonorati	on will b	o 76 K	I D which will		
17.		ater in Operation		Total wastewater generation will be 76 KLD which will be treated in proposed STP of 115 KLD capacity to be							
	Phase	iter in Operation			_	-			use of treated		
	1 11000					discharge	-				
					vater is given as under: -						
				Season	F	lushing	Green		Sewer		
					(	KLD)	area		(KLD)		
							1908 9	•			
						<u> </u>	(KLD)	)	2.4		
				Summe		32	10 3		34		
				Winter Monsoo		32 32	0		41 44		
18.	Daipwate	or rocharging				water will		ctod in			
10.	Detail	er recharging		-		rging pits.		cteu ii	1 / 110. 01		
19.		ste generation ar	nd	a)280 kg/		ging picsi					
	its Dispo	•	-	, ,,	,	vill be app	ropriatel	ly segr	egated (at		
				-		ing bins) i	-		•		
				degradab	le Com	ponents a	nd non-b	oiodeg	radable.		
				c) Bio-degradable will be Converted into Manure					Manure		
				through mechanical composter.							
				_	iodegradable or dry waste will be handed						
				over to au	ıthorize	ed waste p	ickers.				

20.	Green Be	lt Development Plan	Tota	l 130 no. (	of trees	will be planted	d against the
		no. of trees to be				•	e @ 80 sqm of
	planted 8	k its species.	-	area of 8		•	
		•	(To	a query of	SEAC, t	the project pro	ponent submitted
			-		-		ils of the trees to
				lanted ins		_	
21.	Hazardou	ıs Waste &E- Waste	Use	d oil from	DG sets	will be sold to	registered
							ed of as per the
			E-wa	aste (Mana	agement	t) Amendment	Rules 2018.
22.	Energy R	equirements		00 KW fro			
	& Saving		b) 2	DG set of	capacit	y 240 KVA & 1	. No 125 KVA
			сара	acity (silen	t DG set	t)	
			<u>Ene</u>	rgy Saving	measui	res:	
			i)	Solar Lig	ht 10 N	o = 15 KWH	ID
			ii)	Commor	area (2	250)	
			lig	hts replac	ed with	LED= 135 KW	/HD
			iii)	Total En	ergy sav	/ed/day	
			15	+135= 15	0 KWHI	)	
23.	Environm	ent Management	Des	cription	Capital	Recurring	Monitoring of
	Plan alon	g with Budgetary	cost		cost	cost	Air, Noise,
		phase-wise and			(lakhs)	(lakhs)	water (per
	responsib	pility to implement					annum) Rs.
			Con	struction	63.5	5.5	5.90
			Ope	ration	-	9.5	6.90
24.	CER activ	rities along with budg	etary	break-up	and res	ponsibility to i	mplement
	Director	of the company will	be re	sponsible	for impl	ementation of	CER (Corporate
	Environm	ent Responsibility). 1	The es	stimated c	ost of th	ne project is R	s. 35 Crores and
	Rs 21 lak	hs has been proposed	l unde	er C.E.R ac	tivities a	as per Office M	emorandum vide
	F. No. 22	2-65/ 2017-IA.III dat	ed 0:	1.05.2018,	which	will be spent	on the following
	activities:						
	S.No.	CER Activities		Fund		Time schedu	le
				allocate	d	Start	Completed
				(Lakhs)			
	1.	Government Mode		21		01/12/2020	31/12/2022
		school at village					
		Chaharmajra.					

#### 3.0 Recommendations

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations to grant Environmental Clearance for the establishment of the project namely "Aura Gazania" having built-up area of 30542 sqm in total land area of 8874 sqm located at village Nabha, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures, conditions prescribed in **Annexure-I** of the proceedings subject to following additions, amendments and deletions given as under:

#### Conditions to be added in the Annexure-I as under: -

i) The project proponent shall plant 130 no. of trees of native varieties within the project as per the guidelines of MoEF/SEIAA.

#### Conditions to be amended in the Annexure-I as under: -

# Condition no. iv), v-a) &xv) of III. Water quality monitoring and preservation

- iv) The total domestic water requirement for the project will be 95 KLD, out of which 63 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 76 KLD, which will be treated in STP of capacity @ 115 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr. No.	Season	For Flushing purposes (KLD)	Green Area (KLD)	Into Sewer* (KLD)
1.	Summer	32	10	34
2.	Winter	32	3	41
3.	Rainy	32	0	44

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 7 nos of rainwater harvesting recharge pits shall be provided for groundwater recharging as per CGWA norms. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

## Condition no. i) & iv) of X of Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least minimum amount of Rs. 21,00,000/- towards following activities:

S.No.	CER Activities	Fund	Time schedule		
		allocated	Start	Completed	
		(Lakhs)			
1.	Government Model school at village Chaharmajra.	21	01/12/2020	31/12/2022	

Action plan for implementing EMP and environmental conditions along with the iv) responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 63.5 Lacs towards the capital cost and Rs 12.40 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 16.40 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents' society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

## 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Amrinder Singh Sodhi, Director of the company.
- ii) Sh. Deepak Gupta, Environmental Advisor of the project proponent
- iii) Sh. Sital Singh, EIA Coordinator, M/s Chandigarh Pollution Testing Laboratory, Phase VII, Industrial Area, Mohali.

Environmental Consultant of the project proponent presented the salient features of the project which was taken on record. During the meeting, the following observations were made to which project proponent replied as under:

Sr. No		Observations		Reply	
1.		the distance of the site from na Wildlife Sanctuary?		from the S s about 11 kn	Sukhna Wildlife n.
2.	Whether Authorit obtained	,		N/ATS (5	vide no. WAC/S 7/19) dated
3.	What i applicati	s the status of CGWA on?	to the (	had already CGWA for of Groundwa	•
4.		nute system should be	The project same.	t proponent	agreed to the
5.	submit	ect proponent is required to revised CER plan properly ing all the activities to be but.	same and	submitted th	agreed to the ne detailed CER
	S.No.	CER Activities	Fund	Time schedu	ıle
			allocated (Lakhs)	Start	Completed
	1.	Furniture, Lab equipment and books for library in Government Model school at village Chaharmajra.	21	01/12/2020	31/12/2022

During discussions, representative of the promoter company agreed to comply with fully all the conditions as mentioned by SEAC.

The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for the establishment of the project namely "Aura Gazania" having built-up area of 30542 sqm in total land area of 8874 sqm located at village Nabha, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures and with following conditions as recommended by SEAC & certain amendments therein & agreed by the Project Proponent:

## I. Statutory compliance:

- i) The project proponent shall obtain all necessary clearances/ permissions from all relevant agencies including town planning authority before commencement of work. All the construction shall be done in accordance with the local building byelaws.
- ii) The approval of the Competent Authority shall be obtained for the structural safety of buildings due to earthquakes, adequacy of firefighting equipment etc as per National Building Code including protection measures from lightening etc.
- iii) The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.
- iv) The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.
- v) The project proponent shall obtain Consent to Establish / Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the Punjab Pollution Control Board.
- vi) The project proponent shall obtain the necessary permission for drawl of groundwater/ surface water required for the project from the competent authority.
- vii) A certificate of adequacy of available power from the agency supplying power to the project along with the load allowed for the project should be obtained.
- viii) All other statutory clearances such as the approvals for storage of diesel from Chief Controller of Explosives, Fire Department, Civil Aviation Department shall be obtained, as applicable, by project proponents from the respective competent authorities.
- ix) The provisions of the Solid Waste (Management) Rules, 2016, E-Waste (Management) Rules, 2016, Construction & Demolition Waste Rules, 2016 and the Plastics Waste (Management) Rules, 2016 shall be followed.
- x) The project proponent shall follow the ECBC/ECBC-R prescribed by the Bureau of Energy Efficiency, Ministry of Power strictly.
- xi) The project site shall conform to the suitability as prescribed under the provisions laid down under the master plan of respective city/ town. For that, the project proponent shall either submit the NOC/ land use conformity certificate from Deptt of Town and Country Planning or other concerned Authority under whose jurisdiction, the site falls.
- xii) Besides above, the project proponent shall also comply with siting criteria / guidelines, standard operating practices, code of practice and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of projects.

xiii) The project proponent shall get the layout plans approved from the Competent Authority for the activities/establishments to be set up at the project site in consonance with the project proposal for which this environment clearance is applied.

## II. Air quality monitoring and preservation

- i) Notification GSR 94(E) dated 25.01.2018 of MoEF&CC regarding Mandatory Implementation of Dust Mitigation Measures for Construction and Demolition Activities for projects requiring Environmental Clearance shall be complied with.
- ii) A management plan shall be drawn up and implemented to contain the current exceedance in ambient air quality at the site.
- iii) The project proponent shall install a system to carryout Ambient Air Quality monitoring for common /criterion parameters relevant-to the main pollutants released (e.g. PM10 and PM2.5) covering upwind and downwind directions during the construction period.
- iv) Diesel power generating sets proposed as source of backup power should be of enclosed type and conform to rules made under the Environment (Protection) Act, 1986. The height of stack of DG sets should be equal to the height needed for the combined capacity of all proposed DG sets. Use of low sulphur diesel should be ensured. The location of the DG sets may be decided in consultation with Punjab Pollution Control Board.
- v) Construction site shall be adequately barricaded before the construction begins. Dust, smoke & other air pollution prevention measures shall be provided for the building as well as the site. These measures shall include screens for the building under construction, continuous dust/ wind breaking walls all around the site (at least 3m height or 1/3rd of the building height and maximum upto 10m). Plastic/tarpaulin sheet covers shall be provided for vehicles bringing in sand, cement, murram, and other construction materials prone to causing dust pollution at the site as well as taking out debris from the site.
- vi) No Excavation of soil shall be carried out without adequate dust mitigation measures in place.
- vii) No loose soil or sand or construction & demolition waste or any other construction material that causes dust shall be left uncovered.
- viii) No uncovered vehicles carrying construction material and waste shall be permitted
- ix) All the topsoil excavated during construction activities should be stored for use in horticulture / landscape development within the project site.
- x) Grinding and Cutting of building material in open area shall be prohibited. Wet jet shall be provided for grinding and stone cutting.
- xi) Unpaved surfaces and loose soil shall be adequately sprinkled with water to suppress dust.

- xii) All construction and demolition debris shall be stored at the site within earmarked area and road side storage of construction material and waste shall be prohibited. All demolition and construction waste shall be managed as per the provisions of the Construction and Demolition Waste Rules 2016.
- xiii) The diesel generator sets to be used during construction phase shall be low sulphur diesel type and shall conform to the standards as enumerated in the Environmental (Protection) Rules, 1986 as prescribed for air and noise emission.
- xiv) The gaseous emissions from DG set shall be dispersed through adequate stack height as per CPCB standards. Acoustic enclosure shall be provided to the DG sets to mitigate the noise pollution. Low sulphur diesel shall be used. The location of the DG set and exhaust pipe height shall be as per the provisions of the Central Pollution Control Board (CPCB) norms.
- xv) For indoor air quality the ventilation provisions as per National Building Code of India shall be followed.
- xvi) Roads leading to or at construction site must be paved and blacktopped (i.e. metallic road)
- xvii) Dust Mitigation measures shall be displayed prominently at the construction site for easy public viewing.
- xviii) Construction and Demolition Waste Processing and Disposal site shall be identified and required dust mitigation measure be notified at the site.

# III. Water quality monitoring and preservation

- The natural drain system should be maintained for ensuring unrestricted flow of water.
- ii) No construction shall be allowed to obstruct the natural drainage through the site, on wetland and water bodies. Check dams, bio-swales, landscape, and other sustainable urban drainage systems (SUDS) are allowed for maintaining the drainage pattern and to harvest rain water.
- iii) Buildings shall be designed to follow the natural topography as much as possible. Minimum cutting and filling should be done.
- iv) The total domestic water requirement for the project will be 95 KLD, out of which 63 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 76 KLD, which will be treated in STP of capacity @ 115 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)	(KLD)	(KLD)
1.	Summer	32	10	34
2.	Winter	32	3	41
3.	Rainy	32	0	44

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

- b) Storage tank of adequate capacity shall be provided for the storage of treated wastewater and all efforts shall be made to supply the same for construction purposes.
- c) During construction phase, the project proponent shall ensure that the wastewater being generated from the labour quarters/toilets shall be treated and disposed in environment friendly manner. The project proponent shall also exercise the option of modular bio-toilets or will provide proper and adequately designed septic tanks for the treatment of such wastewater and treated effluents shall be utilized for green area/plantation
- vi) The project proponent shall ensure safe drinking water supply to the habitants. Adequate treatment facility for drinking water shall be provided, if required.
- vii) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- viii) A certificate shall be obtained from the local body supplying water, specifying the total annual water availability with the local authority, the quantity of water already committed, the quantity of water allotted to the project under consideration and the balance water available. This should be specified separately for groundwater and surface water sources, ensuring that there is no impact on other users.
- ix) At least 20% of the open spaces as required by the local building bye-Jaws shall be pervious. Use of Grass pavers, paver blocks with at least 50% opening, landscape etc. would be considered as pervious surface.
- x) Installation of dual pipe plumbing for supplying freshwater for drinking, cooking and bathing etc and other for supply of recycled water for flushing, landscape irrigation, car washing, thermal cooling, conditioning etc. shall be done.
- xi) The respective project proponent shall discourage the installation of R.O. plants in their projects in order to save the wastage in form of RO reject. However, in case the requirement of installing RO plant is utmost necessary then the rejected stream from the RO shall be separated and shall be utilized by storing the same

- within the particular component i.e. (Tower/Mall) or in a common place in the project premises.
- xii) The project proponent shall also adopt the new/innovating technologies like less water discharging taps (faucet with aerators)/urinals with electronic sensor system /water less urinals / twin flush cisterns/ sensor based alarming system for overhead water storage tanks and make it a part of the environmental management plans / building plans so as to reduce the water consumption/groundwater abstraction in their Building Construction & Industrial projects.
- xiii) The project proponent will provide plumbing system for reuse of treated wastewater for flushing/ HVAC/ other purposes etc. and colour coding of different pipe lines carrying water/wastewater from different sources / treated wastewater as follows:

Sr. No	Nature of the Stream	Colour code
a)	Fresh water	Blue
b)	Untreated wastewater from Toilets/ urinal & from Kitchen	Black
c)	Untreated wastewater from Bathing/shower area, hand washing (Washbasin / sinks) and from Cloth Washing	Grey
d)	Reject water streams from RO plants & AC condensate (this is to be implemented wherever centralized AC system and common RO has been proposed in the Project). Further, in case of individual houses/establishment this proposal may also be implemented wherever possible.	White
e)	Treated wastewater (for reuse only for plantation purposes) from the STP treating black water	Green
f)	Treated wastewater (for reuse for flushing purposes or any other activity except plantation) from the STP treating grey water	Green with strips
g)	Storm water	Orange

- xiv) Water demand during construction should be reduced by use of pre-mixed concrete, curing agents and other best practices referred.
- xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 7 nos of rainwater harvesting recharge pits shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.
- xvi) All recharge should be limited to shallow aguifer.

- xvii) No groundwater shall be used during construction phase of the project. Only treated sewage/wastewater shall be used. A proper record in this regard should be maintained and available at site.
- xviii) Any groundwater dewatering should be properly managed and shall conform to the approvals and the guidelines of the CGWA in the matter. Formal approval shall be taken from the CGWA for any groundwater abstraction or dewatering.
- xix) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- xx) Sewage shall be treated in the STP with tertiary treatment. STP shall be installed in phased manner viz a viz in module system designed in such a way so as to efficiently treat the wastewater with increase in its quantity due to rise in occupancy. The treated effluent from STP shall be recycled/re-used for flushing, AC make up water and gardening. No treated water shall be disposed of into municipal storm water drain.
- xxi) No sewage or untreated effluent water would be discharged through storm water drains. Onsite sewage treatment of capacity of treating 100% wastewater to be installed. The installation of the Sewage Treatment Plant (STP) shall be certified by an independent expert and a report in this regard shall be submitted to the Ministry before the project is commissioned for operation. Treated wastewater shall be reused on site for landscape, flushing, cooling tower, and other end-uses. Excess treated water shall be discharged as per statutory norms notified by Ministry of Environment, Forest and Climate Change. Natural treatment systems shall be promoted.
- xxii) Periodical monitoring of water quality of treated sewage shall be conducted. Necessary measures should be made to mitigate the odour problem from STP.
- xxiii) Sludge from the onsite sewage treatment, including septic tanks, shall be collected, conveyed and disposed of as per the Ministry of Urban Development, Central Public Health and Environmental Engineering Organization (CPHEEO) Manual on Sewerage and Sewage Treatment Systems, 2013.

## IV. Noise monitoring and prevention

- i) Ambient noise levels shall conform to residential area/commercial area/industrial area/silence zone both during day and night as per Noise Pollution (Control and Regulation) Rules, 2000. Incremental pollution loads on the ambient air and noise quality shall be closely monitored during construction phase. Adequate measures shall be made to reduce ambient air and noise level during construction phase, so as to conform to the stipulated standards by CPCB/SPCB.
- ii) Noise level survey shall be carried out as per the prescribed guidelines and report in this regard shall be submitted to Regional Office of the Ministry as a part of sixmonthly compliance report.

iii) Acoustic enclosures for DG sets, noise barriers for ground-run bays, ear plugs for operating personnel shall be provided as mitigation measures for noise impact due to ground sources.

# V. Energy Conservation measures

- i) Compliance with the Punjab Energy Conservation Building Code (PECBC) of Energy Efficiency shall be ensured.
- ii) Outdoor and common area lighting shall be LED.
- iii) Concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc. shall be incorporated in the building design. Wall, window, and roof uvalues shall be as per ECBC specifications.
- iv) Energy conservation measures like installation of LEDs for lighting the area outside the building should be integral part of the project design and should be in place before project commissioning.
- v) Solar, wind or any other Renewable Energy equipment shall be installed to meet electricity generation equivalent to at least 1% of the demand load or as per the state level/ local building bye-laws requirement, whichever is higher.
- vi) Solar power by utilizing at least 30% of the rooftop area shall be used for lighting in the apartment to reduce the power load on grid. Separate electric meter shall be installed for solar power.

## VI. Waste Management

- i) A certificate from the competent authority handling municipal solid wastes, indicating the existing civic capacities of handling and their adequacy to cater to the M.S.W. generated from project shall be obtained.
- ii) Disposal of muck during construction phase shall not create any adverse effect on the neighbouring communities and be disposed of taking the necessary precautions for general safety and health aspects of people, only in approved sites with the approval of competent authority.
- iii) Chute system, separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- iv) Organic waste compost/ Vermiculture pit/ Organic Waste Converter within the premises with a minimum capacity of 0.3 kg /person/day must be installed for treatment and disposal of the waste.
- v) All non-biodegradable waste shall be handed over to authorized recyclers for which a written tie up must be done with the authorized recyclers.
- vi) Any hazardous waste generated during construction phase, shall be disposed of as per applicable rules and norms with necessary approvals of the State Pollution Control Board.

- vii) Use of environment friendly materials in bricks, blocks and other construction materials, shall be required for at least 20% of the construction material quantity. These include Fly Ash bricks, hollow bricks, AACs, Fly Ash Lime Gypsum blocks, Compressed earth blocks, and other environment friendly materials.
- viii) Fly ash should be used as building material in the construction as per the provision of Fly Ash Notification of September, 1999 and amended as on 27th August, 2003 and 25th January, 2016. Ready mixed concrete must be used in building construction.
- ix) Any wastes from construction and demolition activities related thereto shall be managed in such a way so as to strictly conform to the Construction and Demolition Rules, 2016.
- x) Used CFLs and TFLs should be properly collected and disposed off/sent for recycling as per the prevailing guidelines/ rules of the regulatory authority to avoid mercury contamination.

## VII. Green Cover

- i) No tree shall be felled/transplanted unless extreme exigencies demand. Where absolutely necessary, tree felling shall be with prior permission from the concerned regulatory authority. Old trees should be retained based on girth and age regulations as may be prescribed by the Forest Department. Plantations to be ensured species (cut) to species (planted).
- ii) At least single line plantation all around the boundary of the project as proposed shall be provided. The open spaces inside the plot should be suitably landscaped and covered with vegetation of indigenous species/variety. A minimum of one tree for every 80 sqm of total project land should be planted and maintained. The existing trees will be counted for this purpose. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping. The plantation should be provided as per SEIAA guidelines.
- Where the trees need to be cut with prior permission from the concerned local Authority, compensatory plantation in the ratio of 1: 10 (i.e. planting of 10 trees for every 1 tree that is cut) shall be done and maintained. Plantations to be ensured species (cut) to species (planted). Area for green belt development shall be provided as per the details provided in the project document.
- iv) Topsoil should be stripped to a depth of 20 cm from the areas proposed for buildings, roads, paved areas, and external services. It should be stockpiled appropriately in designated areas and reapplied during plantation of the proposed vegetation on site.
- v) The project proponent shall not use any chemical fertilizer /pesticides /insecticides and shall use only Herbal pesticides/insecticides and organic manure in the green area.

vi) The green belt along the periphery of the plot shall achieve attenuation factor conforming to the day and night noise standards prescribed for residential land use.

#### VIII. Transport

- i) A comprehensive mobility plan, as per MoUD best practices guidelines (URDPFI), shall be prepared to include motorized, non-motorized, public, and private networks. Road should be designed with due consideration for environment, and safety of users. The road system can be designed with these basic criteria.
  - a) Hierarchy of roads with proper segregation of vehicular and pedestrian traffic.
  - b) Traffic calming measures.
  - c) Proper design of entry and exit points.
  - d) Parking norms as per local regulation.
- ii) Vehicles hired for bringing construction material to the site should be in good condition and should have a pollution check certificate and should conform to applicable air and noise emission standards and be operated only during non-peak hours.
- iii) A detailed traffic management and traffic decongestion plan shall be drawn up to ensure that the current level of service of the roads within a 05 kms radius of the project is maintained and improved upon after the implementation of the project. This plan should be based on cumulative impact of all development and increased habitation being carried out or proposed to be carried out by the project or other agencies in this 05 Kms radius of the site in different scenarios of space and time and the traffic management plan shall be duly validated and certified by the State Urban Development department and the P.W.D./ competent authority for road augmentation and shall also have their consent to the implementation of components of the plan which involve the participation of these departments.
- iv) Traffic congestion near the entry and exit points from the roads adjoining the proposed project site must be avoided. Parking should be fully internalized and no public space should be utilized.

#### IX. Human health issues

- i) All workers working at the construction site and involved in loading, unloading, carriage of construction material and construction debris or working in any area with dust pollution shall be provided with dust mask.
- ii) For indoor air quality the ventilation provisions as per National Building Code of India shall be strictly followed.
- iii) Emergency preparedness plan based on the Hazard identification and Risk Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets,

mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.

- iv) Occupational health surveillance of the workers shall be done on a regular basis.
- v) A First Aid Room shall be provided in the project both during construction and operations of the project.

## X. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least minimum amount of Rs. 21,00,000/- towards following activities:

S.No.	CER Activities	Fund	Time schedu	le
		allocated	Start	Completed
		(Lakhs)		
1.	Furniture, Lab equipment	21	01/12/2020	31/12/2022
	and books for library in			
	Government Model school			
	at village Chaharmajra.			

- ii) The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions to all shareholders / stake holders. The copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of six-monthly report.
- iii) A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 63.5 Lacs towards the capital cost and Rs 11.40 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management

plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents' society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier.

#### XII. Miscellaneous

- i) The project proponent before allowing any occupancy shall obtain completion and occupancy certificate from the Competent Authority and submit a copy of the same to SEIAA, Punjab.
- ii) The project proponent shall comply with the conditions of CLU.
- iii) The project proponent shall prominently advertise it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days indicating that the project has been accorded environment clearance and the details of MoEF&CC /SEIAA website where it is displayed.
- iv) The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- v) The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.
- vi) The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the Ministry of Environment, Forest and Climate Change at Environment Clearance portal.
- vii) The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii) The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities, commencing the land development work and start of production /operation by the project.
- ix) The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.

- x) The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- xi) No further expansion or modifications in the plant/project shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).
- xii) Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiii) The SEIAA/Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xiv) The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xv) The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data/ information/monitoring reports.
- xvi) The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvii) Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

## **Additional Condition: -**

i) The project proponent shall plant 130 no. of trees of native varieties within the project as per the guidelines of MoEF/SEIAA.

Item No. 164.09 Application for Environmental Clearance under EIA notification dated 14.09.2006 for the establishment of Group Housing Project Maya garden Residency located at Village Gazipur, Zirakpur by M/s ABC Infra (Proposal No. SIA/PB/MIS/131801/2019).

SEIAA observed as under:

# 1.0 Background

The project proponent has filed an application for obtaining Environment Clearance under EIA notification, 2006 for the establishment of a of Group Housing Project Maya garden Residency located at Village Gazipur, Zirakpur.

## 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020. SEAC observed that the Environmental Engineer, PPCB, Nodal Office, Mohali vide letter no 975 dated 07.02.2020 has intimated that no construction work has been started by the promoter company and boundary has been demarcated. The site of the project was conforming to the siting guidelines laid down by the Govt. of Punjab, Department of Science Technology and Environment vide order dated 25/07 /2008 as amended on 30/10/2009.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under: -

S.No.	Item	Details				
1.	Online Proposal No.	SI	SIA/PB/MIS/131801/2019			
2.	Name and Location of the	M	aya garden	Residency located	at	
	project	Vi	llage Gazipu	ır, Zirakpur		
3.	Latitude & Longitude	Co	orners coord	linates:		
			Corner	Latitude	Longitude	
			Corner-A	30°38'43.70"N	76°50'45.73"E	
			Corner-B	30°38'42.96"N	76°50'46.81"E	
			Corner-C	30°38'40.33"N	76°50'44.71"E	
			Corner-D	30°38'46.74"N	76°50'35.68"E	
			Corner-E	30°38'44.61"N	76°50'35.72"E	
			Corner-F	30°38'41.33"N	76°50'41.43"E	
			Corner-G	30°38'39.50"N	76°50'41.34"E	
			Corner-H	30°38'37.20"N	76°50'45.15"E	
			Corner-I	30°38'39.36"N	76°50'46.40"E	

4.	_	ctivity cove		S	Sr.No. 8	(a) 'Building & Construc	tion Proj	ect
	Notificati	on,14.09.20	006					
5.	Whether		is in critical		No			
6.	diversion a. Extent	of the fore	and? If yes,		Yes			
7.	Does the PLPA, 19	project cov	er under		No			
8.		eco-sens	•	1	No			
9.		ntion/Land ι aster Plan	ıse pattern	E	xisting	Built-up area		
10.	Cost of the	he project		R	Rs. 64 C	rores		
11.	Total Plo and Gree	t area, Built en Area	t- up Area		S.No. 1. 2.	Description Plot area (Total scheme area) Built-up area	Area 27256 72133	m <sup>2</sup>
					3.	Green area	4870 n	
12	EC fee			R	Rs 14420	66/- Vide DD No 12721	4 dated 1	12.12.19
13.	Population operation	on (when fu nal)	lly	2368 Persons.				
14.		equirement ruction Phas		Water demand of 15-20 KLD. The water requirement will be met from treated wastewater of STP of MC Zirakpur.				
15.	Break-up Winter):	of Water R	Requirements	8	&source	in Operation Phase (Su	ımmer, R	Rainy,
	Sr.No.	Season	Fresh w	٧a	ater	Reuse water		Total
			Domestic @	j)	90 lpcd	Flushing @45 lp	dc	(KLD)
			(KLE	))				@135
	1.	Summer	213	3		106		lpcd 319
	2.	Winter	213			106		319
	3.	Rainy	213			106		319
		1.00117		_		100		<u> </u>

	S.No.	Season	Basis		Gre	en	Trea	ated	1
	3.110.	3C43011	Dasis		Are			tewater	
					7110	·u		uirement	
		Unit	ltr/sqm/	dav	(sq	m)	KLD		
	1.	Summer	5.5	aay	487		27		
	2.	Winter	1.8 ltr/s	am/dav	487		7		
	3				487		0		
	3	Rainy	0 ltr/sqn	II/uay	467	70	U		
	S.No.	Description			So	urce of v	vater		
	1.	Domestic			Вс	rewell			
	2.	Flushing pu	irposes		Tr	eated wa	stew	ater	
16.	Treatme	nt & Disposal		Wastewat	ter g	enerated	(2.4	KLD) will be	treated in
	arranger	ments of wast	ewater in	septic tan	ık an	d treated	d was	stewater will b	oe used for
	Construc	ction Phase.		plantation	n pui	poses.			
		_							-
	_	of waste ma						and re used	
	during c	onstruction ph	nase		_				ste generated
				_		-	erioc	I shall be furt	her reused in
				pavemei	nt &	roads.			
17.	Disnosal	Arrangement	of	Total was	tew:	ater gene	ratio	n will be 255	KI D which
	· -	ater in Operat				_		STP of 380 KL	
	Phase	acci iii operac						project premi	
								d discharge	
				treated wastewater is given as under: -					
				Season	- 1	Flushing		Green area	Sewer
						(KLD)		(KLD)	(KLD)
				Summe	er	106		27	122
				Winter		106		7	142
				Monsoc	on	106		0	149
18.	Rainwate	er recharging		12643 m	³/hr	rainwate	r will	be collected	in 15 no. of
	Detail			Rainwate	r rec	tharging p	pits.		
19.	Solid wa	ste generatio	n and its	a)946 kg/	/day				
	Disposal			b) Solid w	vaste	es will be	appı	opriately seg	regated (at
				source by	pro	viding bir	ns) ir	nto recyclable	, Bio-
				degradab	le Co	omponen	ts an	d non-biodeg	ıradable.
				1	_			onverted into	Manure
				through n			-		
				-				y waste will b	oe Handed
				over to au	utho	rized was	ste pi	ckers	

20.	Green Belt Development Plan	Total 361 no. o	f troos wi	l he planted	against the
20.	including no. of trees to be			-	_
		· ·		(i.e. I tiee @	9 80 sqm of land
	planted & its species.	area of 27256		municat munus	
			•		conent submitted
		· ·		_	s of the trees to
2.1	11 1 24 1 05 24	be planted inside			
21.	Hazardous Waste &E- Waste	Used oil from D			_
		_		•	ed of as per the
		E-waste (Mana			Rules 2018.
22.		a) 2500 KW fro			
	& Saving	b)2 DG set of c		00 KVA & 1 ľ	No 125 KVA
		capacity (silent	•		
		Energy Saving			
		i) Solar Light	20 No	= 30 KWH	HD
		ii) Common a	. ,	lights replace	ced with LED
		= 135 K	WHD		
		iii) Total Energ	gy saved/	day 30+135	= 165 KWHD
23.	Environment Management Plan	Description	Capital	Recurring	Monitoring of
	along with Budgetary breakup		cost	cost	Air, Noise,
	phase-wise and responsibility		(lakhs)	(lakhs)	water (per
	to implement				annum) Rs.
		Construction	119.0	6.5	3.00
		Operation	-	10.5	3.25
	CER activities along with budge	etary break-up a	and respon	nsibility to in	nplement
	Partner of the company will b	e responsible	for impler	mentation of	f CER (Corporate
	Environment Responsibility). The	he estimated co	ost of the	project is R	s. 64 Crores and
	Rs. 40 lakhs are reserved for 0	C.E.R activities	as per Off	ice Memora	ndum vide F. No.
	22-65/ 2017-IA.III dated 01.0	5.2018. It was	s propose	ed to spent	Rs 40/- lacs for
	providing wastewater treatmen			=	
	Rural Developments and Panch	•		•	•
		,,			5

#### 3.0 Recommendations

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations to grant Environmental Clearance for the establishment of the project namely "Maya Garden Residency" having built-up area of 72133 sqm in total land area of 27256 sqm located at village Gazipur, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures, conditions prescribed in

**Annexure-I** of the proceedings subject to following additions, amendments and deletions given as under:

#### Conditions to be added in the Annexure-I as under: -

i) The project proponent shall plant 361 no. of trees of native varieties within the project as per the guidelines of MoEF.

#### Conditions to be amended in the Annexure-I as under: -

# Condition no. iv), v-a) & xv) of III. Water quality monitoring and preservation

- iv) The total domestic water requirement for the project will be 319 KLD, out of which 213 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total domestic wastewater generation from the project will be 255 KLD, which will be treated in STP of capacity @ 380 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr. No.	Season	For Flushing purposes (KLD)	Green Area (KLD)	Into Sewer* (KLD)
1.	Summer	106	27	122
2.	Winter	106	7	142
3.	Rainy	106	0	149

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 15 nos of rainwater harvesting recharge pits shall be provided for groundwater recharging as per CGWA norms. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

# Condition no. i) & iv) of X of Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least

- minimum amount of Rs. 40,00,000/- for providing wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 119.0 Lacs towards the capital cost and Rs 9.50 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 13.75 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Arun Jindal, Partner of the company
- ii) Sh. Deepak Gupta, Environmental Advisor of the promoter company
- iii) Sh. Sital Singh from M/s CPTL, Environmental Consultant of the promoter company

Environmental Consultant of the project proponent presented the salient features of the project which was taken on record. During the meeting, the following observations were made to which project proponent replied as under:

Sr. No	Observations	Reply
1.	Whether permission from Forest Department has been obtained for the access of road?	The project proponent submitted a copy of the acknowledgement of application submitted to the department of Forest for obtaining approval for diversion of forest area.
2.	What is the distance of the site from the Sukhna Wildlife Sanctuary?	
3.	What criteria has been adopted for calculating the parking space.	The Project Proponent Submitted That As Per Bye-Laws Of Punjab Municipal Building

		Bye-Laws 2018, the criteria for Parking Space For Residential Group Housing Projects Having Unit Area upto 120 Sqm, is to be taken as 1.5 ECS.
4.	The chute system should be provided in the project.	The project proponent agreed to the same.
5.	As per the layout plan the project proponent has proposed to install the STP at the backside of the project. What is the reason for selecting such a site for installation of STP?	If the STP is installed near the entrance of the project the overall look of the project becomes shabby and the only reason for selecting the site of STP is commercial.
6.	How far is the sewer of the existing area from the project?	The sewer passes in front of the project.

During discussions, representative of the promoter company agreed to comply with fully all the conditions as mentioned by SEAC.

The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for the establishment of the project namely "Maya Garden Residency" having built-up area of 72133 sqm in total land area of 27256 sqm located at village Gazipur, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures and with following conditions as recommended by SEAC & certain amendments therein & agreed by the Project Proponent:

## I. Statutory compliance:

- i) The project proponent shall obtain all necessary clearances/ permissions from all relevant agencies including town planning authority before commencement of work. All the construction shall be done in accordance with the local building byelaws.
- ii) The approval of the Competent Authority shall be obtained for the structural safety of buildings due to earthquakes, adequacy of firefighting equipment etc as per National Building Code including protection measures from lightening etc.
- iii) The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.
- iv) The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.

- v) The project proponent shall obtain Consent to Establish / Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the Punjab Pollution Control Board.
- vi) The project proponent shall obtain the necessary permission for drawl of groundwater/ surface water required for the project from the competent authority.
- vii) A certificate of adequacy of available power from the agency supplying power to the project along with the load allowed for the project should be obtained.
- viii) All other statutory clearances such as the approvals for storage of diesel from Chief Controller of Explosives, Fire Department, Civil Aviation Department shall be obtained, as applicable, by project proponents from the respective competent authorities.
- ix) The provisions of the Solid Waste (Management) Rules, 2016, E-Waste (Management) Rules, 2016, Construction & Demolition Waste Rules, 2016 and the Plastics Waste (Management) Rules, 2016 shall be followed.
- x) The project proponent shall follow the ECBC/ECBC-R prescribed by the Bureau of Energy Efficiency, Ministry of Power strictly.
- xi) The project site shall conform to the suitability as prescribed under the provisions laid down under the master plan of respective city/ town. For that, the project proponent shall either submit the NOC/ land use conformity certificate from Deptt of Town and Country Planning or other concerned Authority under whose jurisdiction, the site falls.
- xii) Besides above, the project proponent shall also comply with siting criteria / guidelines, standard operating practices, code of practice and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of projects.
- xiii) The project proponent shall get the layout plans approved from the Competent Authority for the activities/establishments to be set up at the project site in consonance with the project proposal for which this environment clearance is applied.

## II. Air quality monitoring and preservation

- i) Notification GSR 94(E) dated 25.01.2018 of MoEF&CC regarding Mandatory Implementation of Dust Mitigation Measures for Construction and Demolition Activities for projects requiring Environmental Clearance shall be complied with.
- ii) A management plan shall be drawn up and implemented to contain the current exceedance in ambient air quality at the site.
- iii) The project proponent shall install a system to carryout Ambient Air Quality monitoring for common /criterion parameters relevant-to the main pollutants released (e.g. PM10 and PM2.5) covering upwind and downwind directions during the construction period.

- iv) Diesel power generating sets proposed as source of backup power should be of enclosed type and conform to rules made under the Environment (Protection) Act, 1986. The height of stack of DG sets should be equal to the height needed for the combined capacity of all proposed DG sets. Use of low sulphur diesel should be ensured. The location of the DG sets may be decided in consultation with Punjab Pollution Control Board.
- v) Construction site shall be adequately barricaded before the construction begins. Dust, smoke & other air pollution prevention measures shall be provided for the building as well as the site. These measures shall include screens for the building under construction, continuous dust/ wind breaking walls all around the site (at least 3m height or 1/3rd of the building height and maximum upto 10m). Plastic/tarpaulin sheet covers shall be provided for vehicles bringing in sand, cement, murram, and other construction materials prone to causing dust pollution at the site as well as taking out debris from the site.
- vi) No Excavation of soil shall be carried out without adequate dust mitigation measures in place.
- vii) No loose soil or sand or construction & demolition waste or any other construction material that causes dust shall be left uncovered.
- viii) No uncovered vehicles carrying construction material and waste shall be permitted
- ix) All the topsoil excavated during construction activities should be stored for use in horticulture / landscape development within the project site.
- x) Grinding and Cutting of building material in open area shall be prohibited. Wet jet shall be provided for grinding and stone cutting.
- xi) Unpaved surfaces and loose soil shall be adequately sprinkled with water to suppress dust.
- xii) All construction and demolition debris shall be stored at the site within earmarked area and road side storage of construction material and waste shall be prohibited. All demolition and construction waste shall be managed as per the provisions of the Construction and Demolition Waste Rules 2016.
- xiii) The diesel generator sets to be used during construction phase shall be low sulphur diesel type and shall conform to the standards as enumerated in the Environmental (Protection) Rules, 1986 as prescribed for air and noise emission.
- xiv) The gaseous emissions from DG set shall be dispersed through adequate stack height as per CPCB standards. Acoustic enclosure shall be provided to the DG sets to mitigate the noise pollution. Low sulphur diesel shall be used. The location of the DG set and exhaust pipe height shall be as per the provisions of the Central Pollution Control Board (CPCB) norms.
- xv) For indoor air quality the ventilation provisions as per National Building Code of India shall be followed.
- xvi) Roads leading to or at construction site must be paved and blacktopped (i.e. metallic road)

- xvii) Dust Mitigation measures shall be displayed prominently at the construction site for easy public viewing.
- xviii) Construction and Demolition Waste Processing and Disposal site shall be identified and required dust mitigation measure be notified at the site.

## III. Water quality monitoring and preservation

- i) The natural drain system should be maintained for ensuring unrestricted flow of water.
- ii) No construction shall be allowed to obstruct the natural drainage through the site, on wetland and water bodies. Check dams, bio-swales, landscape, and other sustainable urban drainage systems (SUDS) are allowed for maintaining the drainage pattern and to harvest rain water.
- iii) Buildings shall be designed to follow the natural topography as much as possible. Minimum cutting and filling should be done.
- iv) The total domestic water requirement for the project will be 319 KLD, out of which 213 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total domestic wastewater generation from the project will be 255 KLD, which will be treated in STP of capacity @ 380 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr. No.	Season	For Flushing purposes (KLD)	Green Area (KLD)	Into Sewer* (KLD)
1.	Summer	106	27	122
2.	Winter	106	7	142
3.	Rainy	106	0	149

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

- b) Storage tank of adequate capacity shall be provided for the storage of treated wastewater and all efforts shall be made to supply the same for construction purposes.
- c) During construction phase, the project proponent shall ensure that the wastewater being generated from the labour quarters/toilets shall be treated and disposed in environment friendly manner. The project proponent shall also exercise the option of modular bio-toilets or will provide proper and

- adequately designed septic tanks for the treatment of such wastewater and treated effluents shall be utilized for green area/plantation
- vi) The project proponent shall ensure safe drinking water supply to the habitants. Adequate treatment facility for drinking water shall be provided, if required.
- vii) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- viii) A certificate shall be obtained from the local body supplying water, specifying the total annual water availability with the local authority, the quantity of water already committed, the quantity of water allotted to the project under consideration and the balance water available. This should be specified separately for groundwater and surface water sources, ensuring that there is no impact on other users.
- ix) At least 20% of the open spaces as required by the local building bye-Jaws shall be pervious. Use of Grass pavers, paver blocks with at least 50% opening, landscape etc. would be considered as pervious surface.
- x) Installation of dual pipe plumbing for supplying freshwater for drinking, cooking and bathing etc and other for supply of recycled water for flushing, landscape irrigation, car washing, thermal cooling, conditioning etc. shall be done.
- xi) The respective project proponent shall discourage the installation of R.O. plants in their projects in order to save the wastage in form of RO reject. However, in case the requirement of installing RO plant is utmost necessary then the rejected stream from the RO shall be separated and shall be utilized by storing the same within the particular component i.e. (Tower/Mall) or in a common place in the project premises.
- xii) The project proponent shall also adopt the new/innovating technologies like less water discharging taps (faucet with aerators)/urinals with electronic sensor system /water less urinals / twin flush cisterns/ sensor based alarming system for overhead water storage tanks and make it a part of the environmental plans building plans SO as to reduce the management / water consumption/groundwater abstraction in their Building Construction & Industrial projects.
- xiii) The project proponent will provide plumbing system for reuse of treated wastewater for flushing/ HVAC/ other purposes etc. and colour coding of different pipe lines carrying water/wastewater from different sources / treated wastewater as follows:

Sr.	Nature of the Stream	Colour code
No		
a)	Fresh water	Blue
b)	Untreated wastewater from Toilets/ urinal & from Kitchen	Black

c)	Untreated wastewater from Bathing/shower area, hand	Grey
	washing (Washbasin / sinks) and from Cloth Washing	
d)	Reject water streams from RO plants & AC condensate (this is to be implemented wherever centralized AC system and common RO has been proposed in the Project). Further, in case of individual houses/establishment this proposal may also be implemented wherever possible.	White
e)	Treated wastewater (for reuse only for plantation purposes) from the STP treating black water	Green
f)	Treated wastewater (for reuse for flushing purposes or any other activity except plantation) from the STP treating grey water	Green with strips
g)	Storm water	Orange

- xiv) Water demand during construction should be reduced by use of pre-mixed concrete, curing agents and other best practices referred.
- xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 15 nos of rainwater harvesting recharge pits shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.
- xvi) All recharge should be limited to shallow aquifer.
- xvii) No groundwater shall be used during construction phase of the project. Only treated sewage/wastewater shall be used. A proper record in this regard should be maintained and available at site.
- xviii) Any groundwater dewatering should be properly managed and shall conform to the approvals and the guidelines of the CGWA in the matter. Formal approval shall be taken from the CGWA for any groundwater abstraction or dewatering.
- xix) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- xx) Sewage shall be treated in the STP with tertiary treatment. STP shall be installed in phased manner viz a viz in module system designed in such a way so as to efficiently treat the wastewater with increase in its quantity due to rise in occupancy. The treated effluent from STP shall be recycled/re-used for flushing, AC make up water and gardening. No treated water shall be disposed of into municipal storm water drain.
- xxi) No sewage or untreated effluent water would be discharged through storm water drains. Onsite sewage treatment of capacity of treating 100% wastewater to be

installed. The installation of the Sewage Treatment Plant (STP) shall be certified by an independent expert and a report in this regard shall be submitted to the Ministry before the project is commissioned for operation. Treated wastewater shall be reused on site for landscape, flushing, cooling tower, and other end-uses. Excess treated water shall be discharged as per statutory norms notified by Ministry of Environment, Forest and Climate Change. Natural treatment systems shall be promoted.

- xxii) Periodical monitoring of water quality of treated sewage shall be conducted. Necessary measures should be made to mitigate the odour problem from STP.
- xxiii) Sludge from the onsite sewage treatment, including septic tanks, shall be collected, conveyed and disposed of as per the Ministry of Urban Development, Central Public Health and Environmental Engineering Organization (CPHEEO) Manual on Sewerage and Sewage Treatment Systems, 2013.

## IV. Noise monitoring and prevention

- i) Ambient noise levels shall conform to residential area/commercial area/industrial area/silence zone both during day and night as per Noise Pollution (Control and Regulation) Rules, 2000. Incremental pollution loads on the ambient air and noise quality shall be closely monitored during construction phase. Adequate measures shall be made to reduce ambient air and noise level during construction phase, so as to conform to the stipulated standards by CPCB/SPCB.
- ii) Noise level survey shall be carried out as per the prescribed guidelines and report in this regard shall be submitted to Regional Office of the Ministry as a part of sixmonthly compliance report.
- iii) Acoustic enclosures for DG sets, noise barriers for ground-run bays, ear plugs for operating personnel shall be provided as mitigation measures for noise impact due to ground sources.

## V. Energy Conservation measures

- i) Compliance with the Punjab Energy Conservation Building Code (PECBC) of Energy Efficiency shall be ensured.
- ii) Outdoor and common area lighting shall be LED.
- iii) Concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc. shall be incorporated in the building design. Wall, window, and roof uvalues shall be as per ECBC specifications.
- iv) Energy conservation measures like installation of LEDs for lighting the area outside the building should be integral part of the project design and should be in place before project commissioning.

- v) Solar, wind or any other Renewable Energy equipment shall be installed to meet electricity generation equivalent to at least 1% of the demand load or as per the state level/ local building bye-laws requirement, whichever is higher.
- vi) Solar power by utilizing at least 30% of the rooftop area shall be used for lighting in the apartment to reduce the power load on grid. Separate electric meter shall be installed for solar power.

## VI. Waste Management

- i) A certificate from the competent authority handling municipal solid wastes, indicating the existing civic capacities of handling and their adequacy to cater to the M.S.W. generated from project shall be obtained.
- ii) Disposal of muck during construction phase shall not create any adverse effect on the neighbouring communities and be disposed of taking the necessary precautions for general safety and health aspects of people, only in approved sites with the approval of competent authority.
- i) Chute system, separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- iii) Separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- iv) Organic waste compost/ Vermiculture pit/ Organic Waste Converter within the premises with a minimum capacity of 0.3 kg /person/day must be installed for treatment and disposal of the waste.
- v) All non-biodegradable waste shall be handed over to authorized recyclers for which a written tie up must be done with the authorized recyclers.
- vi) Any hazardous waste generated during construction phase, shall be disposed of as per applicable rules and norms with necessary approvals of the State Pollution Control Board.
- vii) Use of environment friendly materials in bricks, blocks and other construction materials, shall be required for at least 20% of the construction material quantity. These include Fly Ash bricks, hollow bricks, AACs, Fly Ash Lime Gypsum blocks, Compressed earth blocks, and other environment friendly materials.
- viii) Fly ash should be used as building material in the construction as per the provision of Fly Ash Notification of September, 1999 and amended as on 27th August, 2003 and 25th January, 2016. Ready mixed concrete must be used in building construction.
- ix) Any wastes from construction and demolition activities related thereto shall be managed in such a way so as to strictly conform to the Construction and Demolition Rules, 2016.

x) Used CFLs and TFLs should be properly collected and disposed off/sent for recycling as per the prevailing guidelines/ rules of the regulatory authority to avoid mercury contamination.

#### VII. Green Cover

- i) No tree shall be felled/transplanted unless extreme exigencies demand. Where absolutely necessary, tree felling shall be with prior permission from the concerned regulatory authority. Old trees should be retained based on girth and age regulations as may be prescribed by the Forest Department. Plantations to be ensured species (cut) to species (planted).
- ii) At least single line plantation all around the boundary of the project as proposed shall be provided. The open spaces inside the plot should be suitably landscaped and covered with vegetation of indigenous species/variety. A minimum of one tree for every 80 sqm of total project land should be planted and maintained. The existing trees will be counted for this purpose. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping. The plantation should be provided as per SEIAA guidelines.
- iii) Where the trees need to be cut with prior permission from the concerned local Authority, compensatory plantation in the ratio of 1: 10 (i.e. planting of 10 trees for every 1 tree that is cut) shall be done and maintained. Plantations to be ensured species (cut) to species (planted). Area for green belt development shall be provided as per the details provided in the project document.
- iv) Topsoil should be stripped to a depth of 20 cm from the areas proposed for buildings, roads, paved areas, and external services. It should be stockpiled appropriately in designated areas and reapplied during plantation of the proposed vegetation on site.
- v) The project proponent shall not use any chemical fertilizer /pesticides /insecticides and shall use only Herbal pesticides/insecticides and organic manure in the green area.
- vi) The green belt along the periphery of the plot shall achieve attenuation factor conforming to the day and night noise standards prescribed for residential land use.

### **VIII. Transport**

- i) A comprehensive mobility plan, as per MoUD best practices guidelines (URDPFI), shall be prepared to include motorized, non-motorized, public, and private networks. Road should be designed with due consideration for environment, and safety of users. The road system can be designed with these basic criteria.
  - a) Hierarchy of roads with proper segregation of vehicular and pedestrian traffic.
  - b) Traffic calming measures.

- c) Proper design of entry and exit points.
- d) Parking norms as per local regulation.
- ii) Vehicles hired for bringing construction material to the site should be in good condition and should have a pollution check certificate and should conform to applicable air and noise emission standards and be operated only during non-peak hours.
- iii) A detailed traffic management and traffic decongestion plan shall be drawn up to ensure that the current level of service of the roads within a 05 kms radius of the project is maintained and improved upon after the implementation of the project. This plan should be based on cumulative impact of all development and increased habitation being carried out or proposed to be carried out by the project or other agencies in this 05 Kms radius of the site in different scenarios of space and time and the traffic management plan shall be duly validated and certified by the State Urban Development department and the P.W.D./ competent authority for road augmentation and shall also have their consent to the implementation of components of the plan which involve the participation of these departments.
- iv) Traffic congestion near the entry and exit points from the roads adjoining the proposed project site must be avoided. Parking should be fully internalized and no public space should be utilized.

#### IX. Human health issues

- i) All workers working at the construction site and involved in loading, unloading, carriage of construction material and construction debris or working in any area with dust pollution shall be provided with dust mask.
- ii) For indoor air quality the ventilation provisions as per National Building Code of India shall be strictly followed.
- iii) Emergency preparedness plan based on the Hazard identification and Risk Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.
- iv) Occupational health surveillance of the workers shall be done on a regular basis.
- v) A First Aid Room shall be provided in the project both during construction and operations of the project.

## X. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least minimum amount of Rs. 40,00,000/- for providing wastewater treatment of village

- pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.
- ii) The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions to all shareholders / stake holders. The copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of six-monthly report.
- iii) A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 119.0 Lacs towards the capital cost and Rs 9.50 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 13.75 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

## XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier.

#### XII. Miscellaneous

- i) The project proponent before allowing any occupancy shall obtain completion and occupancy certificate from the Competent Authority and submit a copy of the same to SEIAA, Punjab.
- ii) The project proponent shall comply with the conditions of CLU.
- iii) The project proponent shall prominently advertise it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days indicating that the project has been accorded environment clearance and the details of MoEF&CC /SEIAA website where it is displayed.

- iv) The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- v) The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.
- vi) The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the Ministry of Environment, Forest and Climate Change at Environment Clearance portal.
- vii) The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii) The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities, commencing the land development work and start of production /operation by the project.
- ix) The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.
- x) The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- xi) No further expansion or modifications in the plant/project shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).
- xii) Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiii) The SEIAA/Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xiv) The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xv) The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data/ information/monitoring reports.
- xvi) The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control

- of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvii) Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

#### **Additional Conditions: -**

i) The project proponent shall plant 361 no. of trees of native varieties within the project as per the guidelines of MoEF.

Item No. 164.10 Application for Environmental Clearance under EIA notification dated 14.09.2006 for the establishment of Hotel Cum Commercial project Carpe Diem located at Village Santemajra, Kharar by M/s CREDO ASSETS (P) LTD (Proposal No. SIA/PB/MIS/136535/2020).

SEIAA observed as under:

# 1.0 Background

The project proponent has filed an application for obtaining Environment Clearance under EIA notification, 2006 for the establishment of a Hotel Cum Commercial project Carpe Diem located at Village Santemajra, Kharar.

## 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020. SEAC observed that the Environmental Engineer, PPCB, Nodal Office, Mohali vide letter no 1140 dated 14.02.2020 has intimated that no construction work has been started by the promoter company and boundary has been demarcated. The site of the project was conforming to the siting guidelines laid down by the Govt. of Punjab, Department of Science Technology and Environment vide order dated 25/07 /2008 as amended on 30/10/2009.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under: -

S.No.	Item	Details					
1.	Online Proposal No.	SIA/PB/MIS/136535/2020					
2.	Name and Location of the	Carpe Diem					
	project	located at Village Santemajra, Kharar					
3.	Latitude & Longitude	Corners coordinates:					
			Corner	Latitude	Longitude		
			Corner-A	30°48'32.12"N	76°39'18.74"E		
			Corner-B	30°48'29.51"N	76°39'20.48"E		
			Corner-C	30°48'23.82"N	76°39'18.61"E		
			Corner-D	30°48'29.43"N	76°39'16.08"E		
4.	Project/activity covered under	Sr .No. 8(a) 'Building & Construction Project'					
	item of scheduled to the EIA						
	Notification,14.09.2006						

5.	Whethe	r the project	is in critical	No				
		d area or not.						
6.	diversio a. Exter	e project invol n of forest lan at of the forest s of the forest	d? If yes, : land.	No				
7.		the project c		No				
8.		f eco-sensiti al park/Wi	oject fall within 10 No o-sensitive area/ park/Wild Life					
9.		ation/Land use ter Plan	e pattern as	Mix land	use			
10.	Cost of	the project		Rs. 35 C	rores			
11.	Total Pl	ot area, Built- ı	up Area and	S.No.	Description	Area		
	Green a	rea		1.	Plot area (Total scheme area)	11098 m <sup>2</sup>		
				2.	Built-up area	34939 m <sup>2</sup>		
				3.	Green area	125 m <sup>2</sup>		
11	EC fee			Rs 69878	8/- Vide DD No. 021371	dated 08.01.2020		
12.	-	·			Room population =477 persons  Visitor = 22 person  Total = 499 Persons			
13.		Water Requirements & source in Construction Phase			Water demand of 15 KLD. The water requirement will be provided by treated water from STP of MC Kharar.			
14.	<u> </u>					e (Summer, Rainy,		
	S.No.	Season	Fresh wat	er	Reuse water	Total		
			Domestic	(KLD)	Flushing (KLD)	(KLD)		
	1.	Summer	63		21	84		
	2.	Winter	63		21	84		
	3.	Rainy	63		21	84		
	Room Population -=477@ 175 lit./day 83 KLD Shops 22 @45 ltr/day 1 KLD Domestic Water requirement- 84 KLD							
	S.No.	Description	1		Source of water Borewell			
	1.	Domestic						
	2.	Flushing po	urposes		Treated wastewater			

15.	Treatment & Disposal	Wastewater generated (2.4 KLD) will be treated in					
	arrangements of wastewater in	septic tank and treated wastewater will be used					
	Construction Phase.	for plantation purposes.					
	Handling of waste material			d and re used	-		
	during construction phase	, -			ste generated		
		during construction period shall be further reused in					
1.0		pavement & roads					
16.		Total wastewater generation will be 67 KLD which					
	Wastewater in Operation Phase	will be treated in proposed STP of 150 KLD					
		capacity to be installed within the project premises. Reuse of treated wastewater and					
		<sup>-</sup>					
		as under: -	surpius trea	ted wastewat	er is given		
		Season	Flushing	Green area	Sewer		
		) Season	(KLD)	(125 sqm)	(KLD)		
			(KLD)	(KLD)	(KLD)		
		Summer	21	1	45		
		Winter	21	0	46		
		Monsoon	21	0	46		
17.	Rainwater recharging	5704 m <sup>3</sup> /hr rainwater will be collected in 7 no. of Rain					
10	Detail	wate recharg					
18.	Solid waste generation and its	a) 100 kg/da	•				
	Disposal	_			egregated (at		
				ts and non-bio	cyclable, Bio-		
		_	•		into Manure		
		'	nechanical co		into Manure		
				•	ill be Handed		
		_	orized waste	-	iii be rianaca		
19.	Green Belt Development Plan	Total 150 no. of trees will be planted against the					
	-	pe requirement of 149 tree (i.e. 1 tree @ 80 sqm of					
	planted & its species.	land area of 11908 sqm)					
		(To a query of SEAC, the project proponent submitted					
		a revised layout plan providing details of the trees to					
		be planted inside the project					
20.	Hazardous Waste &E- Waste	Used oil fro	m DG sets	will be sold	to registered		
		recyclers an	d E-waste wi	ll be disposed	of as per the		
		E-waste (Management) Amendment Rules 2018.					
21.	Energy Requirements	a) 1800 KW f	rom PSPCL.				
	& Saving	b)1x500, 1x 125 KVA & 63 KVA capacity (silent DG set)					
<u></u>							

		⊏,	noray Sayina m	oacuroc:			
		Energy Saving measures:					
		i) Solar Light10No = 15KWHD					
		ii) Common area (200) lights (60W)					
	iii) Replaced with LED (15) :						
	iv) Total Energy sa					08=123	KWHD
22.	Environment Management Plan		Description	Capital	Recurring	Monito	ring of
	along with Budgetary breakup			cost	cost	Air,	Noise,
	phase-wise and responsibility			(lakhs)	(lakhs)	water	(per
	to implement					annum	) Rs.
		Construction		64.5	7.0	5.90	
			Operation	-	9.0	6.90	
23.	CER activities along with budge	eta	ary break-up ar	d respons	sibility to imp	plement	

Director of the company will be responsible for the implementation of CER (Corporate Environment Responsibility). The estimated cost of the project is Rs. 35 Crores and Rs 21 lakhs has been proposed under C.E.R activities as per Office Memorandum vide F. No. 22-65/ 2017-

IA.III dated 01.05.2018, which will be spent on the following activities:

S.No.	CER Activities	Fund	Time sche	edule
		allocated	Start	Completed
		(Lakhs)		
1.	Adoption of Village school of Santemajra	21	Already	Will be
			started	completed
				before
				completion
				of project

#### 3.0 Recommendations

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations to grant Environmental Clearance for the establishment of the project namely "Carpe Diem" having a built-up area of 34939 sqm in total land area of 11098 sqm located at village Santemajra, Kharar, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures, conditions prescribed in **Annexure-I of the proceedings** subject to following additions, amendments and deletions given as under:

#### Conditions to be added in the Annexure-I as under: -

i) The project proponent shall plant 150 no. of trees of native varieties within the project as per the guidelines of MoEF/SEIAA.

### Conditions to be amended in the Annexure-I as under: -

## Condition no. iv), v-a) &xv) of III. Water quality monitoring and preservation

- iv) The total domestic water requirement for the project will be 84 KLD, out of which 63 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 67 KLD, which will be treated in STP of capacity @ 150 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under:

Sr. No.	Season	For Flushing purposes (KLD)	Green Area (KLD)	Into Sewer* (KLD)
1.	Summer	21	1	45
2.	Winter	21	0	46
3.	Rainy	21	0	46

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 7nos of rainwater harvesting recharge pits shall be provided for groundwater recharging as per CGWA norms. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

# Condition no. i) & iv) of X of Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least minimum amount of Rs. 21,00,000/- towards the following activities:

S.No.	CER Activities	Fund	Time schedule	
		allocated	Start	Completed
		(Lakhs)		
1.	Adoption of Village school of Santemajra	21	Already started	Will be completed before completion of project

- \*Note: The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 60.5Lacs towards the capital cost and Rs 9.40 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 9.0 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

### 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Sahil Bansal, GM of the company.
- ii) Sh. Deepak Gupta, Environmental Advisor of the project proponent
- iii) Sh. Sital Singh, EIA Coordinator, M/s Chandigarh Pollution Testing Laboratory, Phase VII, Industrial Area, Mohali.

During the meeting, the following observations were made to which project proponent replied as under:

During discussions, representative of the promoter company agreed to comply with fully all the conditions as mentioned by SEAC.

The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for expansion of the project namely "Carpe Diem" having a built-up area of 34939 sqm in total land area of 11098 sqm located at village Santemajra, Kharar, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures and with following conditions as recommended by SEAC & certain amendments therein & agreed by the Project Proponent:

### I. Statutory compliance:

- i) The project proponent shall obtain all necessary clearances/ permissions from all relevant agencies including town planning authority before commencement of work. All the construction shall be done in accordance with the local building byelaws.
- ii) The approval of the Competent Authority shall be obtained for the structural safety of buildings due to earthquakes, adequacy of fire fighting equipment etc as per National Building Code including protection measures from lightening etc.
- iii) The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.
- iv) The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.
- v) The project proponent shall obtain Consent to Establish / Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the Punjab Pollution Control Board.
- vi) The project proponent shall obtain the necessary permission for drawl of groundwater/ surface water required for the project from the competent authority.
- vii) A certificate of adequacy of available power from the agency supplying power to the project along with the load allowed for the project should be obtained.
- viii) All other statutory clearances such as the approvals for storage of diesel from Chief Controller of Explosives, Fire Department, Civil Aviation Department shall be obtained, as applicable, by project proponents from the respective competent authorities.
- ix) The provisions of the Solid Waste (Management) Rules, 2016, E-Waste (Management) Rules, 2016, Construction & Demolition Waste Rules, 2016 and the Plastics Waste (Management) Rules, 2016 shall be followed.
- x) The project proponent shall follow the ECBC/ECBC-R prescribed by the Bureau of Energy Efficiency, Ministry of Power strictly.
- xi) The project site shall conform to the suitability as prescribed under the provisions laid down under the master plan of respective city/ town. For that, the project proponent shall either submit the NOC/ land use conformity certificate from Deptt of Town and Country Planning or other concerned Authority under whose jurisdiction, the site falls.
- xii) Besides above, the project proponent shall also comply with siting criteria / guidelines, standard operating practices, code of practice and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of projects.

xiii) The project proponent shall get the layout plans approved from the Competent Authority for the activities/establishments to be set up at the project site in consonance with the project proposal for which this environment clearance is applied.

## II. Air quality monitoring and preservation

- i) Notification GSR 94(E) dated 25.01.2018 of MoEF&CC regarding Mandatory Implementation of Dust Mitigation Measures for Construction and Demolition Activities for projects requiring Environmental Clearance shall be complied with.
- ii) A management plan shall be drawn up and implemented to contain the current exceedance in ambient air quality at the site.
- iii) The project proponent shall install a system to carryout Ambient Air Quality monitoring for common /criterion parameters relevant-to the main pollutants released (e.g. PM10 and PM2.5) covering upwind and downwind directions during the construction period.
- iv) Diesel power generating sets proposed as source of backup power should be of enclosed type and conform to rules made under the Environment (Protection) Act, 1986. The height of stack of DG sets should be equal to the height needed for the combined capacity of all proposed DG sets. Use of low sulphur diesel should be ensured. The location of the DG sets may be decided in consultation with Punjab Pollution Control Board.
- v) Construction site shall be adequately barricaded before the construction begins. Dust, smoke & other air pollution prevention measures shall be provided for the building as well as the site. These measures shall include screens for the building under construction, continuous dust/ wind breaking walls all around the site (at least 3m height or 1/3rd of the building height and maximum upto 10m). Plastic/tarpaulin sheet covers shall be provided for vehicles bringing in sand, cement, murram, and other construction materials prone to causing dust pollution at the site as well as taking out debris from the site.
- vi) No Excavation of soil shall be carried out without adequate dust mitigation measures in place.
- vii) No loose soil or sand or construction & demolition waste or any other construction material that causes dust shall be left uncovered.
- viii) No uncovered vehicles carrying construction material and waste shall be permitted
- ix) All the topsoil excavated during construction activities should be stored for use in horticulture / landscape development within the project site.
- x) Grinding and Cutting of building material in open area shall be prohibited. Wet jet shall be provided for grinding and stone cutting.
- xi) Unpaved surfaces and loose soil shall be adequately sprinkled with water to suppress dust.

- xii) All construction and demolition debris shall be stored at the site within earmarked area and road side storage of construction material and waste shall be prohibited. All demolition and construction waste shall be managed as per the provisions of the Construction and Demolition Waste Rules 2016.
- xiii) The diesel generator sets to be used during construction phase shall be low sulphur diesel type and shall conform to the standards as enumerated in the Environmental (Protection) Rules, 1986 as prescribed for air and noise emission.
- xiv) The gaseous emissions from DG set shall be dispersed through adequate stack height as per CPCB standards. Acoustic enclosure shall be provided to the DG sets to mitigate the noise pollution. Low sulphur diesel shall be used. The location of the DG set and exhaust pipe height shall be as per the provisions of the Central Pollution Control Board (CPCB) norms.
- xv) For indoor air quality the ventilation provisions as per National Building Code of India shall be followed.
- xvi) Roads leading to or at construction site must be paved and blacktopped (i.e. metallic road)
- xvii) Dust Mitigation measures shall be displayed prominently at the construction site for easy public viewing.
- xviii) Construction and Demolition Waste Processing and Disposal site shall be identified and required dust mitigation measure be notified at the site.

# III. Water quality monitoring and preservation

- The natural drain system should be maintained for ensuring unrestricted flow of water.
- ii) No construction shall be allowed to obstruct the natural drainage through the site, on wetland and water bodies. Check dams, bio-swales, landscape, and other sustainable urban drainage systems (SUDS) are allowed for maintaining the drainage pattern and to harvest rain water.
- iii) Buildings shall be designed to follow the natural topography as much as possible. Minimum cutting and filling should be done.
- iv) The total domestic water requirement for the project will be 84 KLD, out of which 63 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 67 KLD, which will be treated in STP of capacity @ 150 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under:

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)	(KLD)	(KLD)

1.	Summer	21	1	45
2.	Winter	21	0	46
3.	Rainy	21	0	46

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

- b) Storage tank of adequate capacity shall be provided for the storage of treated wastewater and all efforts shall be made to supply the same for construction purposes.
- c) During construction phase, the project proponent shall ensure that the wastewater being generated from the labour quarters/toilets shall be treated and disposed in environment friendly manner. The project proponent shall also exercise the option of modular bio-toilets or will provide proper and adequately designed septic tanks for the treatment of such wastewater and treated effluents shall be utilized for green area/plantation
- vi) The project proponent shall ensure safe drinking water supply to the habitants. Adequate treatment facility for drinking water shall be provided, if required.
- vii) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- viii) A certificate shall be obtained from the local body supplying water, specifying the total annual water availability with the local authority, the quantity of water already committed, the quantity of water allotted to the project under consideration and the balance water available. This should be specified separately for groundwater and surface water sources, ensuring that there is no impact on other users.
- ix) At least 20% of the open spaces as required by the local building bye-Jaws shall be pervious. Use of Grass pavers, paver blocks with at least 50% opening, landscape etc. would be considered as pervious surface.
- x) Installation of dual pipe plumbing for supplying freshwater for drinking, cooking and bathing etc and other for supply of recycled water for flushing, landscape irrigation, car washing, thermal cooling, conditioning etc. shall be done.
- xi) The respective project proponent shall discourage the installation of R.O. plants in their projects in order to save the wastage in form of RO reject. However, in case the requirement of installing RO plant is utmost necessary then the rejected stream from the RO shall be separated and shall be utilized by storing the same within the particular component i.e. (Tower/Mall) or in a common place in the project premises.
- xii) The project proponent shall also adopt the new/innovating technologies like less water discharging taps (faucet with aerators)/urinals with electronic sensor

system /water less urinals / twin flush cisterns/ sensor based alarming system for overhead water storage tanks and make it a part of the environmental management plans / building plans so as to reduce the water consumption/groundwater abstraction in their Building Construction & Industrial projects.

xiii) The project proponent will provide plumbing system for reuse of treated wastewater for flushing/ HVAC/ other purposes etc. and colour coding of different pipe lines carrying water/wastewater from different sources / treated wastewater as follows:

Sr. No	Nature of the Stream	Colour code
a)	Fresh water	Blue
b)	Untreated wastewater from Toilets/ urinal & from Kitchen	Black
c)	Untreated wastewater from Bathing/shower area, hand washing (Washbasin / sinks) and from Cloth Washing	Grey
d)	Reject water streams from RO plants & AC condensate (this is to be implemented wherever centralized AC system and common RO has been proposed in the Project). Further, in case of individual houses/establishment this proposal may also be implemented wherever possible.	White
e)	Treated wastewater (for reuse only for plantation purposes) from the STP treating black water	Green
f)	Treated wastewater (for reuse for flushing purposes or any other activity except plantation) from the STP treating grey water	Green with strips
g)	Storm water	Orange

- xiv) Water demand during construction should be reduced by use of pre-mixed concrete, curing agents and other best practices referred.
- xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 7 nos of rainwater harvesting recharge pits shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.
- xvi) All recharge should be limited to shallow aquifer.
- xvii) No groundwater shall be used during construction phase of the project. Only treated sewage/wastewater shall be used. A proper record in this regard should be maintained and available at site.

- xviii) Any groundwater dewatering should be properly managed and shall conform to the approvals and the guidelines of the CGWA in the matter. Formal approval shall be taken from the CGWA for any groundwater abstraction or dewatering.
- xix) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- xx) Sewage shall be treated in the STP with tertiary treatment. STP shall be installed in phased manner viz a viz in module system designed in such a way so as to efficiently treat the wastewater with increase in its quantity due to rise in occupancy. The treated effluent from STP shall be recycled/re-used for flushing, AC make up water and gardening. No treated water shall be disposed of into municipal storm water drain.
- xxi) No sewage or untreated effluent water would be discharged through storm water drains. Onsite sewage treatment of capacity of treating 100% wastewater to be installed. The installation of the Sewage Treatment Plant (STP) shall be certified by an independent expert and a report in this regard shall be submitted to the Ministry before the project is commissioned for operation. Treated wastewater shall be reused on site for landscape, flushing, cooling tower, and other end-uses. Excess treated water shall be discharged as per statutory norms notified by Ministry of Environment, Forest and Climate Change. Natural treatment systems shall be promoted.
- xxii) Periodical monitoring of water quality of treated sewage shall be conducted. Necessary measures should be made to mitigate the odour problem from STP.
- xxiii) Sludge from the onsite sewage treatment, including septic tanks, shall be collected, conveyed and disposed of as per the Ministry of Urban Development, Central Public Health and Environmental Engineering Organization (CPHEEO) Manual on Sewerage and Sewage Treatment Systems, 2013.

### IV. Noise monitoring and prevention

- i) Ambient noise levels shall conform to residential area/commercial area/industrial area/silence zone both during day and night as per Noise Pollution (Control and Regulation) Rules, 2000. Incremental pollution loads on the ambient air and noise quality shall be closely monitored during construction phase. Adequate measures shall be made to reduce ambient air and noise level during construction phase, so as to conform to the stipulated standards by CPCB/SPCB.
- ii) Noise level survey shall be carried out as per the prescribed guidelines and report in this regard shall be submitted to Regional Office of the Ministry as a part of sixmonthly compliance report.
- iii) Acoustic enclosures for DG sets, noise barriers for ground-run bays, ear plugs for operating personnel shall be provided as mitigation measures for noise impact due to ground sources.

## V. Energy Conservation measures

- i) Compliance with the Punjab Energy Conservation Building Code (PECBC) of Energy Efficiency shall be ensured.
- ii) Outdoor and common area lighting shall be LED.
- iii) Concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc. shall be incorporated in the building design. Wall, window, and roof uvalues shall be as per ECBC specifications.
- iv) Energy conservation measures like installation of LEDs for lighting the area outside the building should be integral part of the project design and should be in place before project commissioning.
- v) Solar, wind or any other Renewable Energy equipment shall be installed to meet electricity generation equivalent to at least 1% of the demand load or as per the state level/ local building bye-laws requirement, whichever is higher.
- vi) Solar power by utilizing at least 30% of the rooftop area shall be used for lighting in the apartment to reduce the power load on grid. Separate electric meter shall be installed for solar power.

### VI. Waste Management

- i) A certificate from the competent authority handling municipal solid wastes, indicating the existing civic capacities of handling and their adequacy to cater to the M.S.W. generated from project shall be obtained.
- ii) Disposal of muck during construction phase shall not create any adverse effect on the neighbouring communities and be disposed of taking the necessary precautions for general safety and health aspects of people, only in approved sites with the approval of competent authority.
- iii) Separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- iv) Organic waste compost/ Vermiculture pit/ Organic Waste Converter within the premises with a minimum capacity of 0.3 kg /person/day must be installed for treatment and disposal of the waste.
- v) All non-biodegradable waste shall be handed over to authorized recyclers for which a written tie up must be done with the authorized recyclers.
- vi) Any hazardous waste generated during construction phase, shall be disposed of as per applicable rules and norms with necessary approvals of the State Pollution Control Board.
- vii) Use of environment friendly materials in bricks, blocks and other construction materials, shall be required for at least 20% of the construction material quantity.

- These include Fly Ash bricks, hollow bricks, AACs, Fly Ash Lime Gypsum blocks, Compressed earth blocks, and other environment friendly materials.
- viii) Fly ash should be used as building material in the construction as per the provision of Fly Ash Notification of September, 1999 and amended as on 27th August, 2003 and 25th January, 2016. Ready mixed concrete must be used in building construction.
- ix) Any wastes from construction and demolition activities related thereto shall be managed in such a way so as to strictly conform to the Construction and Demolition Rules, 2016.
- x) Used CFLs and TFLs should be properly collected and disposed off/sent for recycling as per the prevailing guidelines/ rules of the regulatory authority to avoid mercury contamination.

#### VII. Green Cover

- i) No tree shall be felled/transplanted unless extreme exigencies demand. Where absolutely necessary, tree felling shall be with prior permission from the concerned regulatory authority. Old trees should be retained based on girth and age regulations as may be prescribed by the Forest Department. Plantations to be ensured species (cut) to species (planted).
- ii) At least single line plantation all around the boundary of the project as proposed shall be provided. The open spaces inside the plot should be suitably landscaped and covered with vegetation of indigenous species/variety. A minimum of one tree for every 80 sqm of total project land should be planted and maintained. The existing trees will be counted for this purpose. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping. The plantation should be provided as per SEIAA guidelines.
- Where the trees need to be cut with prior permission from the concerned local Authority, compensatory plantation in the ratio of 1: 10 (i.e. planting of 10 trees for every 1 tree that is cut) shall be done and maintained. Plantations to be ensured species (cut) to species (planted). Area for green belt development shall be provided as per the details provided in the project document.
- iv) Topsoil should be stripped to a depth of 20 cm from the areas proposed for buildings, roads, paved areas, and external services. It should be stockpiled appropriately in designated areas and reapplied during plantation of the proposed vegetation on site.
- v) The project proponent shall not use any chemical fertilizer /pesticides /insecticides and shall use only Herbal pesticides/insecticides and organic manure in the green area.

vi) The green belt along the periphery of the plot shall achieve attenuation factor conforming to the day and night noise standards prescribed for residential land use.

# VIII. Transport

- i) A comprehensive mobility plan, as per MoUD best practices guidelines (URDPFI), shall be prepared to include motorized, non-motorized, public, and private networks. Road should be designed with due consideration for environment, and safety of users. The road system can be designed with these basic criteria.
  - a) Hierarchy of roads with proper segregation of vehicular and pedestrian traffic.
  - b) Traffic calming measures.
  - c) Proper design of entry and exit points.
  - d) Parking norms as per local regulation.
- ii) Vehicles hired for bringing construction material to the site should be in good condition and should have a pollution check certificate and should conform to applicable air and noise emission standards and be operated only during non-peak hours.
- iii) A detailed traffic management and traffic decongestion plan shall be drawn up to ensure that the current level of service of the roads within a 05 kms radius of the project is maintained and improved upon after the implementation of the project. This plan should be based on cumulative impact of all development and increased habitation being carried out or proposed to be carried out by the project or other agencies in this 05 Kms radius of the site in different scenarios of space and time and the traffic management plan shall be duly validated and certified by the State Urban Development department and the P.W.D./ competent authority for road augmentation and shall also have their consent to the implementation of components of the plan which involve the participation of these departments.
- iv) Traffic congestion near the entry and exit points from the roads adjoining the proposed project site must be avoided. Parking should be fully internalized and no public space should be utilized.

### IX. Human health issues

- i) All workers working at the construction site and involved in loading, unloading, carriage of construction material and construction debris or working in any area with dust pollution shall be provided with dust mask.
- ii) For indoor air quality the ventilation provisions as per National Building Code of India shall be strictly followed.
- iii) Emergency preparedness plan based on the Hazard identification and Risk Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets,

mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.

- iv) Occupational health surveillance of the workers shall be done on a regular basis.
- v) A First Aid Room shall be provided in the project both during construction and operations of the project.

## X. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least minimum amount of Rs. 21,00,000/- towards the following activities:

S.No.	CER Activities	Fund	Time sch	nedule
		allocated (Lakhs)	Start	Completed
1.	Adoption of Village school of Santemajra	21	Already started	Will be completed before completion
				of project

\*Note: - The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project.

- ii) The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions to all shareholders / stake holders. The copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of six-monthly report.
- iii) A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 64.5 Lacs towards the capital cost and Rs 12.90 Lacs/annum towards recurring cost in the construction phase of the project including the environmental

monitoring cost and shall spend a minimum amount of Rs 15.90 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

### XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier.

### XII. Miscellaneous

- i) The project proponent before allowing any occupancy shall obtain completion and occupancy certificate from the Competent Authority and submit a copy of the same to SEIAA, Punjab.
- ii) The project proponent shall comply with the conditions of CLU.
- iii) The project proponent shall prominently advertise it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days indicating that the project has been accorded environment clearance and the details of MoEF&CC /SEIAA website where it is displayed.
- iv) The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- v) The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.
- vi) The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the Ministry of Environment, Forest and Climate Change at Environment Clearance portal.
- vii) The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii) The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned

- authorities, commencing the land development work and start of production /operation by the project.
- ix) The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.
- x) The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- xi) No further expansion or modifications in the plant/project shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).
- xii) Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiii) The SEIAA/Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xiv) The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xv) The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data/ information/monitoring reports.
- xvi) The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvii) Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

### **Additional Condition: -**

i) The project proponent shall plant 150 no. of trees of native varieties within the project as per the guidelines of MoEF/SEIAA.

Item No. 164.11 Application for Environmental Clearance under EIA notification dated 14.09.2006 for the establishment of Group Housing Project City of Dreams -5 located at Village Santemajra, Kharar by M/s Credo Assets (P) Ltd. (Proposal No. SIA/PB/MIS/136532/2020).

SEIAA observed as under:

### 1.0 Background

The project proponent has filed an application for obtaining Environment Clearance under EIA notification, 2006 for the establishment of a Group Housing Project "City of Dreams -5" located at Village Santemajra, Kharar.

### 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020. SEAC observed that the Environmental Engineer, PPCB, Nodal Office, Mohali vide letter no 1147 dated 14.02.2020 has intimated that no construction work has been started by the promoter company and boundary has been demarcated. The site of the project was conforming to the siting guidelines laid down by the Govt. of Punjab, Department of Science Technology and Environment vide order dated 25/07 /2008 as amended on 30/10/2009.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under: -

S.No.	Item	Details						
1.	Online Proposal No.	S	SIA/PB/MIS/136532/2020					
2.	Name and Location of the	Ci	ty of Dream	ıs-5				
	project	lo	cated at Vill	age Santemajra, K	(harar			
3.	Latitude & Longitude	Co	orners coord	linates:				
			Corner	Latitude	Longitude			
			Corner-A	30°43'28.14"N	76°39'22.56"E			
			Corner-B	30°43'26.21"N	76°39'22.58"E			
			Corner-C	30°43'22.48"N	76°39'31.65"E			
			Corner-D	30°43'29.85"N	76°39'36.61"E			
4.	Project/activity covered under	Sr	.No. 8(a) 'E	Building & Constru	ction Project'			
	item of scheduled to the EIA							
	Notification,14.09.2006							
5.	Whether the project is in	N	lo					
	critical polluted area or not.							

6.	Does t	the project i	involve	No						
	divers	ion of forest	t land? If							
	yes,									
	a. Exte	ent of the fo	orest land.							
	b. S	tatus of	the forest							
	cleara	nce.								
7.	Does	the project	cover under	No						
	PLPA,	1900								
8.			fall within 10	No						
	km d	of eco-sen	sitive area/							
	Nation	nal park,	/Wild Life							
	Sanctı									
9.	Classific	cation/Land		Resid	dent	ial zone	e			
	_	tern as per								
	Master	Plan								
10.	Cost of	the project		Rs. 6	0 Cı	rores				
								1		
11.			lt- up Area and	l	0.	Descri	•	Area		
	Green a	area		1.				3573	39 m <sup>2</sup>	
							scheme area)			
				'			72 m <sup>2</sup>			
				3. Green area 5394 n						
12.	EC fee			Rs 120344/- Vide DD No 021370 dated 08.01.2020						
13.	Populat			2877	Pers	ons.				
		fully operati								
14.		•					d of 15-20			water
	Constru	uction Phase	2				Il be met from	treate	ed wastev	water
				of ST	TP of	MC KI	harar.			
15.	Break-ι	up of Wate	r Requiremen	ts &s	ourc	e in (	Operation Phase	e (Su	mmer, R	lainy,
	Winter)	):								
	S.No.	Season	Fresh water			Reuse	e water		Total	
			Domestic (KL	.D)		Flush	ing (KLD)		(KLD)	
	1.	Summer	257			127			384	
	2.	Winter	257			127			384	
	3.	Rainy	257			127			384	
	S.No.	Season	Basis		Gre	een	Treated			
					Are	ea	wastewater			
							requirement			
		Unit	ltr/sqm/day		(so	m)	KLD			
		I	, , , , , , ,				L			

	1.	Summer	5.5	5	394	30		
	2.	Winter	1.8 ltr/sqm/		394	9		
	3	Dainy	0 ltr/sqm/da		394	0		
	Source:	Rainy	U Iu/Sqiii/ud	ay 3	133 <del>1</del>	l o		I
	S.No.		ion		Sourc	e of wate	r	
	1.	Domest			Borev		•	
	2		j purposes			ed wastev	vater	
16.	<u> </u>	ent & Dispo	•	Wastewa			2.4 KLD) will	be treated
		•	astewater in		_	-	ted wastewa	
	_	iction Phase		•		tion purpo		
					•			
	Handlin	g of was	ste material	Earth so	il shall	be stacke	d and re used	for filling
	during	construction	n phase	low-lying	g areas	. Brick & d	other solid wa	ste generated
				during c	onstruc	ction perio	d shall be fur	ther reused in
				paveme	nt & ro	ads.		
17.	Disposa	l Arranc	jement of	Total w	actowa	tor gener	ation will be	307 KID
17.		_	eration Phase			_	roposed STP	
	VVasicv	rater in Ope	ration i nasc			-	ed within th	
							eated waste	
				•			ted wastewa	
				as unde				.ee g.: e.:
				Seaso	n F	lushing	Green	Sewer
						(KLD)	area	(KLD)
							(KLD)	
				Summ	er 1	127	30	150
				Winter	- 1	127	9	171
				Monso	on 1	127	0	180
18.	Rainwa	ter rechargi	ina	18286 m <sup>3</sup>	/hr rai	nwater wi	Il be collecte	d in 13 no. of
	Detail	3	_			rging pits.		
19.	Solid wa	aste genera	ition and its	a) 1142	kg/day	,		
	Disposa	ıl		b) Solid	wastes	will be a	ppropriately s	segregated (at
				sourc	e by p	providing	bins) into re	ecyclable, Bio-
				degra	dable (	Componer	its and non-b	iodegradable.
				c) Bio-d	egrada	ble will b	oe Converted	l into Manure
				throu	gh med	chanical co	omposter	
				-	_		•	vill be Handed
2.5		:	•				ste pickers.	
20.			opment Plan	Total 46	5 no. o	f trees wil	I be planted.	
		_	trees to be					
	planted	& its speci	es.					

21.	Energy Requirements	Total 465 no. of trees will be planted against the requirement of 447 tree (i.e. 1 tree @ 80 sqm of land area of 35739 sqm)  (To a query of SEAC, the project proponent submitted a revised layout plan providing details of the trees to be planted inside the project).  Used oil from DG sets will be sold to registered recyclers and E-waste will be disposed of as per the E-waste (Management) Amendment Rules 2018.  a) 2900 KW from PSPCL. b)1x500, 2x 125 KVA & 63 KVA capacity (silent DG						
		set)  Energy Saving  i) Solar Lig  ii) Common  Replace  iii) Energy  100 liter  Energy  daily=	measures ght10No n area (30 d with LE Saving @2 rs solar he Saved fo 500 x220 = 30 KWH	5: = 15KWH 00) lights (60 D (15) = 2200 KWH a eated water or 500 lit h 00/100 = 1	HD 0W) 162 KWHD Innually with			
23.	Environment Management Plan along with Budgetary breakup phase-wise and responsibility to implement	Description	Capital cost (lakhs)	Recurring cost (lakhs)  5.0  10.25	Monitoring of Air, Noise, water (per annum) Rs. 5.90			
Enviro 36 lak IA.III treatn								

### 3.0 Recommendations

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations to grant Environmental Clearance for the establishment of the project namely "City of Dreams- 5" having built-up area of 60172 sqmin total land area of 35739 sqm located at village Santemajra, Kharar, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures, conditions prescribed in Annexure-I of the proceedings subject to following additions, amendments and deletions given as under:

### Conditions to be added in the Annexure-I as under: -

i) The project proponent shall plant 465 no. of trees of native varieties within the project as per the guidelines of MoEF/SEIAA.

### Conditions to be amended in the Annexure-I as under: -

# Condition no. iv), v-a) &xv) of III. Water quality monitoring and preservation

- iv) The total domestic water requirement for the project will be 384 KLD, out of which 257 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 307 KLD, which will be treated in STP of capacity @ 460 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr. No.	Season	For Flushing purposes (KLD)	Green Area (KLD)	Into Sewer* (KLD)
1.	Summer	127	30	150
2.	Winter	127	9	171
3.	Rainy	127	0	180

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 13nos of rainwater harvesting recharge pits shall be provided for groundwater recharging as per CGWA norms. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

### Condition no. i) & iv) of X of Corporate Environment Responsibility

- i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least minimum amount of Rs. 36,00,000/- for providing wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 166.0 Lacs towards the capital cost and Rs 10.90 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 17.15 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Sahil Bansal, GM of the promoter company.
- ii) Sh. Deepak Gupta, Environmental Advisor of the project proponent
- iii) Sh. Sital Singh, EIA Coordinator, M/s Chandigarh Pollution Testing Laboratory, Phase VII, Industrial Area, Mohali.

During the meeting, SEIAA asked the project proponent to provide the chute system for segregation of solid waste in the project to which he agreed for the same.

During discussions, representative of the promoter company agreed to comply with fully all the conditions as mentioned by SEAC.

The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for the establishment of the project namely "City of Dreams- 5" having built-up area of 60172 sqm in total land area of 35739 sqm located at village Santemajra, Kharar, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures and with following conditions as recommended by SEAC & certain amendments therein & agreed by the Project Proponent:

# I. Statutory compliance:

- i) The project proponent shall obtain all necessary clearances/ permissions from all relevant agencies including town planning authority before commencement of work. All the construction shall be done in accordance with the local building byelaws.
- ii) The approval of the Competent Authority shall be obtained for the structural safety of buildings due to earthquakes, adequacy of firefighting equipment etc as per National Building Code including protection measures from lightening etc.
- iii) The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.
- iv) The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.
- v) The project proponent shall obtain Consent to Establish / Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the Punjab Pollution Control Board.
- vi) The project proponent shall obtain the necessary permission for drawl of groundwater/ surface water required for the project from the competent authority.
- vii) A certificate of adequacy of available power from the agency supplying power to the project along with the load allowed for the project should be obtained.
- viii) All other statutory clearances such as the approvals for storage of diesel from Chief Controller of Explosives, Fire Department, Civil Aviation Department shall be obtained, as applicable, by project proponents from the respective competent authorities.
- ix) The provisions of the Solid Waste (Management) Rules, 2016, E-Waste (Management) Rules, 2016, Construction & Demolition Waste Rules, 2016 and the Plastics Waste (Management) Rules, 2016 shall be followed.

- x) The project proponent shall follow the ECBC/ECBC-R prescribed by the Bureau of Energy Efficiency, Ministry of Power strictly.
- xi) The project site shall conform to the suitability as prescribed under the provisions laid down under the master plan of respective city/ town. For that, the project proponent shall either submit the NOC/ land use conformity certificate from Deptt of Town and Country Planning or other concerned Authority under whose jurisdiction, the site falls.
- xii) Besides above, the project proponent shall also comply with siting criteria / guidelines, standard operating practices, code of practice and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of projects.
- xiii) The project proponent shall get the layout plans approved from the Competent Authority for the activities/establishments to be set up at the project site in consonance with the project proposal for which this environment clearance is applied.

### II. Air quality monitoring and preservation

- i) Notification GSR 94(E) dated 25.01.2018 of MoEF&CC regarding Mandatory Implementation of Dust Mitigation Measures for Construction and Demolition Activities for projects requiring Environmental Clearance shall be complied with.
- ii) A management plan shall be drawn up and implemented to contain the current exceedance in ambient air quality at the site.
- iii) The project proponent shall install a system to carryout Ambient Air Quality monitoring for common /criterion parameters relevant-to the main pollutants released (e.g. PM10 and PM2.5) covering upwind and downwind directions during the construction period.
- iv) Diesel power generating sets proposed as source of backup power should be of enclosed type and conform to rules made under the Environment (Protection) Act, 1986. The height of stack of DG sets should be equal to the height needed for the combined capacity of all proposed DG sets. Use of low sulphur diesel should be ensured. The location of the DG sets may be decided in consultation with Punjab Pollution Control Board.
- v) Construction site shall be adequately barricaded before the construction begins. Dust, smoke & other air pollution prevention measures shall be provided for the building as well as the site. These measures shall include screens for the building under construction, continuous dust/ wind breaking walls all around the site (at least 3m height or 1/3rd of the building height and maximum upto 10m). Plastic/tarpaulin sheet covers shall be provided for vehicles bringing in sand, cement, murram, and other construction materials prone to causing dust pollution at the site as well as taking out debris from the site.
- vi) No Excavation of soil shall be carried out without adequate dust mitigation measures in place.

- vii) No loose soil or sand or construction & demolition waste or any other construction material that causes dust shall be left uncovered.
- viii) No uncovered vehicles carrying construction material and waste shall be permitted.
- ix) All the topsoil excavated during construction activities should be stored for use in horticulture / landscape development within the project site.
- x) Grinding and Cutting of building material in open area shall be prohibited. Wet jet shall be provided for grinding and stone cutting.
- xi) Unpaved surfaces and loose soil shall be adequately sprinkled with water to suppress dust.
- xii) All construction and demolition debris shall be stored at the site within earmarked area and road side storage of construction material and waste shall be prohibited. All demolition and construction waste shall be managed as per the provisions of the Construction and Demolition Waste Rules 2016.
- xiii) The diesel generator sets to be used during construction phase shall be low sulphur diesel type and shall conform to the standards as enumerated in the Environmental (Protection) Rules, 1986 as prescribed for air and noise emission.
- xiv) The gaseous emissions from DG set shall be dispersed through adequate stack height as per CPCB standards. Acoustic enclosure shall be provided to the DG sets to mitigate the noise pollution. Low sulphur diesel shall be used. The location of the DG set and exhaust pipe height shall be as per the provisions of the Central Pollution Control Board (CPCB) norms.
- xv) For indoor air quality the ventilation provisions as per National Building Code of India shall be followed.
- xvi) Roads leading to or at construction site must be paved and blacktopped (i.e. metallic road)
- xvii) Dust Mitigation measures shall be displayed prominently at the construction site for easy public viewing.
- xviii) Construction and Demolition Waste Processing and Disposal site shall be identified and required dust mitigation measure be notified at the site.

## III. Water quality monitoring and preservation

- i) The natural drain system should be maintained for ensuring unrestricted flow of water.
- ii) No construction shall be allowed to obstruct the natural drainage through the site, on wetland and water bodies. Check dams, bio-swales, landscape, and other sustainable urban drainage systems (SUDS) are allowed for maintaining the drainage pattern and to harvest rain water.
- iii) Buildings shall be designed to follow the natural topography as much as possible. Minimum cutting and filling should be done.

- iv) The total domestic water requirement for the project will be 384 KLD, out of which 257 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 307 KLD, which will be treated in STP of capacity @ 460 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*	
No.		purposes (KLD)	(KLD)	(KLD)	
1.	Summer	127	30	150	
2.	Winter	127	9	171	
3.	Rainy	127	0	180	

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

- b) Storage tank of adequate capacity shall be provided for the storage of treated wastewater and all efforts shall be made to supply the same for construction purposes.
- c) During construction phase, the project proponent shall ensure that the wastewater being generated from the labour quarters/toilets shall be treated and disposed in environment friendly manner. The project proponent shall also exercise the option of modular bio-toilets or will provide proper and adequately designed septic tanks for the treatment of such wastewater and treated effluents shall be utilized for green area/plantation
- vi) The project proponent shall ensure safe drinking water supply to the habitants. Adequate treatment facility for drinking water shall be provided, if required.
- vii) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- viii) A certificate shall be obtained from the local body supplying water, specifying the total annual water availability with the local authority, the quantity of water already committed, the quantity of water allotted to the project under consideration and the balance water available. This should be specified separately for groundwater and surface water sources, ensuring that there is no impact on other users.
- ix) At least 20% of the open spaces as required by the local building bye-Jaws shall be pervious. Use of Grass pavers, paver blocks with at least 50% opening, landscape etc. would be considered as pervious surface.

- x) Installation of dual pipe plumbing for supplying freshwater for drinking, cooking and bathing etc and other for supply of recycled water for flushing, landscape irrigation, car washing, thermal cooling, conditioning etc. shall be done.
- xi) The respective project proponent shall discourage the installation of R.O. plants in their projects in order to save the wastage in form of RO reject. However, in case the requirement of installing RO plant is utmost necessary then the rejected stream from the RO shall be separated and shall be utilized by storing the same within the particular component i.e. (Tower/Mall) or in a common place in the project premises.
- The project proponent shall also adopt the new/innovating technologies like less xii) water discharging taps (faucet with aerators)/urinals with electronic sensor system /water less urinals / twin flush cisterns/ sensor based alarming system for overhead water storage tanks and make it a part of the environmental management plans building plans SO as to reduce the consumption/groundwater abstraction in their Building Construction & Industrial projects.
- xiii) The project proponent will provide plumbing system for reuse of treated wastewater for flushing/ HVAC/ other purposes etc. and colour coding of different pipe lines carrying water/wastewater from different sources / treated wastewater as follows:

Sr. No	Nature of the Stream	Colour code
a)	Fresh water	Blue
b)	Untreated wastewater from Toilets/ urinal & from Kitchen	Black
c)	Untreated wastewater from Bathing/shower area, hand washing (Washbasin / sinks) and from Cloth Washing	Grey
d)	Reject water streams from RO plants & AC condensate (this is to be implemented wherever centralized AC system and common RO has been proposed in the Project). Further, in case of individual houses/establishment this proposal may also be implemented wherever possible.	White
e)	Treated wastewater (for reuse only for plantation purposes) from the STP treating black water	Green
f)	Treated wastewater (for reuse for flushing purposes or any other activity except plantation) from the STP treating grey water	Green with strips
g)	Storm water	Orange

- xiv) Water demand during construction should be reduced by use of pre-mixed concrete, curing agents and other best practices referred.
- xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage

capacity of minimum one day of total freshwater requirement shall be provided. Thus, 13 nos of rainwater harvesting recharge pits shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

- xvi) All recharge should be limited to shallow aguifer.
- xvii) No groundwater shall be used during construction phase of the project. Only treated sewage/wastewater shall be used. A proper record in this regard should be maintained and available at site.
- xviii) Any groundwater dewatering should be properly managed and shall conform to the approvals and the guidelines of the CGWA in the matter. Formal approval shall be taken from the CGWA for any groundwater abstraction or dewatering.
- xix) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- xx) Sewage shall be treated in the STP with tertiary treatment. STP shall be installed in phased manner viz a viz in module system designed in such a way so as to efficiently treat the wastewater with increase in its quantity due to rise in occupancy. The treated effluent from STP shall be recycled/re-used for flushing, AC make up water and gardening. No treated water shall be disposed of into municipal storm water drain.
- xxi) No sewage or untreated effluent water would be discharged through storm water drains. Onsite sewage treatment of capacity of treating 100% wastewater to be installed. The installation of the Sewage Treatment Plant (STP) shall be certified by an independent expert and a report in this regard shall be submitted to the Ministry before the project is commissioned for operation. Treated wastewater shall be reused on site for landscape, flushing, cooling tower, and other end-uses. Excess treated water shall be discharged as per statutory norms notified by Ministry of Environment, Forest and Climate Change. Natural treatment systems shall be promoted.
- xxii) Periodical monitoring of water quality of treated sewage shall be conducted. Necessary measures should be made to mitigate the odour problem from STP.
- xxiii) Sludge from the onsite sewage treatment, including septic tanks, shall be collected, conveyed and disposed of as per the Ministry of Urban Development, Central Public Health and Environmental Engineering Organization (CPHEEO) Manual on Sewerage and Sewage Treatment Systems, 2013.

## IV. Noise monitoring and prevention

- i) Ambient noise levels shall conform to residential area/commercial area/industrial area/silence zone both during day and night as per Noise Pollution (Control and Regulation) Rules, 2000. Incremental pollution loads on the ambient air and noise quality shall be closely monitored during construction phase. Adequate measures shall be made to reduce ambient air and noise level during construction phase, so as to conform to the stipulated standards by CPCB/SPCB.
- ii) Noise level survey shall be carried out as per the prescribed guidelines and report in this regard shall be submitted to Regional Office of the Ministry as a part of sixmonthly compliance report.
- iii) Acoustic enclosures for DG sets, noise barriers for ground-run bays, ear plugs for operating personnel shall be provided as mitigation measures for noise impact due to ground sources.

## V. Energy Conservation measures

- i) Compliance with the Punjab Energy Conservation Building Code (PECBC) of Energy Efficiency shall be ensured.
- ii) Outdoor and common area lighting shall be LED.
- iii) Concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc. shall be incorporated in the building design. Wall, window, and roof uvalues shall be as per ECBC specifications.
- iv) Energy conservation measures like installation of LEDs for lighting the area outside the building should be integral part of the project design and should be in place before project commissioning.
- v) Solar, wind or any other Renewable Energy equipment shall be installed to meet electricity generation equivalent to at least 1% of the demand load or as per the state level/ local building bye-laws requirement, whichever is higher.
- vi) Solar power by utilizing at least 30% of the rooftop area shall be used for lighting in the apartment to reduce the power load on grid. Separate electric meter shall be installed for solar power.

### VI. Waste Management

- ii) A certificate from the competent authority handling municipal solid wastes, indicating the existing civic capacities of handling and their adequacy to cater to the M.S.W. generated from project shall be obtained.
- iii) Disposal of muck during construction phase shall not create any adverse effect on the neighbouring communities and be disposed of taking the necessary precautions for general safety and health aspects of people, only in approved sites with the approval of competent authority.

- iv) Chute system, separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- v) Organic waste compost/ Vermiculture pit/ Organic Waste Converter within the premises with a minimum capacity of 0.3 kg /person/day must be installed for treatment and disposal of the waste.
- vi) All non-biodegradable waste shall be handed over to authorized recyclers for which a written tie up must be done with the authorized recyclers.
- vii) Any hazardous waste generated during construction phase, shall be disposed of as per applicable rules and norms with necessary approvals of the State Pollution Control Board.
- viii) Use of environment friendly materials in bricks, blocks and other construction materials, shall be required for at least 20% of the construction material quantity. These include Fly Ash bricks, hollow bricks, AACs, Fly Ash Lime Gypsum blocks, Compressed earth blocks, and other environment friendly materials.
- ix) Fly ash should be used as building material in the construction as per the provision of Fly Ash Notification of September, 1999 and amended as on 27th August, 2003 and 25th January, 2016. Ready mixed concrete must be used in building construction.
- x) Any wastes from construction and demolition activities related thereto shall be managed in such a way so as to strictly conform to the Construction and Demolition Rules, 2016.
- xi) Used CFLs and TFLs should be properly collected and disposed off/sent for recycling as per the prevailing guidelines/ rules of the regulatory authority to avoid mercury contamination.

#### VII. Green Cover

- i) No tree shall be felled/transplanted unless extreme exigencies demand. Where absolutely necessary, tree felling shall be with prior permission from the concerned regulatory authority. Old trees should be retained based on girth and age regulations as may be prescribed by the Forest Department. Plantations to be ensured species (cut) to species (planted).
- ii) At least single line plantation all around the boundary of the project as proposed shall be provided. The open spaces inside the plot should be suitably landscaped and covered with vegetation of indigenous species/variety. A minimum of one tree for every 80 sqm of total project land should be planted and maintained. The existing trees will be counted for this purpose. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping. The plantation should be provided as per SEIAA guidelines.

- Where the trees need to be cut with prior permission from the concerned local Authority, compensatory plantation in the ratio of 1: 10 (i.e. planting of 10 trees for every 1 tree that is cut) shall be done and maintained. Plantations to be ensured species (cut) to species (planted). Area for green belt development shall be provided as per the details provided in the project document.
- iv) Topsoil should be stripped to a depth of 20 cm from the areas proposed for buildings, roads, paved areas, and external services. It should be stockpiled appropriately in designated areas and reapplied during plantation of the proposed vegetation on site.
- v) The project proponent shall not use any chemical fertilizer /pesticides /insecticides and shall use only Herbal pesticides/insecticides and organic manure in the green area.
- vi) The green belt along the periphery of the plot shall achieve attenuation factor conforming to the day and night noise standards prescribed for residential land use.

### VIII. Transport

- i) A comprehensive mobility plan, as per MoUD best practices guidelines (URDPFI), shall be prepared to include motorized, non-motorized, public, and private networks. Road should be designed with due consideration for environment, and safety of users. The road system can be designed with these basic criteria.
  - a) Hierarchy of roads with proper segregation of vehicular and pedestrian traffic.
  - b) Traffic calming measures.
  - c) Proper design of entry and exit points.
  - d) Parking norms as per local regulation.
- ii) Vehicles hired for bringing construction material to the site should be in good condition and should have a pollution check certificate and should conform to applicable air and noise emission standards and be operated only during non-peak hours.
- iii) A detailed traffic management and traffic decongestion plan shall be drawn up to ensure that the current level of service of the roads within a 05 kms radius of the project is maintained and improved upon after the implementation of the project. This plan should be based on cumulative impact of all development and increased habitation being carried out or proposed to be carried out by the project or other agencies in this 05 Kms radius of the site in different scenarios of space and time and the traffic management plan shall be duly validated and certified by the State Urban Development department and the P.W.D./ competent authority for road augmentation and shall also have their consent to the implementation of components of the plan which involve the participation of these departments.

iv) Traffic congestion near the entry and exit points from the roads adjoining the proposed project site must be avoided. Parking should be fully internalized and no public space should be utilized.

#### IX. Human health issues

- i) All workers working at the construction site and involved in loading, unloading, carriage of construction material and construction debris or working in any area with dust pollution shall be provided with dust mask.
- ii) For indoor air quality the ventilation provisions as per National Building Code of India shall be strictly followed.
- iii) Emergency preparedness plan based on the Hazard identification and Risk Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.
- iv) Occupational health surveillance of the workers shall be done on a regular basis.
- v) A First Aid Room shall be provided in the project both during construction and operations of the project.

### X. Corporate Environment Responsibility

- i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least minimum amount of Rs. 36,00,000/- for providing wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.
- ii) The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions to all shareholders / stake holders. The copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of six-monthly report.
- iii) A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for

any other purpose. The project proponent shall spend a minimum amount of Rs 166.0 Lacs towards the capital cost and Rs 10.90 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 17.15 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier.

#### XII. Miscellaneous

- i) The project proponent before allowing any occupancy shall obtain completion and occupancy certificate from the Competent Authority and submit a copy of the same to SEIAA, Punjab.
- ii) The project proponent shall comply with the conditions of CLU.
- iii) The project proponent shall prominently advertise it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days indicating that the project has been accorded environment clearance and the details of MoEF&CC /SEIAA website where it is displayed.
- iv) The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- v) The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.
- vi) The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the Ministry of Environment, Forest and Climate Change at Environment Clearance portal.
- vii) The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii) The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned

- authorities, commencing the land development work and start of production /operation by the project.
- ix) The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.
- x) The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- xi) No further expansion or modifications in the plant/project shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).
- xii) Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiii) The SEIAA/Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xiv) The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xv) The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data/ information/monitoring reports.
- xvi) The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvii) Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

### Conditions to be added in the Annexure-I as under: -

i) The project proponent shall plant 465 no. of trees of native varieties within the project as per the guidelines of MoEF/SEIAA.

Item No. 164.12 Application for Environmental Clearance under EIA notification dated 14.09.2006 for the establishment of Group Housing Project Primegate Tower located at Village Singhpura, Zirakpur by M/s PRIMEGATE DEVELOPERS (INDIA) (Proposal No. SIA/PB/MIS/136539/2020).

SEIAA observed as under:

## 1.0 Background

The project proponent has filed an application for obtaining Environment Clearance under EIA notification, 2006 for the establishment of a Group Housing Project Primegate Tower located at Village Singhpura, Zirakpur, Tehsil Dera Bassi, Distt. SAS Nagar.

# 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020. SEAC observed that the Environmental Engineer, PPCB, Nodal Office, Mohali vide letter no 1153 dated 14.02.2020 has intimated that no construction work has been started by the promoter company and boundary has been demarcated. The site of the project was conforming to the siting guidelines laid down by the Govt. of Punjab, Department of Science Technology and Environment vide order dated 25/07 /2008 as amended on 30/10/2009.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under:-

S.No.	Item	Details						
1.	Online Proposal No.	SIA/PB/MIS/136539/2020						
2.	Name and Location of the		megate Tov	<i>v</i> er				
	project	loc	ated at Villa	ige Singhpura, Zira	akpur			
3.	Latitude & Longitude	Co	rners coordi	nates:				
			Corner	Latitude	Longitude			
			Corner-A	30°37'29.96"N	76°49'10.89"E			
			Corner-B	30°37'20.74"N	76°49'08.67"E			
			Corner-C	30°37'20.52"N	76°49'12.32"E			
			Corner-D	30°37'29.93"N	76°49'12.96"E			
4.	Project/activity covered under item of scheduled to the EIA Notification,14.09.2006	S	.No. 8(a) `B	uilding & Construc	tion Project'			

5.		r the project is d area or not.	s in critical	No						
6.	Does the diversion a. External	ne project invol on of forest lan nt of the forest	d? If yes, land.	No						
7.	b. Status of the forest clearance.  Does the project cover under PLPA, 1900									
8.	Does the project fall within 10 km of eco-sensitive area/ National park/Wild Life Sanctuary?									
9.		ation/Land us Naster Plan	se pattern	Reside	ential	zone				
10.	Cost of	the project		Rs. 70	Cror	es				
11.	Total Pl	lot area, Built	- up Area	S.No.	De	scriptio	n	Area		
	and Gre	en area		1.	Plo	t area		26244	1 m <sup>2</sup>	
					(To	otal sch	eme area)			
				2.	Bu	ilt-up a	rea	75786	75786 m <sup>2</sup>	
				3.	Gr	Green area		6561 m <sup>2</sup>		
12	EC fee c	details		Rs 151576/- DD No. 000887 dated 10.01.2020						
13.	Populati	on		1360 Persons.						
	(when f	ully operationa	l)							
14.	Water I	Water Requirements &source in			Water demand of 15 KLD. The water requirement					
	Constru	ction Phase		will be met from treated wastewater of STP of MC Zirakpur.						
15.	Break-u Winter)	p of Water R	Requiremer	nts & s	ource	in Op	eration Pha	ise (Su	ummer, Ra	iny,
	S.No.	Season	Fresh wa	iter		Reuse water			Total	
			Domestic	(KLD)		Flushing (KLD)			(KLD)	
	1.	Summer	123	6		61	 1		184	_
	2.	Winter	123			61			184	
	3.	Rainy	123						184	
		1 2 /	-							
	S.No.	Season	Basis		Gree Area					
					•		requiremen			
			ltr/sqm/da	ay (sqm)		n)	KLD			
	1.	Summer	5.5		6561		36			
	2.	Winter	1.8 ltr/sqr	n/day			10			
	3	Rainy	0 ltr/sqm/	day	6561		0			

	S.No.	Description	Source of water				
	1.	Domestic	Borewell				
	2	Flushing purposes	Treated wastewater				
	3	Green Area	Treated wastewater				
16.	Treatmen	t & Disposal	Wastewater generated (2.4 KLD) will be treated in				
	arrangem	ents of wastewater	septic tan	k and treated v	vastewater will	be used for	
	in Constru	uction Phase	plantation	purposes.			
		of waste material		shall be stacked			
	auring co	nstruction phase			_	enerated during	
			pavement	on period shall	be further reus	seu III	
			pavement	& Todus.			
17.	Disposal	Arrangement of	Total wast	tewater genera	tion will be 147	7 KI D which	
17.	Wastewat	-		ated in propose			
	Phase	op		alled within the		• •	
				astewater and c			
				er is given as u	_		
			Season	Flushing	Green area	Sewer	
				(KLD)	(KLD)	(KLD)	
			Summer	61	36	50	
			Winter	61	10	76	
			Monsoon	61	0	86	
			To a query of SEAC, the project proponent submitted an affidavit to the effect that he would submit the required EDC fee for the project with the concerned competent authority for laying of sewerage pipeline. In case, the concerned authority is unable to provide the project proponent the sewerage pipelines, the project proponent would connect it from their own end to the STP of MC, Zirakpur which is at a distance of about 25 m from the project. The project proponent has also submitted that no possession would be given till the project proponent lays the sewerage line upto the STP.				
18.	Rainwate Detail	r recharging	11070 m <sup>3</sup> /hr rainwater will be collected in 16 no. of Rainwater recharging pits.				
19.	Solid was	ste generation and al	a) 544 kg/day b) Solid wastes will be appropriately segregated (at source by providing bins) into recyclable, Biodegradable Components and non-biodegradable.				

			c) Bio-degrad through me d) Non-biodeg to authorize	echanical o gradable o	composter r dry waste w		
20.		Hazardous Waste &E- Waste	Used oil from DG sets will be sold to registered recyclers and E-waste will be disposed of as per the E-waste (Management) Amendment Rules 2018.				
20.		Green Belt Development Plan including no. of trees to be planted & its species.					
21.		Energy Requirements & Saving	a) 1500 KW from PSPCL. b)1x 63 KVA, 2x 240& 500 KVA capacity (silent DG set)				
			Energy Saving measures:  Solar Light 10 No = 15 KWHD  Common area (250) lights replaced with LED = 135  KWHD  Total Energy saved/day 15+135 = 150 KWHD				
22.		Environment Management Plan along with Budgetary breakup phase-wise and responsibility to implement	·	Capital cost (lakhs)	Recurring cost (lakhs)	Monitorir Air, water annum) I	Noise, (per
			Construction	83.50	5.0	2.25	
23		CED activities along with budg	Operation	and rooms	9.5	2.70	
23							

# 3.0 Recommendations

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations

to grant Environmental Clearance for the establishment of the project namely "Primegate Tower" having a built-up area of 75786 sqm in total land area of 26244 sqm located at village Singhpura, Zirakpura, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures, conditions prescribed in **Annexure-I of the proceedings** subject to following additions, amendments and deletions given as under:

### Conditions to be added in the Annexure-I as under: -

- i) In case, the Municipal Council, Zirakpur is not able to lay down the sewer line to connect the outlet of the STP with the STP of Municipal Council, Zirakpur, the project proponent shall lay down the sewer line at its own cost.
- ii) The project proponent shall not give possession of property till the time connection from outlet of STP is made with the STP of Municipal Council, Zirakpur.
- iii) The project proponent shall plant 340 no. of trees of native varieties within the project as per the guidelines of MoEF/SEIAA.

#### Conditions to be amended in the Annexure-I as under: -

### Condition no. iv), v-a) &xv) of III. Water quality monitoring and preservation

- iv) The total domestic water requirement for the project will be 184 KLD, out of which 123 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 147 KLD, which will be treated in STP of capacity @ 220 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)	(KLD)	(KLD)
1.	Summer	61	36	50
2.	Winter	61	10	76
3.	Rainy	61	0	86

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 16 nos of rainwater harvesting recharge pits shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

# Condition no. i) & iv) of X of Corporate Environment Responsibility

- i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least a minimum amount of Rs. 42,00,000/- for providing wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 83.50 Lacs towards the capital cost and Rs 7.25 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 12.20 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Sahil Gupta, CEO of the promoter company
- ii) Sh. Deepak Gupta, Environment Advisor of the project proponent
- iii) Sh. Sital Singh, EIA Coordinator, M/s Chandigarh Pollution Testing Laboratory, Phase VII, Industrial Area, Mohali

During the meeting, the following observations were made to which project proponent replied as under:

Sr.	Observations	Reply		
No				
1.	•	The forest permission is not required as the project does not fall on any National		
		Highway/State Highway. The project		

		proponent showed the location of the project to the SEIAA and SEIAA was satisfied with the same.
2.	What is the distance of the site from the Sukhna Wildlife Sanctuary and City Bird Wild life Sanctuary?	Distance is more than 10 km.
3.	The chute system should be provided in the project.	The project proponent agreed to the same.
4.	How far is the sewer of the existing area from the project?	The sewer passes at the distance of 265 mtr from the project. The project proponent will connect the outlet of STP with the STP of Municipal Council Zirakpur at its own cost in case the Municipal Council Zirakpur fails to lay down the sewer line upto the project.

During discussions, representative of the promoter company agreed to comply with fully all the conditions as mentioned by SEAC.

The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for the establishment of the project "Primegate Tower" having built-up area of 75786 sqmin total land area of 26244 sqm located at village Singhpura, Zirakpur, Distt. SAS Nagar as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures and with following conditions as recommended by SEAC & certain amendments therein & agreed by the Project Proponent:

### I. Statutory compliance:

- i) The project proponent shall obtain all necessary clearances/ permissions from all relevant agencies including town planning authority before commencement of work. All the construction shall be done in accordance with the local building byelaws.
- ii) The approval of the Competent Authority shall be obtained for the structural safety of buildings due to earthquakes, adequacy of firefighting equipment etc as per National Building Code including protection measures from lightening etc.
- iii) The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.

- iv) The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.
- v) The project proponent shall obtain Consent to Establish / Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the Punjab Pollution Control Board.
- vi) The project proponent shall obtain the necessary permission for drawl of groundwater/ surface water required for the project from the competent authority.
- vii) A certificate of adequacy of available power from the agency supplying power to the project along with the load allowed for the project should be obtained.
- viii) All other statutory clearances such as the approvals for storage of diesel from Chief Controller of Explosives, Fire Department, Civil Aviation Department shall be obtained, as applicable, by project proponents from the respective competent authorities.
- ix) The provisions of the Solid Waste (Management) Rules, 2016, E-Waste (Management) Rules, 2016, Construction & Demolition Waste Rules, 2016 and the Plastics Waste (Management) Rules, 2016 shall be followed.
- x) The project proponent shall follow the ECBC/ECBC-R prescribed by the Bureau of Energy Efficiency, Ministry of Power strictly.
- xi) The project site shall conform to the suitability as prescribed under the provisions laid down under the master plan of respective city/ town. For that, the project proponent shall either submit the NOC/ land use conformity certificate from Deptt of Town and Country Planning or other concerned Authority under whose jurisdiction, the site falls.
- xii) Besides above, the project proponent shall also comply with siting criteria / guidelines, standard operating practices, code of practice and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of projects.
- xiii) The project proponent shall get the layout plans approved from the Competent Authority for the activities/establishments to be set up at the project site in consonance with the project proposal for which this environment clearance is applied.

# II. Air quality monitoring and preservation

- i) Notification GSR 94(E) dated 25.01.2018 of MoEF&CC regarding Mandatory Implementation of Dust Mitigation Measures for Construction and Demolition Activities for projects requiring Environmental Clearance shall be complied with.
- ii) A management plan shall be drawn up and implemented to contain the current exceedance in ambient air quality at the site.
- iii) The project proponent shall install a system to carryout Ambient Air Quality monitoring for common /criterion parameters relevant-to the main pollutants

- released (e.g. PM10 and PM2.5) covering upwind and downwind directions during the construction period.
- iv) Diesel power generating sets proposed as source of backup power should be of enclosed type and conform to rules made under the Environment (Protection) Act, 1986. The height of stack of DG sets should be equal to the height needed for the combined capacity of all proposed DG sets. Use of low sulphur diesel should be ensured. The location of the DG sets may be decided in consultation with Punjab Pollution Control Board.
- v) Construction site shall be adequately barricaded before the construction begins. Dust, smoke & other air pollution prevention measures shall be provided for the building as well as the site. These measures shall include screens for the building under construction, continuous dust/ wind breaking walls all around the site (at least 3m height or 1/3rd of the building height and maximum upto 10m). Plastic/tarpaulin sheet covers shall be provided for vehicles bringing in sand, cement, murram, and other construction materials prone to causing dust pollution at the site as well as taking out debris from the site.
- vi) No Excavation of soil shall be carried out without adequate dust mitigation measures in place.
- vii) No loose soil or sand or construction & demolition waste or any other construction material that causes dust shall be left uncovered.
- viii) No uncovered vehicles carrying construction material and waste shall be permitted.
- ix) All the topsoil excavated during construction activities should be stored for use in horticulture / landscape development within the project site.
- x) Grinding and Cutting of building material in open area shall be prohibited. Wet jet shall be provided for grinding and stone cutting.
- xi) Unpaved surfaces and loose soil shall be adequately sprinkled with water to suppress dust.
- xii) All construction and demolition debris shall be stored at the site within earmarked area and road side storage of construction material and waste shall be prohibited. All demolition and construction waste shall be managed as per the provisions of the Construction and Demolition Waste Rules 2016.
- xiii) The diesel generator sets to be used during construction phase shall be low sulphur diesel type and shall conform to the standards as enumerated in the Environmental (Protection) Rules, 1986 as prescribed for air and noise emission.
- xiv) The gaseous emissions from DG set shall be dispersed through adequate stack height as per CPCB standards. Acoustic enclosure shall be provided to the DG sets to mitigate the noise pollution. Low sulphur diesel shall be used. The location of the DG set and exhaust pipe height shall be as per the provisions of the Central Pollution Control Board (CPCB) norms.

- xv) For indoor air quality the ventilation provisions as per National Building Code of India shall be followed.
- xvi) Roads leading to or at construction site must be paved and blacktopped (i.e. metallic road)
- xvii) Dust Mitigation measures shall be displayed prominently at the construction site for easy public viewing.
- xviii) Construction and Demolition Waste Processing and Disposal site shall be identified and required dust mitigation measure be notified at the site.

# III. Water quality monitoring and preservation

- The natural drain system should be maintained for ensuring unrestricted flow of water.
- ii) No construction shall be allowed to obstruct the natural drainage through the site, on wetland and water bodies. Check dams, bio-swales, landscape, and other sustainable urban drainage systems (SUDS) are allowed for maintaining the drainage pattern and to harvest rain water.
- iii) Buildings shall be designed to follow the natural topography as much as possible. Minimum cutting and filling should be done.
- iv) The total domestic water requirement for the project will be 184 KLD, out of which 123 KLD shall be met through own tube well and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 147 KLD, which will be treated in STP of capacity @ 220 KLD on SBR technology within the project premises. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr.	Season	For Flushing	Green Area	Into Sewer*
No.		purposes (KLD)	(KLD)	(KLD)
1.	Summer	61	36	50
2.	Winter	61	10	76
3.	Rainy	61	0	86

<sup>\*</sup> Note: Surplus treated wastewater will be discharged into MC sewer as and when sewer connection is available with the project.

- b) Storage tank of adequate capacity shall be provided for the storage of treated wastewater and all efforts shall be made to supply the same for construction purposes.
- c) During construction phase, the project proponent shall ensure that the wastewater being generated from the labour quarters/toilets shall be treated and disposed in environment friendly manner. The project proponent shall

also exercise the option of modular bio-toilets or will provide proper and adequately designed septic tanks for the treatment of such wastewater and treated effluents shall be utilized for green area/plantation

- vi) The project proponent shall ensure safe drinking water supply to the habitants. Adequate treatment facility for drinking water shall be provided, if required.
- vii) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- viii) A certificate shall be obtained from the local body supplying water, specifying the total annual water availability with the local authority, the quantity of water already committed, the quantity of water allotted to the project under consideration and the balance water available. This should be specified separately for groundwater and surface water sources, ensuring that there is no impact on other users.
- ix) At least 20% of the open spaces as required by the local building bye-Jaws shall be pervious. Use of Grass pavers, paver blocks with at least 50% opening, landscape etc. would be considered as pervious surface.
- x) Installation of dual pipe plumbing for supplying freshwater for drinking, cooking and bathing etc and other for supply of recycled water for flushing, landscape irrigation, car washing, thermal cooling, conditioning etc. shall be done.
- xi) The respective project proponent shall discourage the installation of R.O. plants in their projects in order to save the wastage in form of RO reject. However, in case the requirement of installing RO plant is utmost necessary then the rejected stream from the RO shall be separated and shall be utilized by storing the same within the particular component i.e. (Tower/Mall) or in a common place in the project premises.
- xii) The project proponent shall also adopt the new/innovating technologies like less water discharging taps (faucet with aerators)/urinals with electronic sensor system /water less urinals / twin flush cisterns/ sensor based alarming system for overhead water storage tanks and make it a part of the environmental management plans / building plans so as to reduce the water consumption/groundwater abstraction in their Building Construction & Industrial projects.
- xiii) The project proponent will provide plumbing system for reuse of treated wastewater for flushing/ HVAC/ other purposes etc. and colour coding of different pipe lines carrying water/wastewater from different sources / treated wastewater as follows:

Sr. No	Nature of the Stream	Colour code
a)	Fresh water	Blue

b)	Untreated wastewater from Toilets/ urinal & from Kitchen	Black
c)	Untreated wastewater from Bathing/shower area, hand washing (Washbasin / sinks) and from Cloth Washing	Grey
d)	Reject water streams from RO plants & AC condensate (this is to be implemented wherever centralized AC system and common RO has been proposed in the Project). Further, in case of individual houses/establishment this proposal may also be implemented wherever possible.	White
e)	Treated wastewater (for reuse only for plantation purposes) from the STP treating black water	Green
f)	Treated wastewater (for reuse for flushing purposes or any other activity except plantation) from the STP treating grey water	Green with strips
g)	Storm water	Orange

- xiv) Water demand during construction should be reduced by use of pre-mixed concrete, curing agents and other best practices referred.
- xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 16 nos of rainwater harvesting recharge pits shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.
- xvi) All recharge should be limited to shallow aquifer.
- xvii) No groundwater shall be used during construction phase of the project. Only treated sewage/wastewater shall be used. A proper record in this regard should be maintained and available at site.
- xviii) Any groundwater dewatering should be properly managed and shall conform to the approvals and the guidelines of the CGWA in the matter. Formal approval shall be taken from the CGWA for any groundwater abstraction or dewatering.
- xix) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- xx) Sewage shall be treated in the STP with tertiary treatment. STP shall be installed in phased manner viz a viz in module system designed in such a way so as to efficiently treat the wastewater with increase in its quantity due to rise in occupancy. The treated effluent from STP shall be recycled/re-used for flushing, AC make up water and gardening. No treated water shall be disposed of into municipal storm water drain.

- xxi) No sewage or untreated effluent water would be discharged through storm water drains. Onsite sewage treatment of capacity of treating 100% wastewater to be installed. The installation of the Sewage Treatment Plant (STP) shall be certified by an independent expert and a report in this regard shall be submitted to the Ministry before the project is commissioned for operation. Treated wastewater shall be reused on site for landscape, flushing, cooling tower, and other end-uses. Excess treated water shall be discharged as per statutory norms notified by Ministry of Environment, Forest and Climate Change. Natural treatment systems shall be promoted.
- xxii) Periodical monitoring of water quality of treated sewage shall be conducted. Necessary measures should be made to mitigate the odour problem from STP.
- xxiii) Sludge from the onsite sewage treatment, including septic tanks, shall be collected, conveyed and disposed of as per the Ministry of Urban Development, Central Public Health and Environmental Engineering Organization (CPHEEO) Manual on Sewerage and Sewage Treatment Systems, 2013.

### IV. Noise monitoring and prevention

- i) Ambient noise levels shall conform to residential area/commercial area/industrial area/silence zone both during day and night as per Noise Pollution (Control and Regulation) Rules, 2000. Incremental pollution loads on the ambient air and noise quality shall be closely monitored during construction phase. Adequate measures shall be made to reduce ambient air and noise level during construction phase, so as to conform to the stipulated standards by CPCB/SPCB.
- ii) Noise level survey shall be carried out as per the prescribed guidelines and report in this regard shall be submitted to Regional Office of the Ministry as a part of sixmonthly compliance report.
- iii) Acoustic enclosures for DG sets, noise barriers for ground-run bays, ear plugs for operating personnel shall be provided as mitigation measures for noise impact due to ground sources.

# V. Energy Conservation measures

- i) Compliance with the Punjab Energy Conservation Building Code (PECBC) of Energy Efficiency shall be ensured.
- ii) Outdoor and common area lighting shall be LED.
- iii) Concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc. shall be incorporated in the building design. Wall, window, and roof uvalues shall be as per ECBC specifications.

- iv) Energy conservation measures like installation of LEDs for lighting the area outside the building should be integral part of the project design and should be in place before project commissioning.
- v) Solar, wind or any other Renewable Energy equipment shall be installed to meet electricity generation equivalent to at least 1% of the demand load or as per the state level/ local building bye-laws requirement, whichever is higher.
- vi) Solar power by utilizing at least 30% of the rooftop area shall be used for lighting in the apartment to reduce the power load on grid. Separate electric meter shall be installed for solar power.

# VI. Waste Management

- i) A certificate from the competent authority handling municipal solid wastes, indicating the existing civic capacities of handling and their adequacy to cater to the M.S.W. generated from project shall be obtained.
- ii) Disposal of muck during construction phase shall not create any adverse effect on the neighbouring communities and be disposed of taking the necessary precautions for general safety and health aspects of people, only in approved sites with the approval of competent authority.
- iii) Chute system, separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- iv) Organic waste compost/ Vermiculture pit/ Organic Waste Converter within the premises with a minimum capacity of 0.3 kg /person/day must be installed for treatment and disposal of the waste.
- v) All non-biodegradable waste shall be handed over to authorized recyclers for which a written tie up must be done with the authorized recyclers.
- vi) Any hazardous waste generated during construction phase, shall be disposed of as per applicable rules and norms with necessary approvals of the State Pollution Control Board.
- vii) Use of environment friendly materials in bricks, blocks and other construction materials, shall be required for at least 20% of the construction material quantity. These include Fly Ash bricks, hollow bricks, AACs, Fly Ash Lime Gypsum blocks, Compressed earth blocks, and other environment friendly materials.
- viii) Fly ash should be used as building material in the construction as per the provision of Fly Ash Notification of September, 1999 and amended as on 27th August, 2003 and 25th January, 2016. Ready mixed concrete must be used in building construction.
- ix) Any wastes from construction and demolition activities related thereto shall be managed in such a way so as to strictly conform to the Construction and Demolition Rules, 2016.

x) Used CFLs and TFLs should be properly collected and disposed off/sent for recycling as per the prevailing guidelines/ rules of the regulatory authority to avoid mercury contamination.

### VII. Green Cover

- i) No tree shall be felled/transplanted unless extreme exigencies demand. Where absolutely necessary, tree felling shall be with prior permission from the concerned regulatory authority. Old trees should be retained based on girth and age regulations as may be prescribed by the Forest Department. Plantations to be ensured species (cut) to species (planted).
- ii) At least single line plantation all around the boundary of the project as proposed shall be provided. The open spaces inside the plot should be suitably landscaped and covered with vegetation of indigenous species/variety. A minimum of one tree for every 80 sqm of total project land should be planted and maintained. The existing trees will be counted for this purpose. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping. The plantation should be provided as per SEIAA guidelines.
- iii) Where the trees need to be cut with prior permission from the concerned local Authority, compensatory plantation in the ratio of 1: 10 (i.e. planting of 10 trees for every 1 tree that is cut) shall be done and maintained. Plantations to be ensured species (cut) to species (planted). Area for green belt development shall be provided as per the details provided in the project document.
- iv) Topsoil should be stripped to a depth of 20 cm from the areas proposed for buildings, roads, paved areas, and external services. It should be stockpiled appropriately in designated areas and reapplied during plantation of the proposed vegetation on site.
- v) The project proponent shall not use any chemical fertilizer /pesticides /insecticides and shall use only Herbal pesticides/insecticides and organic manure in the green area.
- vi) The green belt along the periphery of the plot shall achieve attenuation factor conforming to the day and night noise standards prescribed for residential land use.

### VIII. Transport

- i) A comprehensive mobility plan, as per MoUD best practices guidelines (URDPFI), shall be prepared to include motorized, non-motorized, public, and private networks. Road should be designed with due consideration for environment, and safety of users. The road system can be designed with these basic criteria.
  - a) Hierarchy of roads with proper segregation of vehicular and pedestrian traffic.
  - b) Traffic calming measures.

- c) Proper design of entry and exit points.
- d) Parking norms as per local regulation.
- ii) Vehicles hired for bringing construction material to the site should be in good condition and should have a pollution check certificate and should conform to applicable air and noise emission standards and be operated only during non-peak hours.
- iii) A detailed traffic management and traffic decongestion plan shall be drawn up to ensure that the current level of service of the roads within a 05 kms radius of the project is maintained and improved upon after the implementation of the project. This plan should be based on cumulative impact of all development and increased habitation being carried out or proposed to be carried out by the project or other agencies in this 05 Kms radius of the site in different scenarios of space and time and the traffic management plan shall be duly validated and certified by the State Urban Development department and the P.W.D./ competent authority for road augmentation and shall also have their consent to the implementation of components of the plan which involve the participation of these departments.
- iv) Traffic congestion near the entry and exit points from the roads adjoining the proposed project site must be avoided. Parking should be fully internalized and no public space should be utilized.

### IX. Human health issues

- i) All workers working at the construction site and involved in loading, unloading, carriage of construction material and construction debris or working in any area with dust pollution shall be provided with dust mask.
- ii) For indoor air quality the ventilation provisions as per National Building Code of India shall be strictly followed.
- iii) Emergency preparedness plan based on the Hazard identification and Risk Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.
- iv) Occupational health surveillance of the workers shall be done on a regular basis.
- v) A First Aid Room shall be provided in the project both during construction and operations of the project.

### X. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1st May 2018, as applicable, regarding

- Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for CER activities for spending at least minimum amount of Rs. 42,00,000/- for providing wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.
- ii) The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions to all shareholders / stake holders. The copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of six-monthly report.
- iii) A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- Action plan for implementing EMP and environmental conditions along with the iv) responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 83.50 Lacs towards the capital cost and Rs 7.25 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 12.20 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/residents society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

# XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier.

#### XII. Miscellaneous

- i) The project proponent before allowing any occupancy shall obtain completion and occupancy certificate from the Competent Authority and submit a copy of the same to SEIAA, Punjab.
- ii) The project proponent shall comply with the conditions of CLU.
- iii) The project proponent shall prominently advertise it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days indicating that the project has been accorded environment clearance and the details of MoEF&CC /SEIAA website where it is displayed.
- iv) The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the

- same for 30 days from the date of receipt.
- v) The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.
- vi) The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the Ministry of Environment, Forest and Climate Change at Environment Clearance portal.
- vii) The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii) The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities, commencing the land development work and start of production /operation by the project.
- ix) The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.
- x) The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- xi) No further expansion or modifications in the plant/project shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change (MoEF&CC).
- xii) Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiii) The SEIAA/Ministry may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.
- xiv) The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xv) The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data/ information/monitoring reports.
- xvi) The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvii) Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

### **Additional Conditions: -**

- i) In case, the Municipal Council, Zirakpur is not able to lay down the sewer line to connect the outlet of the STP with the STP of Municipal Council, Zirakpur, the project proponent shall lay down the sewer line at its own cost.
- ii) The project proponent shall not give possession of property till the time connection from outlet of STP is made with the STP of Municipal Council, Zirakpur.
- iii) The project proponent shall plant 340 no. of trees of native varieties within the project as per the guidelines of MoEF/SEIAA.

Item No. 164.13 Application for issuance of TORs to M/s Saeco Strips Pvt. Ltd. for manufacturing of Steel Ingots/Billets with enhanced capacity of 92,400 TPA & Structural Steel (Round, Coil, Flats, Wire Rod, TMT Bars) with the capacity of 73,100 TPA using two no. of Induction Furnaces, One existing Induction Furnace of capacity 8 TPH & proposed Induction Furnace of the capacity of 15 TPH and a CCM respectively at Village- Doraha, Rampur road, Tehsil- Payal, District-Ludhiana, Punjab (Proposal No. SIA/PB/IND/41203/2019).

SEIAA observed as under:

# 1.0 Background

The project proponent has applied for issuance of TORs to M/s Saeco Strips Pvt. Ltd. for increasing the production capacity from 29,400 TPA to 92,400 TPA for manufacturing of Steel Ingots/Billets & Structural Steel (Round, Coil, Flats, Wire Rod, TMT Bars) with enhanced capacity of 73,100 TPA with one existing Induction Furnace of capacity 8 TPH & proposed Induction Furnace of the capacity of 15 TPH and a CCM respectively at Village- Doraha, Rampur road, Tehsil- Payal, District- Ludhiana, Punjab (Proposal No. SIA/PB/IND/41203/2019). The project is covered under Activity 3(a) & Category 'B1'.

The project proponent submitted the Form I (Appendix I), Pre-feasibility report, and other additional documents online on 20.08.2020. He has also deposited the requisite fee amounting to Rs. 60,100/- (25% of the total fee) through RTGS vide UTR No. CBINH9283139553 dated 10/10/2019 (V. R. No. 4370 dated 10.10.2019).

The application was scrutinized by the AEE & Essential Details were sought on 07/10/2019,17/02/2020 and 18/02/2020 to which he replied on 24.12.2019,17.02.2019 and 28.02.2020, respectively.

Environmental Engineer, PPCB, RO-2, Ludhiana was requested vide email dated 31.12.2019 & 03.02.2020 to send the construction status of the project site. Accordingly, he replied vide letter no 183 dated 12.02.2020 that the industry was visited on 10.02.2020 and it was observed as under: -

S.No.	Point	Reply				
1.	Construction/Installation status of the	The industry has not made any				
	expansion proposal of the proposed	expansion as on date.				
	project of the industry.					
2.	As to whether existing production is	The production is less than 30000				
	less than 30000 TPA. Please send the	TPA.				
	detailed report.					
3.	Distance of unit from the boundary of	8.3 KM as per DTP certificate No. 3748				
	MC Limit and Critically Polluted Area.	dated 03.12.2019.				

4.	Status of physical structures within 500 m radius of the site including the status of industries, if any	Railway line on the left side, Jai Bhole Industries & Mahajan Steel & wire on the opp. Side, Canal at about 500 M on the backside. Rest agriculture fields.
5.	Status of consents issued to the existing unit under the Air Act, 1981 and Water Act, 1974.	Consents are valid.
6.	As to whether the existing unit is complying with the condition of Consent to Operate under the Air Act, 1981 and Water Act, 1974 granted to it.	Yes, complying with the condition.

# 2.0 Deliberations during the 188<sup>th</sup> meeting of SEAC held on 04.03.2020

To a query of SEAC, the project proponent informed that the project does not fall within the 5.0 Km radius from the boundary of MC Limit of Ludhiana. Therefore, competency to decide the project lies with SEIAA/SEAC.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under: -

Sr. No.	Description			Details			
1.	Online Proposa	al No.		SIA/PB/IND/41	203/2019		
2.	Name and Location of the project			M/s Saeco Strips Pvt. Ltd,			
				Village- Doraha	ı, Rampur Road,		
				Tehsil- Payal, D	District- Ludhiana, Punjab		
3.	•	project (TOR/Fres		TOR for Fresh I	EC		
	EC/Expansion	Amendment/Other	s)				
4	a) Category			a) B-1			
	b) Activity			b) 3(a)			
		ule appended to El		=			
	•	006 as amended tin	ne	` ' '			
	to time.)			Capacity > 30,000 TPA			
5	_	reflect that proje					
		ed near to PLPA are	ea	•	lertaking with EDS reply dat	ed	
	nor fall in the	PLPA area		31.12.2019.)			
6	Area Details		ı				
	Details	Existing	Α	dditional Land	After Expansion		
	Plot Area	10075 Sqm.			10075 Sqm.		
7.	Co-ordinates of	of the project site		Latitude: -	_		
				30°48′40.23″N, 30°48′41.04″N			
				30 <sup>0</sup> 48′36.39″N,	30 <sup>0</sup> 48′37.81″N		

					76°02′	03.19"E, 76º02'03.90"E, 09.22"E, 76º02'10.46"E		
8.	Project Cost (After expansion)				(mentioned at page no. 6 of PFR)  Rs. 24.04 Crores (Submitted CA certificate mentioning above project cost with EDS reply dated 31.12.2019)			
9		fication/Land aster Plan	d use patter	n as	Indust	rial		
10	Raw expar	Material redusion)	quirement (	After		teel Scrap @98,772 TPA & ngots/Billets @92,500 TPA		
11.	Produ expar		apacity (	After	Struct	ngots/Billets@92,400 TPA ural Steel@73,100 TPA d, Coil, Flats, Wire Rod, ars)		
12	Detail mach	s of ma inery/plant (	ajor produ After expans		(i) 2 Nos induction furnaces (1X8 TPH – Existing & 1X15 TPH-Proposed) (ii) 01 CCM (Proposed)			
13.	Manp	ower (After	expansion)		150 persons			
14.					i) Domestic: 7.5 KLD ii) Cooling: 23.0 KLD Source: Existing Borewell To a query of SEAC, Project proponent informed that the project does not fall under Khanna Block. Hence, project does not fall under notified Block.			
15.	Detail	s of Effluent	(After expa	nsion)	<u> </u>	Todalog Blook		
13.	Sr. No.	Details  Industrial	Quantity (After Expansion			narks ndustrial effluent generated		
	1)	Effluent	INII		INO	ndustrial emident generated		
	ii)	Domestic Effluent	6 KLD	6 KLD		ting Wastewater generated from the ect is being treated in the septic tank sed for plantation. After expansion, will be installed for the treatment of tewater. The treated water will be d for cooling purposes.		
16.	Detail	s of Emissio	ns (After exp	ansion	1)			
	Sr. No.	Source	Capacity	Hei	nney ght n)	Air Pollution Control Device		

	i)	Induction	1X8	TPH	30 m	each		Provision	of Bag Filter
		Furnace	& 1X TPH	15				Pulse jet cleaning	red undertaking to install bag filter APCD with offline technology along tion dated 04.03.2020)
17.	Detai	s of Hazard	ous w	aste ar	nd its d	lisposa	al (	(After ex	pansion)
	Sr. No.	Hazardous Waste		Categ	ory	Qua (Afte expa	er	ity sion)	Disposal
	1.	Gas Clea Residue (A dust)- Bag		35.1		185.	.5F	PA	To M/s Madhav alloys for metal recovery.
	2.	Residue (A	aning APCD Alkali	35.1		57 T	P/	Δ	To M/s Nimbua Greenfield (Punjab) Limited
	3.	Used Oil		5.1		0.02	!kl,	/annum	Authorized Recyclers/Lubricant within the Industry
18.	Solid	waste gene	ration	and its	dispo	sal (Af	te	r expans	ion)
	Sr.	Solid Wast		uantity				osal	
	No.			fter Ex	•				
	(i)	Slag	40	).0 TPC	)	in m pa	for an	rmed tha nufacture	of SEAC, project proponent at slag will be disposed of to a rof cement concrete blocks, tiles with the proper
19.	_	y Requirem expansion)				iii) Power load: 11,000 KVA through PSPCL.			
20	Environment Management Plan			n	During the presentation on 04.03.2020, the project proponent informed that EMP for this industry will be prepared keeping in view the existing conditions and it will include air and water pollution control measures.				
21.	CER activities along with budget			OM F 2018, Lakhs Respo be giv (Projet the re	i.N , t on ve ect ev	lo22-65 the organ sibility. T n in the f t propone ised cost	project is Green Field. As per 5/2017-IA-III dated 01st May nization will spend Rs. 15.0 Corporate Environment The details of CER activity will final EIA report. Lent submitted undertaking for to f CER activities i.e. Rs.24 sentation on 04.03.2020).		

22	Proposed ToRs	Standard ToRs have been proposed.

#### 3.0 Recommendations

After detailed deliberations, it was decided to categorize the project under Activity 3(a); B-1 with public consultation as required for the project. The baseline study shall be carried out by Environmental Consultant for one complete season except monsoon season, which includes at least three days of traffic study. The Committee approved the following Terms of Reference for preparing Environmental Impact Assessment (EIA) report for the proposed project and recommended to SEIAA to issue the following TORs:

#### A. STANDARD TERMS OF REFERENCE

# 1) Executive Summary

Report in about 8-10 pages incorporating the following:

- (i) Project name and location (Village, Distt., State, Industrial Estate (if applicable)
- (ii) Products and capacities. If expansion proposal, then existing products with capacities and reference to earlier EC.
- (iii) Requirement of land, raw material, water, power, fuel, with source of supply (Quantitative)
- (iv) Process description in brief, specifically indicating the gaseous emission, liquid effluent and solid and hazardous wastes.
- (v) Measures for mitigating the impact on the environment and mode of discharge or disposal.
- (vi) Capital cost of the project, estimated time of completion
- (vii) Site selected for the project Nature of land Agricultural (single/double crop), barren, Govt./private land, status of is acquisition, nearby (in 2-3 km.) water body, population, within 10 km other industries, forest, ecosensitive zones, accessibility, (note - in case of industrial estate this information may not be necessary)
- (viii) Baseline environmental data air quality, surface and groundwater quality, soil characteristic, flora and fauna, socio-economic condition of the nearby population Identification of hazards in handling, processing and storage of hazardous material and safety system provided to mitigate the risk.
- (ix) Identification of hazards in handling, processing and storage of hazardous material and safety system provided to mitigate the risk
- (x) Likely impact of the project on air, water, land, flora-fauna and nearby population
- (xi) Emergency preparedness plan in case of natural or in plant emergencies
- (xii) Issues raised during public hearing (if applicable) and response given
- (xiii) CSR/CER plan with proposed expenditure.

- (xiv) Occupational Health Measures
- (xv) Post Project monitoring plan
- (xvi) Synopsis of the project (as available on web site i.e. www.pbdecc.gov.in)

### 2) <u>Introduction</u>

- (i) Details of the EIA Consultant including NABET accreditation
- (ii) Information about the project proponent
- (iii) Importance and benefits of the project

# 3) <u>Project Description</u>

- (i) Cost of project and time of completion.
- (ii) Products with capacities for the proposed project.
- (iii) If expansion project, details of existing products with capacities and whether adequate land is available for expansion, reference of earlier EC if any.
- (iv) List of raw materials required and their source along with mode of transportation.
- (v) Other chemicals and materials required with quantities and storage capacities.
- (vi) Details of Emission, effluents, hazardous waste generation and their management.
- (vii) Requirement of water (breakup for induction and rolling mill), power, with source of supply, status of approval, water balance diagram, man-power requirement (regular and contract).
- (viii) Process description along with major equipment and machineries, process flow sheet (quantitative) from raw material to products to be provided
- (ix) Hazard identification and details of proposed safety systems.
- (x) In case of Expansion/modernization proposals:
  - a) Status of compliance of Consent to Operate for the ongoing /existing operation of the project from SPCB shall be attached with the EIA-EMP report.
  - b) In case the existing project has not obtained environmental clearance, reasons for not taking EC under the provisions of the EIA Notification 1994 and/or EIA Notification 2006 shall be provided. Copies of Consent to Establish/No Objection Certificate and Consent to Operate (in case of units operating prior to EIA Notification 2006, CTE and CTO of FY 2005-2006) obtained from the SPCB shall be submitted. Further, compliance report to the conditions of consents from the SPCB shall be submitted.

### 4) Site Details

(i) Location of the project site covering village, Taluka / Tehsil, District and State, Justification for selecting the site, whether other sites were considered.

- Copy of Master Plan indicating a land use pattern of the site is in conformity of proposals of Master Plan shall be attached with EIA report.
- (ii) A top sheet of the study area of radius of 10 km and site location on 1:50,000/1:25,000 scale on an A3/A2 sheet. (Including all eco-sensitive areas and environmentally sensitive places)
- (iii) Details w.r.t. option analysis for selection of site.
- (iv) Co-ordinates (lat-long) of all four corners of the site.
- (v) Google map-Earth downloaded of the project site
- (vi) Layout maps indicating existing unit as well as proposed unit indicating storage area of raw material, finished products, greenbelt area with marking of tree, Location of STP/ETP, Solid waste storage area, Parking space, Firefighting equipment layout, First aid room, Location of Tube wells, DG Sets & Transformers and any other utilities
- (vii) If located within an Industrial area/Estate/Complex, layout of Industrial Area indicating location of unit within the Industrial area/Estate.
- (viii) Photographs of the proposed and existing (if applicable) plant site. If existing, show photographs of plantation/greenbelt, in particular.
- (ix) Land use break-up of total land of the project site (identified and acquired), government/private - agricultural, forest, wasteland, water bodies, settlements, etc. shall be included. (not required for industrial area)
- (x) A list of major industries with name and type within study area (10 km radius) shall be incorporated. Land use details of the study area.
- (xi) Geological features and Geo-hydrological status of the study area shall be included.
- (xii) Details of Drainage of the project up to 5km radius of study area. If the site is within 1 km radius of any major river, peak and lean season river discharge as well as flood occurrence frequency based on peak rainfall data of the past 30 years. Details of Flood Level of the project site and maximum Flood Level of the river shall also be provided. (mega green field projects)
- (xiii) Status of acquisition of land. If acquisition is not complete, stage of the acquisition process and expected time of complete possession of the land.
- (xiv) R&R details in respect of land in line with state Government policy
- 5) Forest and wildlife related issues (if applicable):
  - (i) Permission and approval for the use of forest land (forestry clearance), if any, and recommendations of the State Forest Department. (if applicable).
  - (ii) Land use map based on High resolution satellite imagery (OPS) of the proposed site delineating the forestland (in case of projects involving forest land more than 40 ha).
  - (iii) Status of Application submitted for obtaining the stage I forestry clearance along with latest status shall be submitted.

- (iv) The projects to be located within 10 km of the National Parks, Sanctuaries, Biosphere Reserves, Migratory Corridors of Wild Animals, the project proponent shall submit the map duly authenticated by Chief Wildlife Warden showing these features vis-a-vis the project location and the recommendations or comments of the Chief Wildlife Warden-thereon.
- (v) Wildlife Conservation Plan duly authenticated by the Chief Wildlife Warden of the State Government for conservation of Schedule I fauna, if any exists in the study area.
- (vi) Copy of application submitted for clearance under the Wildlife (Protection) Act, 1972, to the Standing Committee of the National Board for Wildlife.

### 6) Environmental Status

- (i) Determination of atmospheric inversion level at the project site and site specific micro-meteorological data using temperature, relative humidity, hourly wind speed and direction and rainfall.
- (ii) AAQ data (except monsoon) at 8 locations for PM 10, PM2.5, S02, NOX, CO and other parameters relevant to the project shall be collected. The monitoring stations shall be based CPCB guidelines and take into account the pre dominant wind direction, population zone and sensitive receptors including reserved forests.
- (iii) Raw data of all AAQ measurement for 12 weeks of all stations as per frequency given in the NAQQM Notification of Nov. 2009 along with min., max., average and 98% values for each of the AAQ parameters from data of all AAQ stations should be provided as an annexure to the EIA Report.
- (iv) Surface water quality of nearby River (100m upstream and downstream) and other surface drains at eight locations as per CPCB/MoEF& CC guidelines.
- (v) Whether the site falls near to polluted stretch of river identified by the CPCB/MoEF& CC.
- (vi) Groundwater monitoring at minimum at 8 locations shall be included.
- (vii) Noise levels monitoring at 8 locations within the study area.
- (viii) Soil Characteristic as per CPCB guidelines.
- (ix) Traffic feasibility / serviceability study for at least 3 days based on Indian Standard Codes. Further it shall also include the details of cross section of the road on which industry is located, vehicles movement w.r.t. the industry, traffic load of other vehicles on the road incorporating the haulage time for the vehicles for loading/unloading within the premises and parking requirement to avoid the traffic congestions on the link and adjoining roads. Traffic study shall be conducted considering the traffic of the industries located in the vicinity.
- (x) Detailed description of flora and fauna (terrestrial and aquatic) existing in the study area shall be given with special reference to rare, endemic and endangered species. If Schedule-I fauna are found within the study area, a Wildlife Conservation Plan shall be prepared and furnished.
- (xi) Socio-economic status of the study area.

### 7) <u>Impact Assessment and Environment Management Plan</u>

- (i) Assessment of ground level concentration of pollutants from the stack emission based on site-specific meteorological features. In case the project is located on a hilly terrain, the AQIP Modeling shall be done using inputs of the specific terrain characteristics for determining the potential impacts of the project on the AAQ. Cumulative impact of all sources of emissions (including transportation) on the AAQ of the area shall be well assessed. Details of the model used and the input data used for modeling shall also be provided. The air quality contours shall be plotted on a location map showing the location of project site, habitation nearby, sensitive receptors, if any.
- (ii) Water Quality modelling.
- (iii) Impact of the transport of the raw materials and end products on the surrounding environment shall be assessed and provided. In this regard, options for transport of raw materials and finished products and wastes (large quantities) by rail or rail-cum road transport or conveyor-cum-rail transport shall be examined.
- (iv) A note on treatment, recycling and reuse of wastewater from different plant operations, extent for different purposes shall be included. Complete scheme of effluent treatment. Characteristics of untreated and treated effluent to meet the prescribed standards of discharge under EPA Rules.
- (v) Details of stack emission and action plan for control of emissions to meet standards.
- (vi) Measures for fugitive emission control
- (vii) Details of hazardous waste generation and their storage, utilization and disposal. Copies of MOU regarding utilization of solid and hazardous waste shall also be included. EMP shall include the concept of waste-minimization, recycle/reuse/recover techniques, Energy conservation, and natural resource conservation.
- (viii) Proper utilization of fly ash shall be ensured as per Fly Ash Notification, 2009. A detailed plan of action shall be provided.
- (ix) Action plan for the green belt development in 33 % area with not less than 1,500 trees per hectares giving details of species, width of plantation, planting schedule, post plantation maintenance plan for 3 years shall be included. The green belt shall be around the boundary and a scheme for greening of the roads used for the project shall also be incorporated
- (x) Action plan for rainwater harvesting measures at alternative sites shall be submitted to harvest rainwater from the roof tops and storm water drains to recharge the groundwater and also to use for the various activities to conserve freshwater and reduce the water requirement from other sources.
- (xi) Total capital cost and recurring cost/annum for environmental pollution control measures shall be included.
- (xii) Action plan for post-project environmental monitoring shall be submitted.

(xiii) Onsite and Offsite Disaster (natural and Man-made) Preparedness and Emergency Management Plan including Risk Assessment and damage control. Disaster management plan should be linked with the District Disaster Management Plan.

### 8) Occupational health

- (i) Details of existing Occupational & Safety Hazards. What are the exposure levels of above-mentioned hazards and whether they are within the Permissible Exposure Level (PEL)? If these are not within PEL, what measures the company has adopted to keep them within PEL so that the health of the workers can be preserved,
- (ii) Details of exposure specific health status evaluation of worker. If the workers' health is being evaluated by pre-designed format, chest x rays, Audiometry, Spirometry, Vision testing (Far & Near vision, colour vision and any other ocular defect) ECG, during pre-placement and periodical examinations give the details of the same. Details regarding last month analyzed data of above-mentioned parameters as per age, sex, duration of exposure and department wise.
- (iii) Annual report of the health status of workers with special reference to Occupational Health and Safety.
- (iv) Plan and fund allocation to ensure the occupational health & safety of all contract and casual workers.

# 9) Corporate Environment Policy

- (i) Does the company have a well laid down Environment Policy approved by its Board of Directors? If so, it may be detailed in the EIA report.
- (ii) Does the Environment Policy prescribe for standard operating processes/procedures to bring into focus any infringement/deviation/violation of the environmental or forest norms/conditions? If so, it may be detailed in the EIA.
- (iii) What is the hierarchical system or Administrative order of the company to deal with the environmental issues and for ensuring compliance with the environmental clearance conditions? Details of this system may be given.
- (iv) Does the company have a system of reporting of non-compliances / violations of environmental norms to the Board of Directors of the company and / or shareholders or stakeholders at large? This reporting mechanism shall be detailed in the EIA report
- 10) Details regarding infrastructure facilities such as sanitation, fuel, restroom, etc. to be provided to the labour force during construction as well as to the casual workers including truck drivers during the operation phase.

### 11) Enterprise Social Commitment (ESC)

(i) To address the Public Hearing issues, 2.5% of the total project cost of (Rs.\_\_\_crores), amounting to Rs.\_\_\_crores, shall be earmarked by the project proponent, towards Enterprise Social Commitment (ESC). Distinct ESC projects shall be carved out based on the local public hearing issues. Project estimate shall be prepared based on PWD schedule of rates for each distinct Item and schedule for time-bound action plan shall be prepared. These ESC projects as indicated by the project proponent shall be implemented along with the main project. Implementation of such program shall be ensured by constituting a Committee comprising of the project proponent, representatives of village Panchayat & District Administration. Action taken report in this regard shall be submitted to the Ministry's Regional Office. No free distribution/donations and or free camps shall be included in the above ESC budget

- 12) Any litigation pending against the project and/or any direction/order passed by any Court of Law against the project, if so, details thereof shall also be included. Has the unit received any notice under the Section 5 of Environment (Protection) Act, 1986 or relevant Sections of Air and Water Acts? If so, details thereof and compliance/ATR to the notice(s) and present status of the case.
- 13) A tabular chart with index for points wise compliance of above TORs.

# B. STANDARDISED SPECIFIC TERMS OF REFERENCE FOR EIA STUDIES FOR INDUCTION/ ARC FURNACES/CUPOLA FURNACES 5TPH OR MORE

- (i) Details of proposed layout clearly demarcating existing & proposed features of the project within the plant.
- (ii) Total no. of furnaces & details including capacity of each furnace.
- (iii) Detail of the mechanical shredder to reduce the size of the raw material.
- (iv) Complete process flow diagram describing each unit, its processes, and operations, along with material and energy inputs and outputs (material and energy balance).
- (v) Details on the design and manufacturing process for all the units.
- (vi) Details on environmentally sound technologies for recycling of hazardous materials, as per CPCB Guidelines, may be mentioned in case of handling scrap and other recycled materials.
- (vii) Details on the requirement of raw materials, its source, and storage at the plant.
- (viii) Details on the requirement of energy and water along with its source and authorization from the concerned department. Location of water intake and outfall points (with coordinates).
- (ix) Details on toxic metal content in the waste material and its composition and end-use (particularly of slag).
- (x) Details on toxic content (TCLP), composition and end-use of chrome slag. Details on the recovery of the Ferro chrome from the slag and its proper disposal.

### C. ADDITIONAL SPECIFIC TORS DECIDED DURING MEETING OF SEAC

(i) Public consultation is required for the projects as not located in notified industrial parks/estates.

- (ii) Submit proof of ownership of land (existing owner) such as copy of latest Jamabandi (not more than one month old) and credible document showing status of land acquisition w.r.t. project site as prescribed in OM dated 07.10.2014 issued by MoEF)
- (iii) Submit dully filled prescribed field data sheets and analysis reports along with exact location of sampling / monitoring point marked on the layout map. Also submit the status of approvals of Laboratories.
- (iv) Submit cost of the project duly certified by Chartered Engineer/ Approved valuer / Chartered Accountant. In the absence of above, the project proponent may submit self-certified detail of cost of the project mentioning the cost of Land, building, infrastructure and plant & machinery
- (v) Certificate from the concerned authority w.r.t the location of protected areas as notified under the Wildlife Protection Act, 1972 within 5 km radius from the boundary of the project site.
- (vi) Certificate from the Department of Town & Country Planning or concerned authorities to support the claim made by project proponent that the project site is located in the industrial zone as per the provisions of Master Plan of Town/City in the jurisdiction of which the project site is located.
- (vii) Compliance of the siting criteria, standard operating practices, code of practice, and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of units.
- (viii) Necessary permissions from the Central Groundwater Authority (CGWA)/ State Groundwater Authority (SGWA)/concerned authority for the abstraction of groundwater for the existing requirements as well as for the expanded unit. In case of not allowing such permission by the concerned authority for the abstraction of additional groundwater for the expanded project, the project proponent shall propose alternative arrangements to meet out the additional water requirements. It shall be ensured that:
  - a) In the projects where groundwater is proposed as a water source, the project proponent shall apply to the Central Groundwater Authority (CGWA)/ State Groundwater Authority (SGWA), as the case may be, for obtaining No Objection Certificate (NOC) if applicable.
  - b) Approval /permission of the CGWA/SGWA shall be obtained before drawing groundwater for the project activities.
  - c) In the absence of approval, submit a copy of acknowledgment along with a set of application filed to CGWA /Competent Authority for obtaining permission for the abstraction of groundwater
- (ix) Minimize the water consumption in the steel plant complex by segregation of used water, practicing cascade use and by recycling treated water.
- (x) STP for treatment of wastewater & re-utilization of the treated water for core/non-core activities so as to achieve the Zero Liquid Discharge Condition as per the III (iv) of OM dated 09/08/2018 issued by the MoEF&CC for such units.

- (xi) Reuse of cooling tower blow down, simultaneously ensuring the standards prescribed for such purge waters. If required, necessary arrangements shall be made to keep this waste stream within the parameters required for reuse.
- (xii) In case of any acid pickling activity, the spent acid/effluents generated from such activities shall be utilized through authorized re-processors for converting the same into useful by-products like FeSO<sub>4</sub> etc. An agreement to this effect shall be made with the authorized agencies.
- (xiii) Adequate area to be reserved and marked on the layout plan for the green belt as per the conditions laid down by the MoEF&CC as per the Standard EC Conditions prescribed for Induction/ Electric Arc Furnace & Rolling Mills circulated vide OM dated 09/08/2018.
- (xiv) Detailed study report along with calculation for reserving land for loading or unloading of raw material, products, slag, hazardous waste as well as for storage of these materials and the area to be reserved for parking incorporating the time required for loading and unloading of vehicles for respective activities and minimum/maximum period for which storage of the above material is required in the premises. The areas for the respective activities to be marked on the layout plan.
- (xv) Action plan for the compliance of standard operating procedures and upgradation of suction and treatment arrangement for the secondary emissions as prescribed by the State Pollution Control Board or by CPCB/MoEF&CC.
- (xvi) Compliance of standard operating procedures and up-gradation of suction/treatment systems for the control of secondary emissions within the time frame prescribed by the State Pollution Control Board. Similar action is to be implemented in the proposed expansion project.
- (xvii) Whole of the vehicle movement area as well as the approach road to the gate /weighing bridge shall be paved with pucca/metalled / cement concrete road to control the dust emissions expected from the vehicle movement.
- (xviii) The vehicles to be used for loading/unloading purposes shall not be parked along the roadside so as to avoid the traffic congestion and dedicated parking place to be provided for the same.
- (xix) Adopt green technologies to conserve the water and energy including shearing/cutting / bundling machines. Also, to provide abrasive resistant fire bricks in the crucibles to reduce the periodic maintenance & disposal of discarded fire bricks.
- (xx) Use of natural gas (if available) as substitute fuel wherever possible in the existing industry/ for the expansion project.
- (xxi) Delineate the concrete proposal regarding activities to be undertaken under Corporate Environmental Responsibility indicating the followings:
  - i) various activities to be undertaken as per the provision of OM dated 01.05.2018
  - ii) proportionate provisions of funds,
  - iii) the period in which CER activities is to be implemented

- iv) the person(s) responsible for the implementation.
- (xxii) Submit compliance w.r.t. condition no.II [(i) & (iii)] subtitled as "Air Quality Monitoring & Preservation" regarding continuous emission monitoring system and continuous ambient air quality monitoring as prescribed in the Standard EC Conditions for Induction/ Electric Arc Furnace & Rolling Mills issued by the MoEF&CC, New Delhi vide OM dated 09/08/2018.
- (xxiii) Examine and submit the proposal for:
  - a) Recovery of iron from slag before disposing of it.
  - b) Identify the areas for utilization of slag in a scientific manner and explore its usage in cement/construction industry/manufacturing of pavers & tiles/road laying etc.
  - c) Recovery of precious metals like Zinc, lead and iron etc. from the APCD dust (Hazardous waste) through authorized re-processor.
- (xxiv) Air Pollution Control Arrangement details shall be provided as below:

Plant	Pollut	Qty	Method used to	Number	Budget	Estimate	d Post
/Unit	ants genera		Control	of units		Control	Qty
		ted	/specifications	planned		Pollutant	
			(attach Separate	&			
			Sheet to furnish	Capacity			
			Details)				
						Per	Per day
						Unit	

- (xxv) Submit compliance regarding the installation of Pulse jet bag filter with offline cleaning technology as APCD with the proposed induction furnace.
- (xxvi) List the species with heavy foliage, broad leaves and wide canopy cover. The landscape planning should include plantation of native species. Water intensive and/or invasive species should not be used for landscaping

The following general points shall be noted:

- (i) The EIA document shall be printed on both sides, as for as possible.
- (ii) All documents shall be properly indexed, page numbered.
- (iii) Period/date of data collection shall be clearly indicated.
- (iv) The letter/application for environmental clearance shall quote the MOEF / SEIAA file No. and also attach a copy of the letter.
- (v) The copy of the letter received from the Ministry / SEIAA shall be also attached as an annexure to the final EIA-EMP Report.
- (vi) The index of the final EIA-EMP report must indicate the specific chapter and page no. of the EIA-EMP Report.

- (vii) While preparing the EIA report, the instructions for the proponents and instructions for the consultants issued by MOEF vide notification dated 03.03.2016 which is available on the website of this Ministry shall also be followed.
- (viii) The consultants involved in the preparation of EIA-EMP report after accreditation with Quality Council of India (QCI) /National Accreditation Board of Education and Training (NABET) would need to include a certificate in this regard in the EIA-EMP reports prepared by them and data provided by other organization/Laboratories including their status of approvals etc. Name of the Consultant and the Accreditation details shall be posted on the EIA-EMP Report as well as on the cover of the Hard Copy of the Presentation material for EC presentation.

The Terms of Reference (ToR) prescribed by the State Expert Appraisal Committee (SEAC), Punjab should be considered for the preparation of EIA / EMP report for the project in addition to all the relevant information as per the Generic Structure of EIA given in Appendix III and IIIA in the EIA Notification, 2006.

Where the documents provided are in a language other than English, an English translation shall be provided. The draft EIA-EMP report shall be submitted to the State Pollution Control Board of the concerned State for the conduct of Public Hearing. The SPCB shall conduct the Public Hearing/public consultation, district-wise, as per the provisions of EIA notification,2006. The Public Hearing shall be chaired by an Officer, not below the rank of Additional District Magistrate. The issues raised in the Public Hearing and during the consultation process and the commitments made by the project proponent on the same shall be included separately in EIA-EMP Report in a separate chapter and summarized in a tabular chart with financial budget (capital and revenue) along with time-schedule of implementation for complying with the commitments made.

If any part of the data/information submitted by the project proponent is found to be false or misleading at any stage, then SEIAA & SEAC will not be responsible for the expenditure incurred on the project due to issuance of this ToR or subsequent work carried out by the project proponent for conducting EIA study or for any other activity related to the project.

The 'Terms of Reference' (TORs) prescribed will be valid for a period of three years from its issuance. The final EIA report shall be submitted to the SEIAA, Punjab for obtaining environmental clearance.

# 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Satish Sharma, Manager of the promoter company
- ii) Sh. Sital Singh, EIA Coordinator, M/s CPTL, Mohali

During the meeting, the following observations were made to which project proponent replied as under:

Sr. No	Observations	Reply
1.	Explain how the production of the unit i.e. 29,400 TPA calculated.	
2.	Whether the project site is located outside the critical polluted area	Project proponent stated that distance of

Environment consultant of the promoter company requested that the base study carried out for unit namely RN Gupta be allowed to use for this project. SEIAA rejected the request of the project proponent on the ground that SEAC had not recommended for the same.

During discussions, the project proponent agreed to prepare detailed EIA on the basis of Terms of Reference as recommended by the SEAC and to submit the final EIA report incorporating the issues related to the Public Consultation process (to be held) as a separate chapter i.e. tabular chart with financial budget (capital and revenue) along with time- schedule of implementation for complying with commitments made to the Public during aforesaid consultation.

The SEIAA observed that the SEAC has categorized the project into B-1 category (activity listed 3 (a) of the schedule) with public consultation as required for the projects not located in notified industrial parks/ estates and has recommended specific TORs for undertaking detailed EIA & EMP for such type of projects.

The SEIAA looked into the details of the case and was satisfied with the same. Therefore, the Authority decided to accept the recommendations of SEAC and approved Terms of Reference for undertaking detailed EIA & EMP as finalized by SEAC and an additional TORs as under:-

The Project Proponent shall submit a certificate issued by PPCB clarifying as to whether the site of the industry falls within the 5 KM radius of the MC limit (Critically Polluted Area

Limit) or outside the said radius. In case the project site falls within the 5 Km radius of Critically Polluted Area limit then General Conditions will be applicable in this case and the project will be treated as Category A. In that case PP shall submit the application for EC to MOEF&CC.

Item No. 164.14: Application for obtaining Environmental Clearance under EIA notification dated 14.09.2006 for Expansion of Residential Township (Phase IV) at Village Raman & Tarakhwala, Distt. Bathinda, Punjab by M/s HPCL Mittal Energy Ltd. (HMEL) (SIA/PB/MIS/48965/2009)

SEIAA observed as under:

### 1.0 Background

Earlier, the project was granted Environmental Clearance from MoEF, Govt. of India vide no. 139/SEAC(P)/2010-IA.III dated 07.10.2010 for the development of township for staff of the Guru Gobind Singh Refinery having plot area 59.76 Ha and Built-up area 149078.61 sqm and the said Environmental Clearance was expired on 06.10.2015.

The project proponent has now filed an application for obtaining Environment Clearance under EIA notification, 2006 for expansion of Residential Township (Phase IV) at Village Raman & Tarakhwala, Distt. Bathinda, Punjab. After expansion, the plot area will remain the same i.e., 59.76 acre and built-up area will increase to 2,65,228 sqm.

TORs have been issued to the project proponent vide SEIAA letter no 666 to 668 dated 22/08/2019.

Baseline monitoring has been carried out for 3 months i.e.,15.10.2018 to 15.01.2019 and then one-month additional data was collected i.e., 27.05.2019 to 15.06.2019.

The project proponent has now submitted the EIA report.

### 2.0 Deliberations during the 188th meeting of SEAC held on 04.03.2020

The case was considered by SEAC in its 188<sup>th</sup> meeting held on 04.03.2020.

SEAC observed that the project proponent has submitted an action taken report on the observations made by the MoEF during its visit on 11.01.2019. The project proponent also submitted the documentary evidences in support of compliances made by it. The Environmental Consultant of the project proponent further submitted that the points of specific conditions mentioned at i) and ix) were verified by a visit by M/s Transven Consulting Pvt. Ltd and has informed as under:

- i) The project proponent has provided the Central Treatment Plant and the flow chart.
- ii) The solar panels have been installed for power fence. Project proponent is going to provide and exceed the solar requirement as per MoEF in the coming phases of development. The calculation of the same was also provided.

SEAC was satisfied with the reply given on the observations made by the MoEF.

Environmental consultant of the promoter company presented the salient features of the project. SEAC made certain observations to which project proponent submit the reply. After considering the reply to the observations of SEAC, the details of updated salient features of the project are as under: -

S.No.	Item	Details					
1.	Online Proposal No.	SIA/PB/MIS/48965/2009					
2.	Name and Location of the	Expansion of Residential Township Project "HMEL					
	project			Tarakhanwala, District			
		Bathinda, Punjab					
3.	Latitude & Longitude	Corners coordinates:					
		Corner	Latitude	Longitude			
		Α	29.952862° N	74.916739° E			
		В	29.951939° N	74.917005° E			
		С	29.950315° N	74.919346° E			
		D	29.949466° N	74.921558° E			
		Е	29.951916° N	74.923500° E			
		F	29.950346° N	74.927354° E			
		G	29.950653° N	74.928899° E			
		Н	29.955124° N	74.928853° E			
		I	29.955893° N	74.928450° E			
		J	29.957086° N	74.926615° E			
		K	29.954766° N	74.924786° E			
		L	29.953905° N	74.924070° E			
		М	29.955310° N	74.922200° E			
		N	29.955686° N	74.922647° E			
		0	29.955952° N	74.922291° E			
		Р	29.956610° N	74.922936° E			
		Q	29.956503° N	74.919588° E			
		R	29.956054° N	74.919239° E			
		S	29.955707° N	74.919522° E			
4.	Project/activity covered under		(b) 'Townships and	Area Development			
	item of scheduled to the EIA Notification,14.09.2006	Projects'					
5.	Whether the project is in critical polluted area or not.	No					

6.		project inv		Not applicable. Expansion part of the Pronounces, not involved in the diversion of forest land					-	oes
			and? If yes,						1.	
		t of the fore								
7.			st clearance. cover under	No						
<b>/</b> .	PLPA, 19		cover under	NO						
8.			all within 10							
	km of									
	National Sanctuar	' '	Vild Life							
9.			use pattern	Reside	ntial Area					
		aster Plan	use passer.		r, CLU ha	s been	obtain	ed f	from	the
				-	ment of Tov		-			-
					nemo no. 9	588 CTF	P(Pb)/ SI	P 432	2-B da	ted
10	Cost of t	ha project		11.12.2	2008. 5 Crores					
10.		he project								
11.		-	ıilt- up Area		etails of proje					
	and Gree area	en		S.No	. Descrip Plot are			rea ,97,58	2 <b>0</b>	_
	arca			1.	(Total	sche			147.66	
					area)	30110	-	cres)	17.100	
				2.		area af			28 m <sup>2</sup>	
					expansi					_
10	<b>.</b>			3.	Green area			,50,69	91 m <sup>2</sup>	
12.	Population for		nal)	6556 Pe	ersons.					
13.		ılly operatio Requiremen	ts & source	The p	roject prop	nent v	vill utiliz	re th	e tre	ated
		ruction Phas		wastewater from the STP installed within the						
				premise	es of HMEL fo	or the co	nstructio	n pur	poses.	
14.			Requirements		•					
	`	•	Summer, Ra			r undert	aking da	ated (	)4.03.2	2020
			oject propon <b>/ater Requi</b> i		e meeung:					
	S.No.	Season	Fresh water		Reuse wate	er 7	Total domestic			
			Domestic (k		Flushing (K			er requirement		
			(	/	( )		KLD			
	1.	Summer	589		296	8	385			
	2.	Winter	589		296		385			
	3.	Rainy	589	296		8	385			
	Treated wastewater require			ment		- ·				
	S.No.	Season	Basis				Treated			
					Area	wastew				
					(a ama \	requireme				
	1	Cupana	ltr/sqm/d	ay	(sqm)	KLD				
	1.	Summer	5.5		150691	829				

	2.	Winter	1.8 ltr/s	sqm/day	150691	271				
	3	Rainy 0 ltr/sqr		m/day 150691		0	0			
	Source	of water								
	S.No. Description  1. Domestic			Source of water  Water Supply from Refinery i.e. Can Water						
							i.e. Canal			
	2	Flushing pu	Treated wastewater from inhouse STP							
	3.	Green area			Total Requirement of 829 KLD of which 433 KLD will be met from the wastewater from inhouse STP remaining 396 KLD from canal Wat					
15.	arrange in Const	ent & Disposal ments of was ruction Phase	tewater	tank of wastewat	adequa er will be	ite capad utilised o	be treated ir city and tl nto land for I	ne treated plantation.		
16.	Disposal Arrangement of Wastewater in Operation Phase			Total wastewater generation will be 767 KLD which will be treated in STPs of 993 KLD (493 KLD +500 KLD) capacity.729 KLD treated wastewater available at the outlet of STPs. Reuse of treated wastewater and discharge of surplus treated wastewater is given as under: -						
			Season		lushing KLD)	Green area (KLD)	Storage in Artificial pond* (KLD)			
				Summe	er 2	96	433	0		
				Winter	2	96	271	162		
				Monsoc	on 2	96	0	433		
		* Note: Existing Pond = 400 KLD (320 sqm x 1.5) Proposed Pond =1000 KLD (500 sqm x 2)  To queries of SEAC, Project Proponent submitted under: STP of 993 KLD has been proposed considering future developments after expansion. However, Single Standard Beauty of 1400 KL (Existing 40)  Excess treated water will be stored in two artifications ponds having total capacity of 1400 KL (Existing 40)						considering wever, STP wo artificial xisting- 400		
				store treat winter sea	& proposed: 1000 KL), which will sufficient to ore treated wastewater more than 8 days during inter season.  Uring winter season, excess treated wastewater hall be given to nearby farmers for irrigation					

		purpose after for road sprink			nt and also used rposes.	
	Rainwater recharging detail	17210 m <sup>3</sup> /hr ra Rainwater recha			ted in 189 no. of	
18.	Solid waste generation and its disposal					
19.	Hazardous Waste & E- Waste	Used oil from DG sets will be sold to registered recyclers and E-waste will be disposed of as per the E-waste (Management) Amendment Rules 2018.				
20.	Energy Requirements & Saving	a) 11363.78 K b) DG sets – 7 set) Energy Saving Solar panels h all the building 290 KW which demand. Area covered	IW from Single Research I measure have been good The total for solar and for solar s	tate grid.  VA & 4 x 500  s:  proposed of tal capacity of x. 2.22% of  panels is 35 a i.e. 81495 wer generation  r panel = 35 per KW	n the rooftop of of solar panel is the total power $m^2$ (which is $m^2$ ) which will on.	
21.	Environment Management Plan along with Budgetary break-up phase-wise and responsibility to implement	· ·	Capital cost (lakhs)	Recurring cost (lakhs)	Monitoring of Air, Noise, water (per annum) Rs.	
		Construction	16.0	3.0	2	
		Operation	270	30	2	
22.	CER activities along with budg	jetary break-up a	and respon	nsibility to im	nplement	

22. CER activities along with budgetary break-up and responsibility to implement
Mr. Satish Kumar Kalra of M/s HPCL Mittal Energy Ltd. will be responsible for implementation

of CER (Corporate Environment Responsibility). The estimated cost of the project is Rs. 256 Crores and Rs. 195.0 lacs have been proposed under C.E.R activities as per Office Memorandum vide F. No. 22-65/ 2017-IA.III dated 01.05.2018, which will be spent on the following activities:

-	sed Budget (in Lac					T	
S.No.	CER Activities	2020- 21	2021- 22	2022-23	2023- 24	2024- 25	Total budget
1.	Provision of Water cooler in Public places/ Schools/ hospitals etc.	6	6	6	6	6	30
2.	Wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.	30	30	30	30	30	150
3.	Provision of toilet blocks or upgradation of existing toilets facilities in schools/health care centres/ villages	3	3	3	3	3	15
	Total	39	39	39	39	39	195
Oth SEA		present Osmosi	ation to that s (RO)	dertaking on the effect the plant in ms etc. for	at it shall the indi	not instal ividual a	_

### 3.0 Recommendations

After deliberations, SEAC decided to award 'Silver Grading' to the project proposal and to forward the application of the project proponent to SEIAA with the recommendations to grant Environmental Clearance for 2006 for expansion of Residential Township (Phase IV) "HMEL Township" having built-up area of 265228 sqm in total land area of 597580 sqm located at Village Raman & Tarakhwala, Distt. Bathinda, Punjab as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures, conditions prescribed in **Annexure-I of the proceedings** subject to following additions, amendments and deletions given as under:

Conditions to be added in the Annexure-I as under: -

i) Committee decided that the project proponent shall not install Reverse Osmosis
 (RO) plant in the individual apartment/Villas/Guest Rooms etc. for water
 treatment.

### Conditions to be amended in the Annexure-I as under: -

## Condition no. iv), v-a) & xv) of III. Water quality monitoring and preservation

- iv) The total water requirement for the project including the demand for landscaping in summer season will be 1281 KLD (885+396), out of which 985 KLD shall be met through canal water and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 767 KLD, which will be treated in proposed STP of 993 KLD (493 KLD and 500 KLD) capacity to be installed within the project premises However, 729 KLD treated wastewater will be available at the outlet of STPs after considering evaporation losses. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr. No.	Season	Flushing (KLD)	Green area (KLD)	Storage in Artificial pond (KLD)*
1.	Summer	296	433	0
2.	Winter	296	271	162
3.	Rainy	296	0	433

Note\* Stored treated wastewater shall be given to nearby farmers for utilizing the same for irrigation purpose after getting mutual consent and/ or for road sprinkling/construction purposes.

xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 189 nos of rainwater harvesting recharge pits (with dual-bore) shall be provided for groundwater recharging as per CGWA norms. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.

# Condition no. i) & iv) of X. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1<sup>st</sup> May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for spending Rs. 195 Lakhs on CER activities mentioned as per details given below:

Propo	Proposed Budget (in Lacs)								
S.No.	CER Activities	2020- 21	2021- 22	2022- 23	2023- 24	2024- 25	Total budget		
1.	Provision of Water cooler in Public places/ Schools/ hospitals etc.	6	6	6	6	6	30		
2.	Wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.	30	30	30	30	30	150		
3.	Provision of toilet blocks or upgradation of existing toilets facilities in schools/ health care centres/ villages	3	3	3	3	3	15		
	Total	39	39	39	39	39	195		

<sup>\*</sup>Note: - The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project

iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 16.0 Lacs towards the capital cost and Rs 5.0 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 270 Lacs towards the capital cost and Rs 32.0 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/resident's society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

## 4.0 Deliberations during 164th meeting of SEIAA held on 12.06.2020

The meeting was attended by the following through online Video Conference:

- i) Sh. Satish Kumar Kalra, D.G.M of the promoter company.
- ii) Ms. Shweta Shah, EIA Coordinator, M/s EQMS India Pvt. Ltd., Environment Consultant of the project proponent.

The SEIAA observed that the case stands recommended by SEAC and the Committee has awarded 'Silver Grading' to the project proposal. The SEIAA looked into the details of the case and was satisfied with the same.

Therefore, the Authority decided to accept the recommendations of SEAC and grant Environmental Clearance for expansion of Residential Township (Phase IV) "HMEL Township" having built-up area of 265228 sqm in total land area of 597580 sqm located at Village Raman & Tarakhwala, Distt. Bathinda, Punjab as per the details mentioned in the Form 1, 1A, EMP & subsequent presentation /clarifications made by the project proponent and his consultant with, proposed measures and with following conditions as recommended by SEAC & certain amendments therein & agreed by the Project Proponent:

# I. Statutory compliance:

- i) The project proponent shall obtain all necessary clearances/ permissions from all relevant agencies including town planning authority before commencement of work. All the construction shall be done in accordance with the local building byelaws.
- ii) The approval of the Competent Authority shall be obtained for the structural safety of buildings due to earthquakes, adequacy of firefighting equipment etc as per National Building Code including protection measures from lightening etc.
- iii) The project proponent shall obtain forest clearance under the provisions of Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose involved in the project.
- iv) The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.
- v) The project proponent shall obtain Consent to Establish / Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the Punjab Pollution Control Board.
- vi) The project proponent shall obtain the necessary permission for drawl of groundwater/ surface water required for the project from the competent authority.
- vii) A certificate of adequacy of available power from the agency supplying power to the project along with the load allowed for the project should be obtained.

- viii) All other statutory clearances such as the approvals for storage of diesel from Chief Controller of Explosives, Fire Department, Civil Aviation Department shall be obtained, as applicable, by project proponents from the respective competent authorities.
- ix) The provisions of the Solid Waste (Management) Rules, 2016, E-Waste (Management) Rules, 2016, Construction & Demolition Waste Rules, 2016 and the Plastics Waste (Management) Rules, 2016 shall be followed.
- x) The project proponent shall follow the ECBC/ECBC-R prescribed by the Bureau of Energy Efficiency, Ministry of Power strictly.
- xi) The project site shall conform to the suitability as prescribed under the provisions laid down under the master plan of respective city/ town. For that, the project proponent shall either submit the NOC/ land use conformity certificate from Deptt of Town and Country Planning or other concerned Authority under whose jurisdiction, the site falls.
- xii) Besides above, the project proponent shall also comply with siting criteria / guidelines, standard operating practices, code of practice and guidelines if any prescribed by the SPCB/CPCB/MoEF&CC for such type of projects.
- xiii) The project proponent shall get the layout plans approved from the Competent Authority for the activities/establishments to be set up at the project site in consonance with the project proposal for which this environment clearance is applied.

# II. Air quality monitoring and preservation

- i) Notification GSR 94(E) dated 25.01.2018 of MoEF&CC regarding Mandatory Implementation of Dust Mitigation Measures for Construction and Demolition Activities for projects requiring Environmental Clearance shall be complied with.
- ii) A management plan shall be drawn up and implemented to contain the current exceedance in ambient air quality at the site.
- iii) The project proponent shall install a system to carryout Ambient Air Quality monitoring for common /criterion parameters relevant-to the main pollutants released (e.g. PM10 and PM2.5) covering upwind and downwind directions during the construction period.
- iv) Diesel power generating sets proposed as source of backup power should be of enclosed type and conform to rules made under the Environment (Protection) Act, 1986. The height of stack of DG sets should be equal to the height needed for the combined capacity of all proposed DG sets. Use of low sulphur diesel should be ensured. The location of the DG sets may be decided in consultation with Punjab Pollution Control Board.
- v) Construction site shall be adequately barricaded before the construction begins. Dust, smoke & other air pollution prevention measures shall be provided for the building as well as the site. These measures shall include screens for the building under construction, continuous dust/ wind breaking walls all around the site (at

least 3m height or 1/3rd of the building height and maximum upto 10m). Plastic/tarpaulin sheet covers shall be provided for vehicles bringing in sand, cement, murram, and other construction materials prone to causing dust pollution at the site as well as taking out debris from the site.

- vi) No Excavation of soil shall be carried out without adequate dust mitigation measures in place.
- vii) No loose soil or sand or construction & demolition waste or any other construction material that causes dust shall be left uncovered.
- viii) No uncovered vehicles carrying construction material and waste shall be permitted.
- ix) All the topsoil excavated during construction activities should be stored for use in horticulture / landscape development within the project site.
- x) Grinding and Cutting of building material in open area shall be prohibited. Wet jet shall be provided for grinding and stone cutting.
- xi) Unpaved surfaces and loose soil shall be adequately sprinkled with water to suppress dust.
- xii) All construction and demolition debris shall be stored at the site within earmarked area and road side storage of construction material and waste shall be prohibited. All demolition and construction waste shall be managed as per the provisions of the Construction and Demolition Waste Rules 2016.
- xiii) The diesel generator sets to be used during construction phase shall be low sulphur diesel type and shall conform to the standards as enumerated in the Environmental (Protection) Rules, 1986 as prescribed for air and noise emission.
- xiv) The gaseous emissions from DG set shall be dispersed through adequate stack height as per CPCB standards. Acoustic enclosure shall be provided to the DG sets to mitigate the noise pollution. Low sulphur diesel shall be used. The location of the DG set and exhaust pipe height shall be as per the provisions of the Central Pollution Control Board (CPCB) norms.
- xv) For indoor air quality the ventilation provisions as per National Building Code of India shall be followed.
- xvi) Roads leading to or at construction site must be paved and blacktopped (i.e. metallic road)
- xvii) Dust Mitigation measures shall be displayed prominently at the construction site for easy public viewing.
- xviii) Construction and Demolition Waste Processing and Disposal site shall be identified and required dust mitigation measure be notified at the site.

### III. Water quality monitoring and preservation

i) The natural drain system should be maintained for ensuring unrestricted flow of water.

- ii) No construction shall be allowed to obstruct the natural drainage through the site, on wetland and water bodies. Check dams, bio-swales, landscape, and other sustainable urban drainage systems (SUDS) are allowed for maintaining the drainage pattern and to harvest rain water.
- iii) Buildings shall be designed to follow the natural topography as much as possible. Minimum cutting and filling should be done.
- iv) The total water requirement for the project including the demand of landscaping in summer season will be 1714 KLD, out of which 985 KLD shall be met through canal water and remaining through recycling of treated wastewater. Total freshwater use shall not exceed the proposed requirement as provided in the project details.
- v) a) The total wastewater generation from the project will be 767 KLD, which will be treated in proposed STP of 993 KLD (493 KLD and 500 KLD) capacity to be installed within the project premises However, 729 KLD treated wastewater will be available at the outlet of STPs after considering evaporation losses. As proposed, reuse of treated wastewater and discharge of surplus treated wastewater shall be as under: -

Sr. No.	Season	Flushing (KLD)	Green area (KLD)	Storage in Artificial pond (KLD)*
1.	Summer	296	433	0
2.	Winter	296	271	162
3.	Rainy	296	0	433

Note\* Stored treated wastewater shall be given to nearby farmers for utilizing the same for irrigation purpose after getting mutual consent and/ or for road sprinkling/construction purposes.

- b) Storage tank of adequate capacity shall be provided for the storage of treated wastewater and all efforts shall be made to supply the same for construction purposes.
- c) During construction phase, the project proponent shall ensure that the wastewater being generated from the labour quarters/toilets shall be treated and disposed in environment friendly manner. The project proponent shall also exercise the option of modular bio-toilets or will provide proper and adequately designed septic tanks for the treatment of such wastewater and treated effluents shall be utilized for green area/plantation
- vi) The project proponent shall ensure safe drinking water supply to the habitants. Adequate treatment facility for drinking water shall be provided, if required.
- vii) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the

- project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- viii) A certificate shall be obtained from the local body supplying water, specifying the total annual water availability with the local authority, the quantity of water already committed, the quantity of water allotted to the project under consideration and the balance water available. This should be specified separately for groundwater and surface water sources, ensuring that there is no impact on other users.
- ix) At least 20% of the open spaces as required by the local building bye-Jaws shall be pervious. Use of Grass pavers, paver blocks with at least 50% opening, landscape etc. would be considered as pervious surface.
- x) Installation of dual pipe plumbing for supplying freshwater for drinking, cooking and bathing etc and other for supply of recycled water for flushing, landscape irrigation, car washing, thermal cooling, conditioning etc. shall be done.
- xi) The respective project proponent shall discourage the installation of R.O. plants in their projects in order to save the wastage in form of RO reject. However, in case the requirement of installing RO plant is utmost necessary then the rejected stream from the RO shall be separated and shall be utilized by storing the same within the particular component i.e. (Tower/Mall) or in a common place in the project premises.
- xii) The project proponent shall also adopt the new/innovating technologies like less water discharging taps (faucet with aerators)/urinals with electronic sensor system /water less urinals / twin flush cisterns/ sensor based alarming system for overhead water storage tanks and make it a part of the environmental management plans / building plans so as to reduce the water consumption/groundwater abstraction in their Building Construction & Industrial projects.
- xiii) The project proponent will provide plumbing system for reuse of treated wastewater for flushing/ HVAC/ other purposes etc. and colour coding of different pipe lines carrying water/wastewater from different sources / treated wastewater as follows:

Sr.	Nature of the Stream	Colour code
No		
a)	Fresh water	Blue
b)	Untreated wastewater from Toilets/ urinal & from Kitchen	Black
c)	Untreated wastewater from Bathing/shower area, hand washing (Washbasin / sinks) and from Cloth Washing	Grey
d)	Reject water streams from RO plants & AC condensate (this is to be implemented wherever centralized AC system and common RO has been proposed in the Project). Further, in case of individual	White

	houses/establishment this proposal may also be	
	implemented wherever possible.	
e)	, , , , , , , , , , , , , , , , , , ,	Green
	purposes) from the STP treating black water	
f)	Treated wastewater (for reuse for flushing purposes or any other activity except plantation) from the STP treating grey water	Green with strips
g)	Storm water	Orange

- xiv) Water demand during construction should be reduced by use of pre-mixed concrete, curing agents and other best practices referred.
- xv) A rainwater harvesting plan needs to be designed where the recharge bores of minimum one recharge bore per 5,000 square meters of built-up area and storage capacity of minimum one day of total freshwater requirement shall be provided. Thus, 189 no's of rainwater harvesting recharge pits (with dual-bore) shall be provided for groundwater recharging. In areas where groundwater recharge is not feasible, the rainwater should be harvested and stored for reuse. The groundwater shall not be withdrawn without approval from the Competent Authority.
- xvi) All recharge should be limited to shallow aguifer.
- xvii) No groundwater shall be used during construction phase of the project. Only treated sewage/wastewater shall be used. A proper record in this regard should be maintained and available at site.
- xviii) Any groundwater dewatering should be properly managed and shall conform to the approvals and the guidelines of the CGWA in the matter. Formal approval shall be taken from the CGWA for any groundwater abstraction or dewatering.
- xix) The quantity of freshwater usage, water recycling and rainwater harvesting shall be measured and recorded to monitor the water balance as projected by the project proponent. The record shall be submitted to the Regional Office, MoEF&CC along with six-monthly Monitoring reports.
- xx) Sewage shall be treated in the STP with tertiary treatment. STP shall be installed in phased manner viz a viz in module system designed in such a way so as to efficiently treat the wastewater with increase in its quantity due to rise in occupancy. The treated effluent from STP shall be recycled/re-used for flushing, AC make up water and gardening. No treated water shall be disposed of into municipal storm water drain.
- xxi) No sewage or untreated effluent water would be discharged through storm water drains. Onsite sewage treatment of capacity of treating 100% wastewater to be installed. The installation of the Sewage Treatment Plant (STP) shall be certified by an independent expert and a report in this regard shall be submitted to the Ministry before the project is commissioned for operation. Treated wastewater shall be reused on site for landscape, flushing, cooling tower, and other end-uses.

- Excess treated water shall be discharged as per statutory norms notified by Ministry of Environment, Forest and Climate Change. Natural treatment systems shall be promoted.
- xxii) Periodical monitoring of water quality of treated sewage shall be conducted. Necessary measures should be made to mitigate the odour problem from STP.
- xxiii) Sludge from the onsite sewage treatment, including septic tanks, shall be collected, conveyed and disposed of as per the Ministry of Urban Development, Central Public Health and Environmental Engineering Organization (CPHEEO) Manual on Sewerage and Sewage Treatment Systems, 2013.

# IV. Noise monitoring and prevention

- i) Ambient noise levels shall conform to residential area/commercial area/industrial area/silence zone both during day and night as per Noise Pollution (Control and Regulation) Rules, 2000. Incremental pollution loads on the ambient air and noise quality shall be closely monitored during construction phase. Adequate measures shall be made to reduce ambient air and noise level during construction phase, so as to conform to the stipulated standards by CPCB/SPCB.
- ii) Noise level survey shall be carried out as per the prescribed guidelines and report in this regard shall be submitted to Regional Office of the Ministry as a part of sixmonthly compliance report.
- iii) Acoustic enclosures for DG sets, noise barriers for ground-run bays, ear plugs for operating personnel shall be provided as mitigation measures for noise impact due to ground sources.

## V. Energy Conservation measures

- i) Compliance with the Punjab Energy Conservation Building Code (PECBC) of Energy Efficiency shall be ensured.
- ii) Outdoor and common area lighting shall be LED.
- iii) Concept of passive solar design that minimize energy consumption in buildings by using design elements, such as building orientation, landscaping, efficient building envelope, appropriate fenestration, increased day lighting design and thermal mass etc. shall be incorporated in the building design. Wall, window, and roof uvalues shall be as per ECBC specifications.
- iv) Energy conservation measures like installation of LEDs for lighting the area outside the building should be integral part of the project design and should be in place before project commissioning.
- v) Solar, wind or any other Renewable Energy equipment shall be installed to meet electricity generation equivalent to at least 1% of the demand load or as per the state level/ local building bye-laws requirement, whichever is higher.
- vi) Solar power by utilizing at least 30% of the rooftop area shall be used for lighting in the apartment to reduce the power load on grid. Separate electric meter shall be installed for solar power.

### VI. Waste Management

- i) A certificate from the competent authority handling municipal solid wastes, indicating the existing civic capacities of handling and their adequacy to cater to the M.S.W. generated from project shall be obtained.
- ii) Disposal of muck during construction phase shall not create any adverse effect on the neighbouring communities and be disposed of taking the necessary precautions for general safety and health aspects of people, only in approved sites with the approval of competent authority.
- iii) Separate wet and dry bins must be provided in each unit and at the ground level for facilitating segregation of waste. Solid waste shall be segregated into wet garbage and inert materials.
- iv) Organic waste compost/ Vermiculture pit/ Organic Waste Converter within the premises with a minimum capacity of 0.3 kg /person/day must be installed for treatment and disposal of the waste.
- v) All non-biodegradable waste shall be handed over to authorized recyclers for which a written tie up must be done with the authorized recyclers.
- vi) Any hazardous waste generated during construction phase, shall be disposed of as per applicable rules and norms with necessary approvals of the State Pollution Control Board.
- vii) Use of environment friendly materials in bricks, blocks and other construction materials, shall be required for at least 20% of the construction material quantity. These include Fly Ash bricks, hollow bricks, AACs, Fly Ash Lime Gypsum blocks, Compressed earth blocks, and other environment friendly materials.
- viii) Fly ash should be used as building material in the construction as per the provision of Fly Ash Notification of September, 1999 and amended as on 27th August, 2003 and 25th January, 2016. Ready mixed concrete must be used in building construction.
- ix) Any wastes from construction and demolition activities related thereto shall be managed in such a way so as to strictly conform to the Construction and Demolition Rules, 2016.
- x) Used CFLs and TFLs should be properly collected and disposed off/sent for recycling as per the prevailing guidelines/ rules of the regulatory authority to avoid mercury contamination.

#### **VII.** Green Cover

i) No tree shall be felled/transplanted unless extreme exigencies demand. Where absolutely necessary, tree felling shall be with prior permission from the concerned regulatory authority. Old trees should be retained based on girth and age regulations as may be prescribed by the Forest Department. Plantations to be ensured species (cut) to species (planted).

- ii) At least single line plantation all around the boundary of the project as proposed shall be provided. The open spaces inside the plot should be suitably landscaped and covered with vegetation of indigenous species/variety. A minimum of one tree for every 80 sqm of total project land should be planted and maintained. The existing trees will be counted for this purpose. The landscape planning should include plantation of native species. The species with heavy foliage, broad leaves and wide canopy cover are desirable. Water intensive and/or invasive species should not be used for landscaping. The plantation should be provided as per SEIAA guidelines.
- iii) Where the trees need to be cut with prior permission from the concerned local Authority, compensatory plantation in the ratio of 1: 10 (i.e. planting of 10 trees for every 1 tree that is cut) shall be done and maintained. Plantations to be ensured species (cut) to species (planted). Area for green belt development shall be provided as per the details provided in the project document.
- iv) Topsoil should be stripped to a depth of 20 cm from the areas proposed for buildings, roads, paved areas, and external services. It should be stockpiled appropriately in designated areas and reapplied during plantation of the proposed vegetation on site.
- v) The project proponent shall not use any chemical fertilizer /pesticides /insecticides and shall use only Herbal pesticides/insecticides and organic manure in the green area.
- vi) The green belt along the periphery of the plot shall achieve attenuation factor conforming to the day and night noise standards prescribed for residential land use.

#### VIII. Transport

- i) A comprehensive mobility plan, as per MoUD best practices guidelines (URDPFI), shall be prepared to include motorized, non-motorized, public, and private networks. Road should be designed with due consideration for environment, and safety of users. The road system can be designed with these basic criteria.
  - a) Hierarchy of roads with proper segregation of vehicular and pedestrian traffic.
  - b) Traffic calming measures.
  - c) Proper design of entry and exit points.
  - d) Parking norms as per local regulation.
- ii) Vehicles hired for bringing construction material to the site should be in good condition and should have a pollution check certificate and should conform to applicable air and noise emission standards and be operated only during non-peak hours.
- iii) A detailed traffic management and traffic decongestion plan shall be drawn up to ensure that the current level of service of the roads within a 05 kms radius of the

project is maintained and improved upon after the implementation of the project. This plan should be based on cumulative impact of all development and increased habitation being carried out or proposed to be carried out by the project or other agencies in this 05 Kms radius of the site in different scenarios of space and time and the traffic management plan shall be duly validated and certified by the State Urban Development department and the P.W.D./ competent authority for road augmentation and shall also have their consent to the implementation of components of the plan which involve the participation of these departments.

iv) Traffic congestion near the entry and exit points from the roads adjoining the proposed project site must be avoided. Parking should be fully internalized and no public space should be utilized.

#### IX. Human health issues

- i) All workers working at the construction site and involved in loading, unloading, carriage of construction material and construction debris or working in any area with dust pollution shall be provided with dust mask.
- ii) For indoor air quality the ventilation provisions as per National Building Code of India shall be strictly followed.
- iii) Emergency preparedness plan based on the Hazard identification and Risk Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project.
- iv) Occupational health surveillance of the workers shall be done on a regular basis.
- v) A First Aid Room shall be provided in the project both during construction and operations of the project.

# X. Corporate Environment Responsibility

i) The project proponent shall comply with the provisions contained in this Ministry's OM vide F.No. 22-65/2017-IA.III dated 1<sup>st</sup> May 2018, as applicable, regarding Corporate Environment Responsibility. The project proponent shall adhere to the commitments made in the proposal for spending Rs. 195 Lakhs on CER activities mentioned as per details given below:

Proposed Budget (in Lacs)								
S.No.	CER Activities	2020- 21	2021- 22	2022- 23	2023- 24	2024- 25	Total budget	
1.	Provision of Water cooler in Public	6	6	6	6	6	30	

	places/ Schools/						
2.	hospitals etc.  Wastewater treatment of village pond (to be provided by the Department of Rural Developments and Panchayats, Govt. of Punjab), as per the design evolved by Punjab Pollution Control Board.	30	30	30	30	30	150
3.	Provision of toilet blocks or upgradation of existing toilets facilities in schools/ health care centres/ villages	3	3	3	3	3	15
	Total	39	39	39	39	39	195

\*Note: - The amount to be spent on CER activities shall be proportionate to the amount spent on project & such activities shall run parallel to the project execution. All the activities must be completed with the completion of the project

- ii) The company shall have a well laid down environmental policy duly approved by the Board of Directors. The environmental policy should prescribe for standard operating procedures to have proper checks and balances and to bring into focus any infringements/deviation/violation of the environmental / forest / wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental / forest / wildlife norms / conditions to all shareholders / stake holders. The copy of the board resolution in this regard shall be submitted to the MoEF&CC as a part of six-monthly report.
- iii) A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of senior Executive, who will directly report to the head of the organization.
- iv) Action plan for implementing EMP and environmental conditions along with the responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The Year-wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. The project proponent shall spend a minimum amount of Rs 16.0 Lacs towards the capital cost and Rs 5.0 Lacs/annum towards recurring cost in the construction phase of the project including the environmental monitoring cost and shall spend a minimum amount of Rs 270 Lacs towards the capital cost

and Rs 32.0 Lacs/annum towards recurring cost in operation phase of the project including the environmental monitoring cost. The entire cost of the environmental management plan will continue to be borne by the project proponent until the responsibility of the environmental management plan is transferred to the occupier/resident's society under proper MOU under intimation to SEIAA, Punjab. Year-wise progress of implementation of the action plan shall be reported to the Ministry/Regional Office along with the Six-Monthly Compliance Report.

## XI. Validity

i) This environmental clearance will be valid for a period of seven years from the date of its issue or till the completion of the project, whichever is earlier.

### XII. Miscellaneous

- The project proponent before allowing any occupancy shall obtain completion and occupancy certificate from the Competent Authority and submit a copy of the same to SEIAA, Punjab.
- ii) The project proponent shall comply with the conditions of CLU.
- iii) The project proponent shall prominently advertise it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days indicating that the project has been accorded environment clearance and the details of MoEF&CC /SEIAA website where it is displayed.
- iv) The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.
- v) The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on a half-yearly basis.
- vi) The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the Ministry of Environment, Forest and Climate Change at Environment Clearance portal.
- vii) The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.
- viii) The project proponent shall inform the Regional Office as well as the Ministry, the date of financial closure and final approval of the project by the concerned authorities, commencing the land development work and start of production /operation by the project.
- ix) The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.
- x) The project proponent shall abide by all the commitments and recommendations made in the EIA/EMP report, commitment made during Public Hearing, and also that during their presentation to the Expert Appraisal Committee and SEIAA.
- xi) No further expansion or modifications in the plant/project shall be carried out without prior approval of the Ministry of Environment, Forests and Climate Change

(MoEF&CC).

- xii) Concealing factual data or submission of false/fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.
- xiii) The SEIAA/Ministry may revoke or suspend the clearance if the implementation of any of the above conditions is not satisfactory.
- xiv) The SEIAA/ Ministry reserves the right to stipulate additional conditions if found necessary. The Company in a time-bound manner shall implement these conditions.
- xv) The Regional Office of this Ministry and Punjab Pollution Control Board shall monitor compliance of the stipulated conditions. The project authorities should extend full cooperation to the officer (s) of the Regional Office and PPCB by furnishing the requisite data/ information/monitoring reports.
- xvi) The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts and any other Court of Law relating to the subject matter.
- xvii) Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010.

#### **Additional Conditions: -**

i) Committee decided that the project proponent shall not install a Reverse Osmosis
 (RO) plant in the individual apartment/Villas/Guest Rooms etc. for water
 treatment.

Meeting ended with a vote of Thanks to the Chair.

\*\*\*